360iResearch

Prickly Pear Seed Oil Market

Global Forecast 2026-2032

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Table of Contents

1. Preface 6
   1.1. Objectives of the Study 6
   1.2. Market Definition 6
   1.3. Market Segmentation & Coverage 7
   1.4. Years Considered for the Study 18
   1.5. Currency Considered for the Study 19
   1.6. Language Considered for the Study 19
   1.7. Key Stakeholders 19
2. Research Methodology 21
   2.1. Introduction 21
   2.2. Research Design 21
      2.2.1. Primary Research 22
      2.2.2. Secondary Research 22
   2.3. Research Framework 22
      2.3.1. Qualitative Analysis 23
      2.3.2. Quantitative Analysis 23
   2.4. Market Size Estimation 24
      2.4.1. Top-Down Approach 24
      2.4.2. Bottom-Up Approach 24
   2.5. Data Triangulation 24
   2.6. Research Outcomes 25
   2.7. Research Assumptions 25
   2.8. Research Limitations 26
3. Executive Summary 27
   3.1. Introduction 27
   3.2. CXO Perspective 27
   3.3. New Revenue Opportunities 28
   3.4. Next-Generation Business Models 29
   3.5. Industry Roadmap 30
4. Market Overview 32
   4.1. Introduction 32
   4.2. Key Growth Contribution 34
   4.3. Industry Ecosystem & Value Chain Analysis 51
      4.3.1. Supply-Side Analysis 52
      4.3.2. Demand-Side Analysis 53
      4.3.3. Stakeholder Analysis 53
   4.4. Market Dynamics 54
      4.4.1. Key Drivers 55
         4.4.1.1. Multiple documented cosmetic purchasing contexts 55
         4.4.1.2. Certification-linked purchasing eligibility 55
         4.4.1.3. Professional-use and resale channel access 56

4.4.2. Key Restraints 56
4.4.2.1. Competition within the botanical-oil proposition 56
4.4.2.2. Nontransferable intended-use permissions 56
4.4.2.3. Claims can change the commercial access regime 57
4.4.3. Key Opportunities 57
4.4.3.1. Buyer-timed documentation commitments 57
4.4.3.2. Certification continuity through the channel 57
4.4.3.3. Separately contracted origin-backed own-label supply 58
4.4.4. Key Challenges 58
4.4.4.1. Reconciling product names with ingredient declarations 58
4.4.4.2. Managing origin exposure without assuming a shortage 58
4.4.4.3. Preserving certification through intermediary handling 59
4.5. Porter's Five Forces Analysis 59
4.6. PESTLE Analysis 60
4.7. Market Outlook 62
4.7.1. Near-Term Market Outlook (0-2 Years) 62
4.7.2. Medium-Term Market Outlook (3-5 Years) 63
4.7.3. Long-Term Market Outlook (5-10 Years) 64
4.8. Go-to-Market Strategy 64
5. Market Insights 67
5.1. Consumer Insights & End-User Perspective 67
5.2. Consumer Experience Benchmarking 68
5.3. Opportunity Mapping 68
5.4. Distribution Channel Analysis 70
5.5. Pricing Trend Analysis 71
5.6. Regulatory Compliance & Standards Framework 72
5.7. ESG & Sustainability Analysis 73
5.8. Disruption & Risk Scenarios 74
5.9. Return on Investment & Cost-Benefit Analysis 75
6. Cumulative Impact of Artificial Intelligence 2026 77
7. Prickly Pear Seed Oil Market, by Refinement Status 78
7.1. Unrefined 83
7.2. Refined 91
8. Prickly Pear Seed Oil Market, by Application 100
8.1. Cosmetics and Personal Care 107
8.1.1. Skin Care 118
8.1.2. Hair Care 126
8.1.3. Color Cosmetics 134
8.1.4. Personal Cleansing 140
8.1.5. Nail Care 147
8.2. Pharmaceuticals 153
8.3. Food and Beverages 161
8.4. Dietary Supplements 168
9. Prickly Pear Seed Oil Market, by End User 176

9.1. Individuals and Households 182
9.2. Manufacturers and Formulators 189
9.3. Professional Service Providers 196
10. Prickly Pear Seed Oil Market, by Supply Format 205
10.1. Consumer Packaging 210
10.2. Bulk Packaging 220
11. Prickly Pear Seed Oil Market, by Sales Channel 228
11.1. Intermediated Sales 233
11.1.1. Retailers 242
11.1.2. Ingredient Distributors and Wholesalers 248
11.2. Direct Sales 256
12. Prickly Pear Seed Oil Market, by Organic Certification Status 264
12.1. Certified Organic 269
12.2. Not Certified Organic 276
13. Prickly Pear Seed Oil Market, by Botanical Source 285
13.1. Opuntia ficus-indica 290
13.2. Opuntia stricta 297
13.3. Opuntia tuna 305
14. Prickly Pear Seed Oil Market, by Region 313
14.1. Europe 320
14.2. North America 340
14.3. Asia-Pacific 358
14.4. Middle East 378
14.5. Latin America 397
14.6. Africa 415
15. Prickly Pear Seed Oil Market, by Group 434
15.1. NATO 440
15.2. G7 461
15.3. European Union 480
15.4. BRICS 501
15.5. GCC 520
15.6. ASEAN 539
16. Prickly Pear Seed Oil Market, by Country 560
16.1. United States 568
16.2. France 586
16.3. Germany 604
16.4. China 622
16.5. United Kingdom 640
16.6. Italy 658
16.7. Japan 676
16.8. South Korea 694
16.9. Spain 712

16.10. Brazil 730
16.11. Australia 748
16.12. Canada 766
16.13. Mexico 784
16.14. India 802
16.15. Russia 820
17. Competitive Landscape 839
17.1. Market Share Analysis, 2025 839
17.2. Market Concentration Analysis, 2025 846
17.3. Recent Developments & Impact Analysis, 2025 849
17.4. Product Portfolio Analysis, 2025 850
17.5. Benchmarking Analysis, 2025 857
18. Company Profiles 861
18.1. Biovalley 861
18.2. ZINEGLOB 862
18.3. SOPHIM 862
18.4. O&3 863
18.5. Jedwards International, Inc. 864
18.6. AOT GmbH 865
18.7. New Directions Aromatics 865
18.8. New Directions Australia Pty Ltd. 866
18.9. Leven Rose 867
18.10. Boterra Materials 868
18.11. Comptoir des Huiles 868
18.12. SEMYAS BIO 869
19. Companies Covered 871
20. Key Experts 899

1. Preface

1.1. Objectives of the Study

- Which suppliers demonstrably offer Prickly Pear Seed Oil within the accepted Botanical Source and Refinement Status categories, and what documented offerings distinguish them from sellers of other cactus-derived materials?
- What documentation, traceability, certification scope, and delivery commitments do Manufacturers and Formulators require, and how do these conditions affect supplier qualification, continued purchasing, and switching?
- What product- and jurisdiction-specific access, labeling, and permitted-claim conditions apply across Cosmetics and Personal Care, Food and Beverages, Dietary Supplements, and Pharmaceuticals?
- How do the purchasing and service requirements of Manufacturers and Formulators, Professional Service Providers, and Individuals and Households differ, and which documented offerings address those requirements through Bulk Packaging or Consumer Packaging?
- How do Direct Sales and Intermediated Sales allocate customer access, documentation responsibilities, service commitments, and commercial control, and what distribution or licensing rights must a participant verify before choosing a route to market?
- How do documented Refinement Status, Organic Certification Status, and Botanical Source affect qualification and positioning, without assuming that category labels establish equivalence, buyer preference, or product benefits?
- Which upstream supply relationships, origin dependencies, trade conditions, and territorial arrangements could constrain access to the studied oil, and what business commitments would be needed to address those constraints?
- What evidence explains rivalry, substitution, and buyer bargaining in the studied oil, and under what conditions would differentiation, a different supplier relationship, or an alternative channel offer a defensible commercial choice?

1.2. Market Definition

The Global Prickly Pear Seed Oil market covers the commercial supply of seed-derived oil from Opuntia ficus-indica, Opuntia stricta, and Opuntia tuna. It includes Unrefined and Refined offerings supplied as business ingredients and as standalone packaged oil, with both Certified Organic and Not Certified Organic categories retained.

The studied buyers are Manufacturers and Formulators, Professional Service Providers, and Individuals and Households. Supply includes Bulk Packaging and Consumer Packaging through Direct Sales and Intermediated Sales. Application coverage includes Cosmetics and Personal Care, Food and Beverages, Dietary Supplements, and Pharmaceuticals.

Upstream cultivation, fruit and seed trading, equipment, and other cactus-derived ingredients are adjacent activities rather than the studied oil offering. Downstream multi-ingredient goods and professional services provide application and buyer context; their full business value is not treated as Prickly Pear Seed Oil activity. This distinction retains the accepted applications and buyers without expanding the market to every product or service associated with the oil.

1.3. Market Segmentation & Coverage

Refinement Status distinguishes Unrefined and Refined commercial offerings without presuming purchasing interchangeability. Application identifies the downstream product context: Cosmetics and Personal Care, comprising Skin Care, Hair Care, Personal Cleansing, Nail Care, and Color Cosmetics; Food and Beverages; Dietary Supplements; and Pharmaceuticals. All are included categories, separate from the question of any particular offering's authorization or adoption.

End User distinguishes Manufacturers and Formulators, Professional Service Providers, and Individuals and Households according to the buyer or user relationship. Supply Format separates Bulk Packaging and Consumer Packaging. Packaging is a distinct commercial descriptor rather than a substitute for identifying the buyer.

Sales Channel distinguishes Direct Sales and Intermediated Sales. Intermediated Sales includes Ingredient Distributors and Wholesalers and Retailers. This axis identifies the commercial route and associated relationships, not a separate oil offering or an additional end-use category.

Organic Certification Status distinguishes Certified Organic and Not Certified Organic offerings. Botanical Source distinguishes Opuntia ficus-indica, Opuntia stricta, and Opuntia tuna. These axes support comparisons of documented identity and certification scope without treating either as proof of benefits, equivalence, or commercial preference.

The seven axes are independent lenses on the same Global market and are not additive opportunities. A single oil offering may be described across several axes. Geographic examples and expert perspectives remain within the Global boundary rather than redefining it as a selected-country market.

Table 1. Global Prickly Pear Seed Oil Market Segmentation & Coverage

Segmentation	Coverage

Application	• Cosmetics and Personal Care
	  o Skin Care
	  o Hair Care
	  o Color Cosmetics
	  o Personal Cleansing
	  o Nail Care
	• Pharmaceuticals
	• Food and Beverages
	• Dietary Supplements

Botanical Source	• Opuntia ficus-indica • Opuntia stricta • Opuntia tuna
End User	• Individuals and Households • Manufacturers and Formulators • Professional Service Providers
Organic Certification Status	• Certified Organic • Not Certified Organic
Refinement Status	• Unrefined • Refined

Sales Channel	• Intermediated Sales
	  o Retailers
	  o Ingredient Distributors and Wholesalers
	• Direct Sales

Supply Format	• Consumer Packaging • Bulk Packaging

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

- Taxonomy evidence: The December xx.xx 2023 European guidance distinguishes refining from subsequent oil sales. It supports a sold-product specification, not additive refining-service revenue or a global 2025 split. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The December xx.xx 2023, government commercial study distinguishes seed-oil refining from subsequent sales to manufacturers, brands and retail channels. This supports treating final refinement status as a sold-product specification rather than adding refining-service revenue to the oil market. Its commercial observations concern Europe. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: Refined oil is explicitly described in onward-sale packaging; the passage does not establish every offering's unblended composition. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The study explicitly describes refined prickly pear seed oil being packaged for onward sale, establishing recognition of refined oil in the European cosmetics value chain. It does not establish globally representative 2025 sales or verify the unblended composition of every refined offering. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: Skin-care and hair-care uses are identified separately from the roles of ingredient intermediaries. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The December xx.xx 2023, government commercial guidance identifies downstream cosmetic product categories separately from importers, refiners, and manufacturers. Its European scope does not establish global allocations. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The value chain distinguishes cosmetic manufacturers, reselling intermediaries and retail consumers. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The value-chain discussion distinguishes cosmetic manufacturers and retail consumers from intermediary importers, distributors, and refiners. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: Canisters and drums are recognized oil-shipment presentations, corroborating ingredient-handling packaging. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The December xx.xx 2023 European guidance identifies canisters and drums as commercial oil-shipment presentations. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The retail discussion separately identifies consumer bottles of the oil. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The guidance separately documents consumer retail bottles of prickly pear seed oil. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: Direct sourcing, merchant distribution and commission agency are distinguished, supporting seller-role allocation rather than an online/offline partition. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The oil-channel model distinguishes origin suppliers, importers/distributors, retailers, and commission agents. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: Importers and distributors supply ingredients to manufacturers; this identifies a channel,

2. Issue brief - ISO definitions of key terms for plastic pollution

   · Taxonomy evidence: ISO's packaging vocabulary distinguishes supply-chain functions. Its broad bulk definition concerns loose materials or liquids in transport/storage, while consumer packaging concerns final-user sales units. Their adaptation into an exclusive ingredient-versus-standalone presentation model is analytical, not a literal standardized binary. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

   · Taxonomy evidence: The packaging vocabulary distinguishes industrial supply-chain packaging, final-user sales packaging, and outer transport packaging. Applying these functions to the oil-containing sales unit is an analytical adaptation, not a package-size segmentation. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

   · Taxonomy evidence: The vocabulary separately recognizes industrial packaging for manufacturer/intermediary distribution. This supports the ingredient-handling interpretation without imposing a numerical size threshold. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

   · Taxonomy evidence: The vocabulary recognizes bulk packaging for liquids in transport or storage and industrial packaging for manufacturer or intermediary supply. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

   · Taxonomy evidence: Consumer, retail and sales packaging are defined around a completed sales unit for the final user. Extending this function to professional direct-use oil units is a disclosed modeling decision. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

   · Taxonomy evidence: Consumer, retail, or sales packaging is distinguished by its function as a completed sales unit for the final user. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

3. Frequently Asked Questions - Wholesale, 2022 Economic Census

   · Taxonomy evidence: The U.S. Economic Census distinguishes own-brand importers, manufacturer-affiliated selling offices, merchant activity and commission-based facilitators. These are useful role definitions, not global prickly pear oil channel measurements. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

   · Taxonomy evidence: The commercial definitions separately identify manufacturer-controlled selling branches, commission agents, and fee-based electronic markets. The proposed seller-of-record rule uses these distinctions without treating facilitator fees as oil sales. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

   · Taxonomy evidence: Manufacturer selling branches are defined through ownership or corporate affiliation; own-brand importing is also separately recognized. Treating controlled sellers and consumer-brand principals as direct is an explicit analytical adaptation. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

   · Taxonomy evidence: A manufacturer's sales branch or office is defined through ownership or corporate affiliation with the manufacturer, supporting treatment of controlled selling operations within a direct route. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

   · Taxonomy evidence: Agents, brokers and electronic markets can operate for commissions or fees rather than on their own account. Therefore facilitator presence alone does not establish an additional merchant oil sale. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

4. COSMOS CERTIFICATION - Organic and Natural
   - Taxonomy evidence: COSMOS distinguishes certified organic-content raw materials from approved nonorganic raw materials. Natural-product approval and organic certification therefore cannot be treated as interchangeable. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))
   - Taxonomy evidence: The standard distinguishes organic-content raw-material certification from nonorganic raw-material approval and from natural finished-product certification. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))
   - Taxonomy evidence: COSMOS CERTIFIED is available to compliant agro-ingredients containing organic content. This is scheme-specific recognition, not automatic equivalence with every agricultural organic regime. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))
   - Taxonomy evidence: COSMOS CERTIFIED applies to compliant raw materials with organic content; this establishes a certification class rather than a universal equivalence among schemes. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))
   - Taxonomy evidence: COSMOS APPROVED concerns nonorganic raw materials within that scheme. It supports the distinction from organic certification, but does not independently establish that a particular oil lacks every other applicable organic certificate. The latter limitation is an analytical inference. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))
   - Taxonomy evidence: COSMOS APPROVED is available for nonorganic raw materials. Such approval alone is not organic certification. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))
5. Frequently asked questions ON ORGANIC RULES - March 19, 2025
   - Taxonomy evidence: The March xx.xx 2025 Commission guidance distinguishes edible prickly pear fruit from its seed oil and states that the oil had not then been assessed under novel-food rules. This remains a dated statement, not evidence of current authorization or realized food sales. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
   - Taxonomy evidence: The European Commission document dated March xx.xx 2025, distinguishes edible prickly pear fruit from its seed oil and states that the oil had not yet been assessed under novel-food rules. This dated statement does not establish current authorization. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
   - Taxonomy evidence: The guidance makes intended final use consequential: cosmetic-labeled oil is outside the specified EU agricultural organic regime. This regime-specific restriction must not be generalized to all cosmetic certification schemes. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
   - Taxonomy evidence: The document does not permit cosmetic positioning or certification terminology to establish lawful ingestible use. Separate destination-specific food-status evidence remains necessary. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
   - Taxonomy evidence: The document makes final intended use consequential to the oil's regulatory treatment, supporting separation of cosmetic and ingestible purposes. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
   - Taxonomy evidence: The seed-oil-specific food-status discussion prevents inferring lawful ingestion merely from the plant's edible fruit or general botanical-supplement positioning. It does not establish a supplement-specific authorization. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

6. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

   · Taxonomy evidence: The inspected label lists Opuntia ficus-indica seed oil among inactive ingredients and classifies the sunscreen as an OTC Monograph Drug, with reported marketing beginning June xx.xx 2024. This establishes a labeled excipient application, not approval of the oil, therapeutic efficacy or fulfilled oil purchases. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

   · Taxonomy evidence: The DailyMed label for Eminence Daily Defense Tinted SPF lists Opuntia ficus-indica seed oil as an inactive ingredient and identifies the finished product as an OTC Monograph Drug, with a reported marketing start of June xx.xx 2024. This establishes a labeled excipient application, not approval of the oil itself. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

   · Taxonomy evidence: This drug-designated downstream formulation demonstrates why an appearance-related sunscreen product cannot automatically be allocated to cosmetic-only use. Single allocation to Pharmaceuticals is the report's modeling convention. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

   · Taxonomy evidence: The record supports retaining a drug-formulation application alongside cosmetic uses, with explicit single allocation of hybrids. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

   · Taxonomy evidence: The label documents incorporation of seed oil into a downstream drug formulation. It identifies a labeler but does not establish which entity purchased the oil or fulfilled procurement quantities. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

7. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml - David Jones Pharmacy

   · Taxonomy evidence: The retailer's listing simultaneously contains dietary-supplement positioning and an external-use-only warning. It reports a stock-information check dated July xx.xx 2026. The contradictory descriptions do not resolve the definitive on-pack designation, lawful ingestible status or supplement-use transactions. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

   · Taxonomy evidence: David Jones Pharmacy's specific listing for the same branded seed oil repeats dietary-supplement positioning but also carries an external-use-only warning. These conflicting intended-use statements prevent treating the offer as an unambiguous ingestible product. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

   · Taxonomy evidence: The contradictory intended-use descriptions show why multipurpose advertising alone cannot support a clean application allocation. This is a limitation of the specific listing, not proof that every supplement-positioned offering is contradictory. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

8. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles

   · Taxonomy evidence: The brand's specific oil declaration names Opuntia Stricta Seed Oil as its sole ingredient and explicitly describes the oil as unrefined. This corroborates an in-boundary product specification, not the market partition or 2025 sales.
   ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

   · Taxonomy evidence: The specific standalone-oil declaration uses Opuntia stricta rather than ficus-indica. This is commercial label identity, not independent botanical authentication or a market-share claim.
   ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

   · Taxonomy evidence: The independently inspected standalone-oil declaration identifies its sole ingredient as Opuntia Stricta Seed Oil. This supports an advertised sold-oil identity distinct from ficus-indica, not a market-share claim.
   ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

   · Taxonomy evidence: The same offering displays standalone bottle and roll-on presentations, corroborating completed direct-use packaging independently of an assumed household buyer.
   ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

9. Kaktusfeigenkernöl - Natural Pro

   · Taxonomy evidence: The direct product page identifies prickly pear seed oil as its listed ingredient and advertises culinary positioning. It also displays inconsistent availability signals. This supports advertised intended use only, not lawful food status, completed sales or beverage participation.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))

   · Taxonomy evidence: Natural Pro's direct product record identifies prickly pear seed oil as the listed ingredient and markets the standalone oil for culinary purposes. The page presents inconsistent availability signals. This establishes advertised food positioning, not lawful food status or completed sales.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))

   · Taxonomy evidence: The consumer-facing culinary offer corroborates an intended private-use purchasing setting; no actual purchaser identities or household transactions are disclosed.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))

10. The European market potential for prickly pear seed oil for cosmetics

- Taxonomy evidence: The December xx.xx 2023, government commercial study identifies prickly pear seed oil as seed-derived vegetable oil and places it within a trade heading covering fixed vegetable oils whether refined or not. This supports retaining both refinement states within the product boundary; the heading does not isolate prickly pear seed-oil quantities or provide a refinement split. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
- Taxonomy evidence: The December xx.xx 2023, government publication distinguishes standalone facial oil from oil incorporated into downstream cosmetic products. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
- Taxonomy evidence: The publication identifies moisturizers, serums, facial masks, and standalone facial oil as commercial product forms. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
- Taxonomy evidence: Hair-care products are explicitly included among downstream applications. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
- Taxonomy evidence: The discussion identifies consumer demand for standalone natural cosmetic oils; it does not measure household seed-oil purchases. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
- Taxonomy evidence: The product description identifies both standalone oil sales and oil supplied as an ingredient, supporting distinct commercial presentation functions without establishing their global proportions. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
- Taxonomy evidence: The commercial classification table explicitly identifies OPUNTIA FICUS-INDICA SEED OIL as the ingredient name for the described market product. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))

11. Labelling requirements for fats and oils

- Taxonomy evidence: Canadian food-labeling guidance, modified November xx.xx 2025, explains that the relevant general Codex oil standards recognize virgin and cold-pressed designations but do not define an extra-virgin designation for non-olive vegetable oils. This provides a terminology safeguard against inventing Extra Virgin as another refinement-status peer. It is not a cosmetic classification rule or evidence that prickly pear seed oil is authorized as food. ([inspection.canada.ca](https://inspection.canada.ca/en/food-labels/labelling/industry/fats-and-oils))

12. ACO Certification Ltd - COSMOS certificate 10282 and certified product annex

- Taxonomy evidence: The inspected 2026 ACO certification annex lists a cosmetic raw material named Prickly Pear Virgin Oil. This independently corroborates use of the virgin commercial designation within the relevant product context, but does not establish 2025 transactions or universal equivalence between virgin and unrefined labels. ([newdirections.com.au](https://www.newdirections.com.au/WebRoot/Store/Shops/newdirections/MediaGallery/Certificates/PDF/Australian-COSMOS-Certified-xx.xx-Certificate.pdf))

13. Prickly Pear Carrier Oil: A Luxurious Treat for Skin and Hair

- Taxonomy evidence: The supplier describes its own cold-pressed offerings with different final refinement declarations, illustrating why an extraction claim alone cannot determine this axis. It also discloses standardization with vegetable oils for its named refined cosmetic-grade offering. That specific offering therefore is not used as proof of an unblended refined-oil sale within the frozen boundary. These are product-specific observations, not evidence of the market's complete partition. ([newdirectionsaromatics.com](https://www.newdirectionsaromatics.com/blog/prickly-pear-carrier-oil-a-luxurious-treat-for-skin-and-hair))
- Taxonomy evidence: The supplier explicitly identifies its own prickly pear carrier-oil offerings as seed-derived and unrefined. This corroborates commercial use of the Unrefined specification independently of whether an offering carries organic wording; it does not establish fulfilled sales or market share. ([newdirectionsaromatics.com](https://www.newdirectionsaromatics.com/blog/prickly-pear-carrier-oil-a-luxurious-treat-for-skin-and-hair))

14. Import Product Information: Prickly Pear Seed Oil

- Taxonomy evidence: The German government-funded import-promotion factsheet identifies direct cosmetic use and incorporation into skin- and hair-care products. Only these commercial application statements are used. ([importpromotiondesk.de](https://www.importpromotiondesk.de/fileadmin/Importeure_Brancheninformation/NI/210617_IPFS_Prickly_pear_seed_oil_final.pdf))
- Taxonomy evidence: The application section identifies moisturizing and skin-care product purposes. ([importpromotiondesk.de](https://www.importpromotiondesk.de/fileadmin/Importeure_Brancheninformation/NI/210617_IPFS_Prickly_pear_seed_oil_final.pdf))
- Taxonomy evidence: The application section separately identifies hair-care formulations as a use class. ([importpromotiondesk.de](https://www.importpromotiondesk.de/fileadmin/Importeure_Brancheninformation/NI/210617_IPFS_Prickly_pear_seed_oil_final.pdf))

15. Is It a Cosmetic, a Drug, or Both? (Or Is It Soap?)

- Taxonomy evidence: FDA explains that intended use distinguishes cosmetics from drugs and that a product can meet both definitions. This supports an explicit allocation rule, not a universal global regulatory designation. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))
- Taxonomy evidence: FDA recognizes cleansing, beautifying, and appearance-related product purposes as cosmetic uses and distinguishes them from therapeutic drug purposes. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))
- Taxonomy evidence: FDA explains that cosmetic/drug combinations must meet both regulatory regimes; cosmetic positioning alone cannot exclude a drug-designated downstream product. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))
- Taxonomy evidence: FDA distinguishes cosmetic massage-oil purposes from therapeutic claims. This is a classification distinction, not evidence of efficacy for prickly pear seed oil. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))

16. Information for Consumers on Using Dietary Supplements

- Taxonomy evidence: FDA states that dietary supplements are not approved for safety and effectiveness before marketing. A commercial supplement claim therefore cannot be treated as product approval. This general rule does not establish seed-oil-specific status. ([fda.gov](https://www.fda.gov/food/dietary-supplements/information-consumers-using-dietary-supplements))
- Taxonomy evidence: The official distinction between supplement marketing and premarket approval supports keeping intended-use identification separate from authorization conclusions. ([fda.gov](https://www.fda.gov/food/dietary-supplements/information-consumers-using-dietary-supplements))

17. Hyatt Regency Casablanca Spa Brochure

- Taxonomy evidence: Hyatt Regency Casablanca's official spa brochure advertises a facial service explicitly using pure prickly pear seed oil. This is demand-side evidence of a professional direct-use setting, not proof of purchased quantities or delivered treatments. ([hyatt.com](https://www.hyatt.com/content/dam/hotel/propertysites/assets/regency/casab/documents/en_us/home/Brochure%20SPA%20English.pdf))
- Taxonomy evidence: The advertised facial service supplies a professional skin-care use example. Treatment fees are outside the oil-only revenue boundary. ([hyatt.com](https://www.hyatt.com/content/dam/hotel/propertysites/assets/regency/casab/documents/en_us/home/Brochure%20SPA%20English.pdf))

18. Face Soap - Sand Rarity

- Taxonomy evidence: Sand Rarity's official Face Soap record describes a face-cleansing product and explicitly declares Opuntia ficus-indica seed oil. This corroborates a downstream personal-cleansing application without counting finished-soap revenue. ([sandrarity.com](https://www.sandrarity.com/en/product/savon-visage/))
- Taxonomy evidence: The product declaration establishes an example of seed-oil incorporation into a commercially offered cosmetic formulation; it does not disclose the oil purchaser or procurement volume. ([sandrarity.com](https://www.sandrarity.com/en/product/savon-visage/))

19. Sweet Talk Lip Oil - Monika Blunder Beauty

- Taxonomy evidence: Monika Blunder Beauty's Sweet Talk Lip Oil is marketed as lip makeup in multiple shades and explicitly declares prickly pear seed oil. It corroborates decorative-cosmetics use, not sales of the oil input. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
- Taxonomy evidence: The downstream product's ingredient declaration demonstrates incorporation into a makeup formulation, while leaving the actual oil-purchasing entity and quantities unidentified. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

20. Grounded for Hands - Kehleia

- Taxonomy evidence: Kehleia's Grounded for Hands is explicitly offered as nail-and-cuticle oil and declares Opuntia ficus-indica seed oil. The page contains sold-out labeling, so it supports a category example rather than continuous availability. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
- Taxonomy evidence: The brand states that this downstream preparation is made in-house, corroborating a formulator role for this specific offering without establishing purchased seed-oil quantities. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))

21. Organic Prickly Pear Seed Oil - Byron Bay Love Organics

- Taxonomy evidence: Byron Bay Love Organics' specific seed-oil page expressly promotes dietary-supplement use alongside skin-care uses. This is company-advertised positioning only; it does not establish an authorized supplement label, efficacy, or completed ingestion-related sales. ([byronbayloveoils.com.au](https://byronbayloveoils.com.au/pages/organic-prickly-pear-seed-oil))

22. Regenerating Mask with Rare Prickly Pear Oil - Christophe Robin

- Taxonomy evidence: A specific Christophe Robin hair-mask catalog version explicitly declares Opuntia ficus-indica seed oil. The inspected page is marked out of stock; it corroborates a formulated hair-care application but not current sales or every product version. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

23. Reinforce Shampoo Prickly Pear - Levia

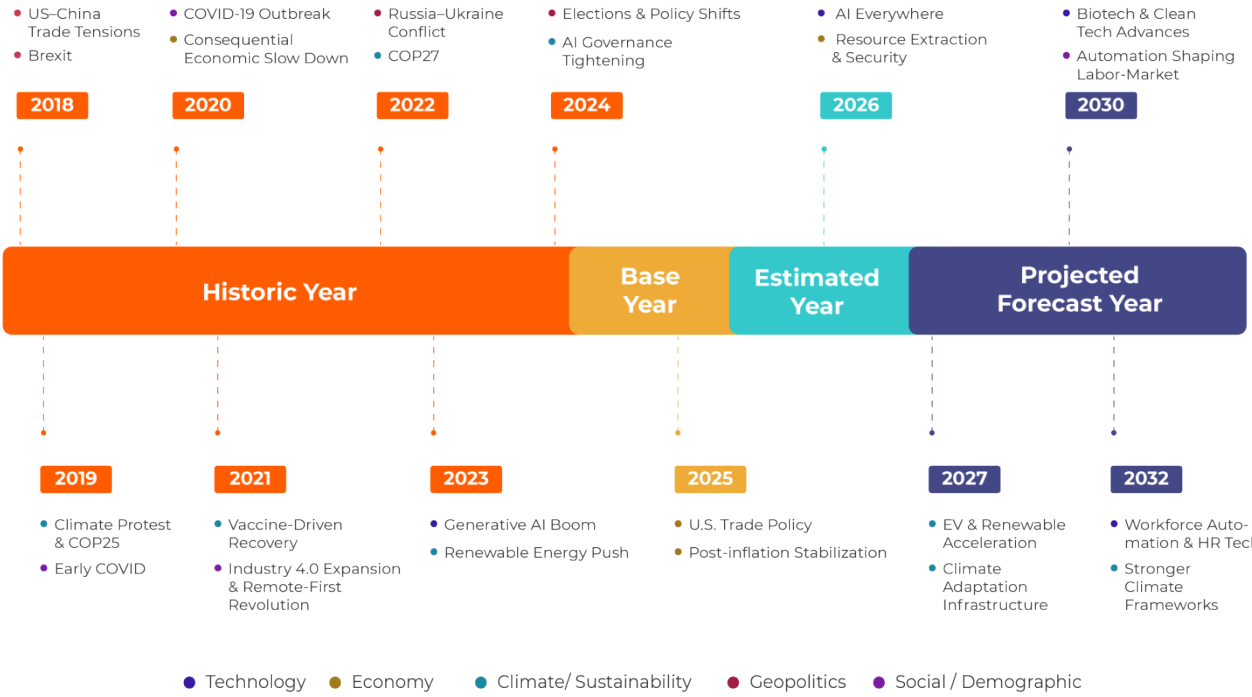
- Taxonomy evidence: Levia's Reinforce Shampoo description refers to prickly pear oil, but its declared ingredient list identifies Opuntia vulgaris extract rather than seed oil. This record cannot independently establish in-scope seed-oil consumption and illustrates the need for product-identity checks. ([levia-paris.fr](https://www.levia-paris.fr/?product=reinforce-shampoo-prickly-pear-500ml))

24. COSMOS CERTIFIED - Certified raw materials database
    - Taxonomy evidence: The inspected certified-raw-material database contains multiple prickly pear seed-oil records with named certifying bodies, establishing certified commercial ingredient entries rather than merely organic marketing terminology. It does not establish fulfilled sales. ([cosmos-standard.org](https://www.cosmos-standard.org/en/databases/certified-raw-materials/?page=xx.xx))
    - Taxonomy evidence: The listed prickly pear seed-oil entries explicitly use Opuntia ficus-indica seed-oil ingredient declarations. ([cosmos-standard.org](https://www.cosmos-standard.org/en/databases/certified-raw-materials/?page=xx.xx))
25. Opuntia ficus-indica (L.) Mill. - Plants of the World Online
    - Taxonomy evidence: The botanical record accepts Opuntia ficus-indica as a species. This establishes nomenclatural identity, not commercial volume or product authorization. ([powo.science.kew.org](https://powo.science.kew.org/taxon/xx.xx-xx.xx))
26. Opuntia stricta (Haw.) Haw. - Plants of the World Online
    - Taxonomy evidence: The botanical record accepts Opuntia stricta as a species, supporting its distinct normalized identity without establishing trade quantities. ([powo.science.kew.org](https://powo.science.kew.org/taxon/xx.xx-xx.xx))
27. Opuntia tuna (L.) Mill. - Plants of the World Online
    - Taxonomy evidence: The accepted-species record lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms of Opuntia tuna. This supports explicit synonym normalization rather than overlapping botanical siblings. ([powo.science.kew.org](https://powo.science.kew.org/taxon/urn%3Alsid%3Aipni.org%3Anames%3A137125-xx.xx))
    - Taxonomy evidence: Opuntia tuna is accepted in the inspected botanical backbone. Its synonym mapping supplies nomenclatural support only; commercial participation must be established separately. ([powo.science.kew.org](https://powo.science.kew.org/taxon/urn%3Alsid%3Aipni.org%3Anames%3A137125-xx.xx))
28. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Taxonomy evidence: A dedicated commercial seed-oil page uses both Opuntia dillenii seed oil and Opuntia stricta var. dillenii for its advertised offering. Combined with the botanical synonym record, allocation to Opuntia tuna is an explicit analytical inference, not evidence of fulfilled sales or material global demand. ([saharome.com](https://saharome.com/vegetable-oils/prickly-pear-o%CF%89ega6-seed-oil/))

1.4. Years Considered for the Study

The study identifies 2024 as the historical year, 2025 as the base year, 2026 as the estimated year, and 2032 as the forecast year. These roles distinguish historical and base-year conditions from estimated-year assessments and the outlook to 2032.

Figure 1. Global Prickly Pear Seed Oil Market, Years Considered for the Study



1.5. Currency Considered for the Study

The reporting currency is the U.S. dollar (USD). Monetary market values are expressed on an absolute basis.

1.6. Language Considered for the Study

The study is published in U.S. English, with consistent commercial terminology for Prickly Pear Seed Oil and its accepted segmentation categories.

1.7. Key Stakeholders

- Oil suppliers and processors: decisions concerning documented product identity, offering scope, buyer qualification, delivery commitments, and the distinction between their own capabilities and those of commercial partners.
- Growers and seed suppliers: exposure to upstream sourcing relationships, origin documentation, and continuity commitments, while remaining distinct from the studied oil offering.
- Manufacturers and Formulators: decisions concerning oil qualification, application-specific documentation, supplier switching, certification compatibility, and continuity of supply.
- Professional Service Providers: decisions concerning supplier suitability, packaged-oil selection, service requirements, and the commercial responsibilities associated with professional purchasing.

- Individuals and Households: purchasing decisions concerning standalone packaged oil, product identity, certification representations, labeling, and seller commitments.
- Ingredient Distributors and Wholesalers: decisions concerning supplier representation, territorial rights, documentation transfer, customer qualification, and service obligations.
- Retailers: decisions concerning product listings, supplier relationships, consumer-facing representations, and the responsibilities attached to Consumer Packaging.
- Regulatory and certification organizations: relevance to the product, claim, certification, and jurisdictional conditions that buyers and suppliers must distinguish from general market-category inclusion.
- Prospective entrants, business owners, and investors: decisions concerning verifiable capabilities, access barriers, distribution relationships, and the conditions that must hold before committing resources.

2. Research Methodology

2.1. Introduction

The study frames Prickly Pear Seed Oil as a Global commercial offering supplied to business, professional, and household buyers. Its approach separates documented business facts from economic interpretation while retaining all accepted refinement, application, end-user, packaging, channel, certification, and botanical-source categories.

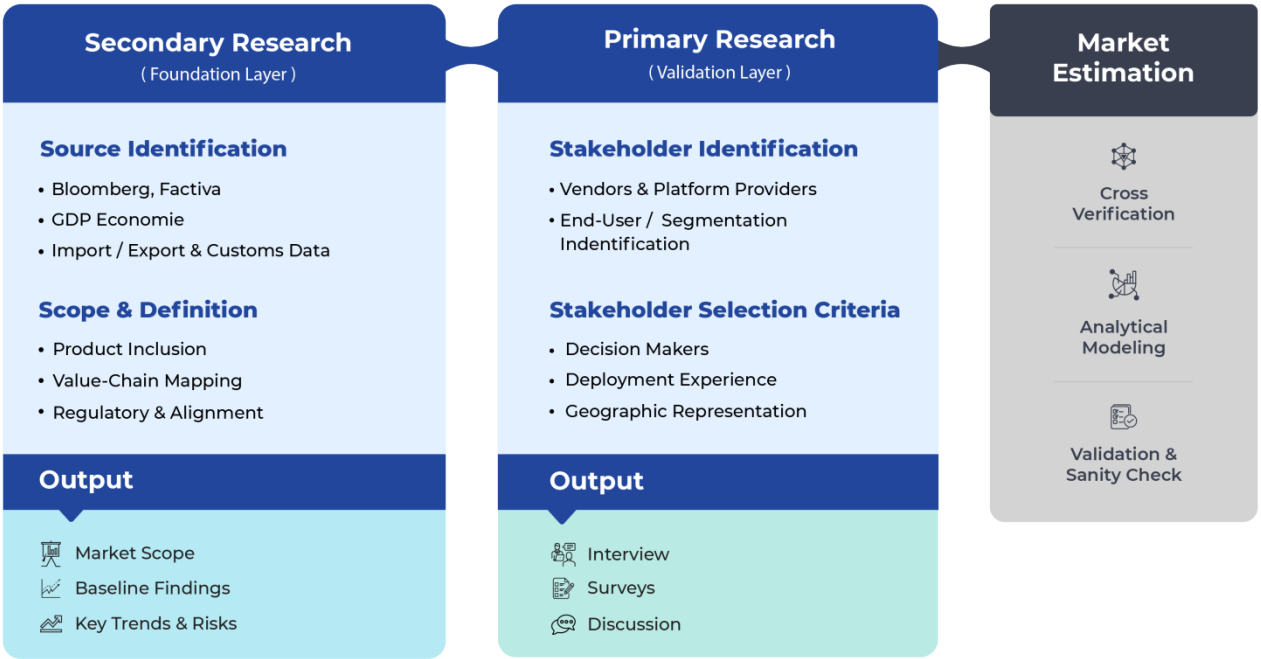
The central analytical requirement is to connect each conclusion to the exact offering, buyer relationship, territory, and period it concerns. Market mechanisms are interpreted through qualification, access, distribution, competition, and buyer economics rather than inferred from botanical or application labels alone.

2.2. Research Design

The design assigns each business question an appropriate evidence role. An offering record can establish advertised product scope; a regulatory record can establish a specified legal status; and a filing, agreement, or dated business disclosure can establish a commercial relationship within its stated coverage. These roles do not establish facts beyond the record's product, territory, period, or contractual scope.

Coverage follows the accepted Prickly Pear Seed Oil hierarchy and Global boundary. Comparisons distinguish the oil offering, the organization selling it, the channel through which it is supplied, and the buyer using it. Conflicting descriptions require reconciliation at that level before they support a competitive interpretation.

Figure 2. Global Prickly Pear Seed Oil Market, Research Design



2.2.1. Primary Research

The analyst team conducted primary research as a qualitative challenge layer for market definition, segmentation, demand conditions, adoption barriers, and competitive interpretation. This work tested analytical assumptions and sharpened explanations of market mechanisms without serving as standalone support for numerical estimates.

The qualitative challenge layer is evaluated alongside secondary evidence within the accepted market scope. It informs conditional market explanations and hypotheses for subsequent quantitative analysis. Numerical estimates require their own supporting evidence, and a forecast derived from a qualitative assumption does not independently validate that assumption. Final interpretation must reconcile the qualitative findings with the completed quantitative results.

2.2.2. Secondary Research

Secondary evidence is interpreted according to the commercial fact it can establish. Official portfolios and dated company materials are relevant to advertised offerings, packaging, service commitments, and distribution relationships. Mandatory filings and public agreements are relevant to disclosed ownership and business rights. Regulatory and certification records are relevant to the exact product, holder, jurisdiction, and effective period they cover; public purchasing records can establish stated buyer conditions.

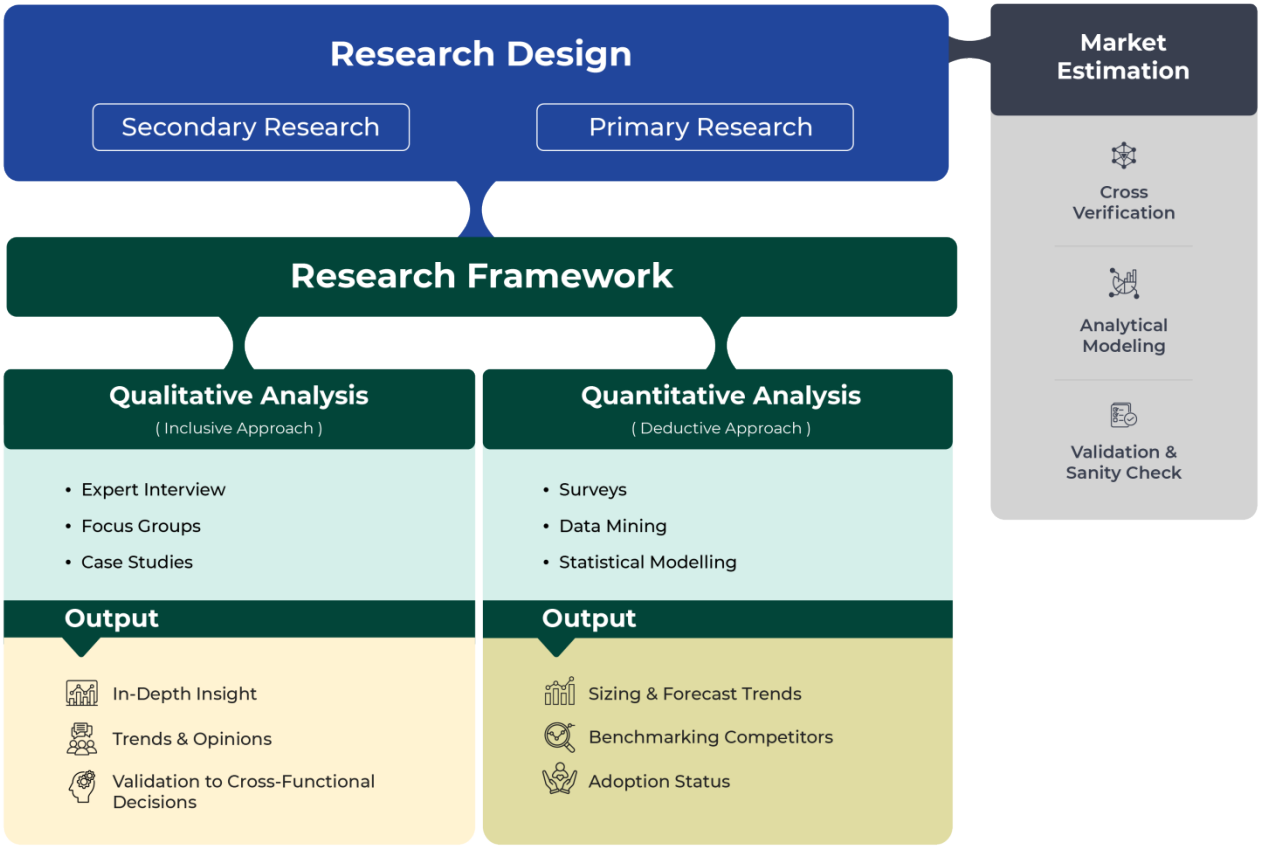
Broader botanical, cosmetic-ingredient, or trade classifications require a demonstrable connection to Prickly Pear Seed Oil before supporting an oil-specific conclusion. Repeated publication of the same underlying announcement does not create independent corroboration, and a supplier's description of its own offering does not independently establish buyer adoption or competitive superiority.

2.3. Research Framework

The framework connects the market definition and accepted taxonomy to a documented universe of offerings, suppliers, commercial relationships, and buyers. It then links comparable business evidence to qualification requirements, access conditions, competitive alternatives, and the choices facing market participants.

Offering-level capability is kept separate from company identity and unrelated portfolio breadth. Strategic interpretations must identify what a participant contributes, which rights or commitments support that role, and what remains conditional before a buyer, distributor, or prospective entrant can rely on it.

Figure 3. Global Prickly Pear Seed Oil Market, Research Framework



2.3.1. Qualitative Analysis

Qualitative analysis examines how product documentation, traceability, certification, delivery commitments, and channel responsibilities could affect supplier qualification, switching effort, and bargaining. It distinguishes the purchasing considerations of Manufacturers and Formulators from those of Professional Service Providers and Individuals and Households.

Commercial differentiation is assessed through documented offering attributes and buyer requirements rather than assumed benefits of a botanical name, refinement category, or certification label. Buyer economics are interpreted through qualification effort, service needs, sourcing exposure, and positioning, with alternatives and counterforces stated explicitly.

2.3.2. Quantitative Analysis

The quantitative frame preserves USD reporting on an absolute basis and distinguishes the historical, base, estimated, and forecast-year roles. Any monetary observation must match the oil offering, commercial activity, geography, and period it is used to describe. A broader supplier business or finished-product category is not interchangeable with Prickly Pear Seed Oil activity.

The segmentation axes are independent classifications of potentially overlapping activity. Classification by application, buyer, packaging, channel, certification, refinement, or botanical

source does not create additional activity to be added across axes. Any attribution requires its own supporting evidence rather than an inference from category membership.

2.4. Market Size Estimation

A defensible market estimate must retain the boundary around Prickly Pear Seed Oil rather than the full value of the crops, equipment, finished goods, or services associated with it. It must state which commercial activity its valuation represents so that transfers through suppliers, intermediaries, and consumer outlets are not automatically combined.

Global coverage and all accepted categories remain within the study perimeter. Their inclusion does not itself establish documented commercial activity or justify a numerical allocation. Qualitative explanations can identify relevant conditions, but numerical conclusions require evidence appropriate to the exact activity being measured.

2.4.1. Top-Down Approach

The top-down analytical role is to test whether a broader commercial total has a product, transaction, geography, and period boundary relevant to Prickly Pear Seed Oil. Broader cactus-derived-product, vegetable-oil, or cosmetic-ingredient activity cannot be assigned to this market merely because an application or supplier overlaps.

Any narrower attribution requires a documented connection to the studied oil. A shared botanical origin, downstream application, or company affiliation is not a sufficient basis for allocating broader activity among the accepted categories.

2.4.2. Bottom-Up Approach

The bottom-up analytical role is to connect identifiable, in-scope oil offerings with business evidence attributable to those offerings. A supplier name, product listing, or broad botanical portfolio does not by itself support aggregation. Evidence must distinguish standalone Prickly Pear Seed Oil from unrelated oils, blended finished goods, and other supplier activities.

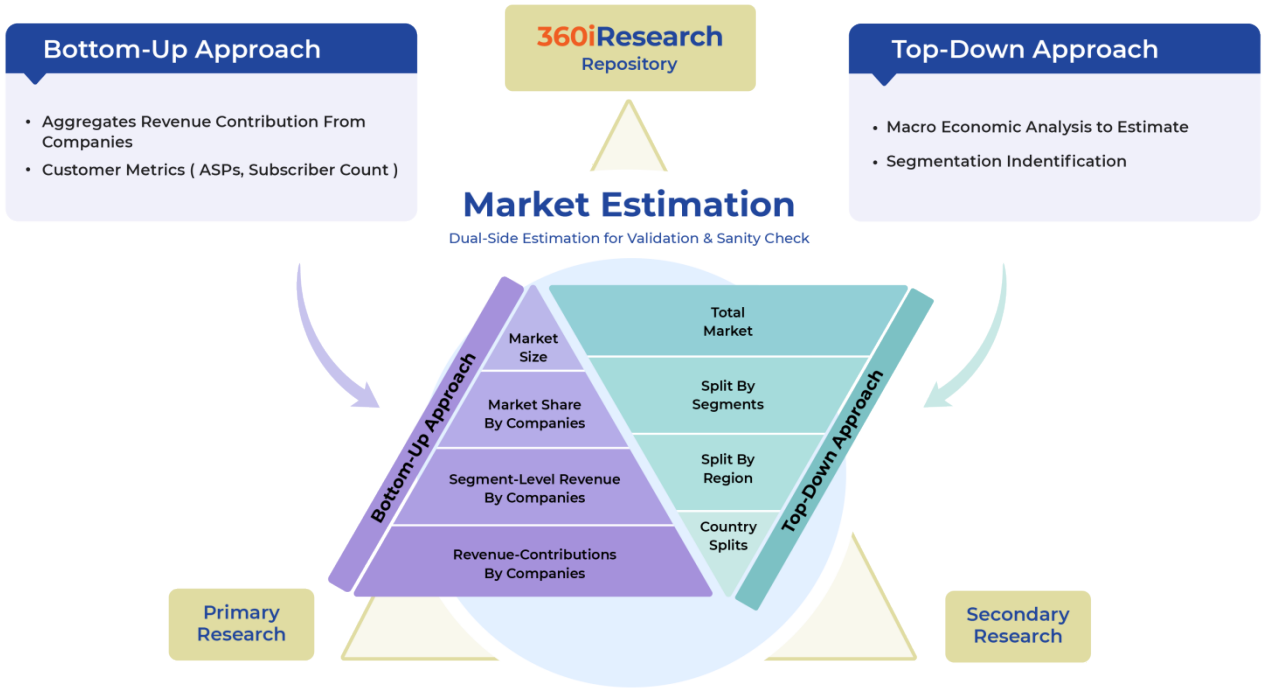
Relationships among producers, brand owners, distributors, and retailers must also be distinguished before combining business observations. Multiple descriptions of the same oil at successive commercial stages are not automatically independent contributions.

2.5. Data Triangulation

Evidence reconciliation is claim-specific. Product identity, buyer role, channel function, jurisdiction, and period must align before separate records can corroborate the same proposition. Sources derived from one underlying disclosure are treated as a shared evidence path rather than independent confirmation.

Differences between an advertised offering, a certification record, a legal authorization, and evidence of commercial participation are retained rather than averaged into a single assertion. Qualitative explanations can help interpret these differences, but they do not replace independent support for numerical conclusions or establish that an announced capability has been adopted.

Figure 4. Global Prickly Pear Seed Oil Market, Data Triangulation



2.6. Research Outcomes

The intended outcome is a defensible basis for evaluating Prickly Pear Seed Oil suppliers, customer relationships, and routes to market. Decision support addresses offering identity, buyer qualification and switching, application-specific access, certification positioning, and the responsibilities attached to direct and intermediated relationships.

Conclusions should identify the documented commercial condition, its economic significance, the prerequisites for acting on it, and the circumstances that could change the decision. Category inclusion, an advertised offering, and demonstrated buyer acceptance remain distinct propositions.

2.7. Research Assumptions

- Commercial comparisons assume that the documented Botanical Source and Refinement Status describe the exact oil offering under consideration. A seller's name or broader botanical portfolio is not treated as sufficient evidence of product identity or equivalence.
- Organic Certification Status is attributed to the documented offering and applicable certification scope. Certification associated with another product or a broader organization is not assumed to cover the oil being compared.
- Geographic participation is interpreted within documented supply or distribution coverage. The Global study boundary does not assume that every supplier, retailer, or packaged oil is available in every jurisdiction.

- Commercial roles and rights are attributed separately. Identification as a distributor, retailer, formulator, or brand owner does not by itself establish ownership of the oil source, exclusivity, or control over upstream supply.
- Forward-looking commercial interpretations remain conditional on the access conditions, certification scope, buyer requirements, and business relationships supporting them. Changes in those conditions can alter supplier suitability or the feasibility of a route to market.

2.8. Research Limitations

- An advertised product or channel does not by itself establish completed transactions, buyer acceptance, or continuing delivery. Where these distinctions affect supplier qualification or market entry, commitment requires confirmation of the exact offering and territory.
- Presence in an Application category does not establish authorization, permitted claims, efficacy, or adoption. Commercial access depends on the exact offering, intended use, and jurisdiction; evidence from another application is not automatically transferable.
- Where business disclosures combine Prickly Pear Seed Oil with other oils, ingredients, or finished products, they do not support an oil-specific attribution unless the relevant activity can be separated on a documented basis.
- Where public descriptions of commercial relationships do not state exclusivity, territorial restrictions, private-label rights, or service obligations, they support only the disclosed relationship. They do not establish that another participant can obtain equivalent access.
- Refinement Status, Botanical Source, and Organic Certification Status are classification categories rather than purchasing-equivalence standards. Evidence concerning one category does not establish substitutability or a buyer's willingness to switch to another.

3. Executive Summary

3.1. Introduction

The Global Prickly Pear Seed Oil market is organized around qualified purchasing relationships rather than a single interchangeable commercial proposition. SOPHIM's cosmetic ingredient and Leven Rose's standalone packaged oil illustrate different buying objects: ingredient acceptance and a completed consumer offering. Access depends on whether the exact oil, required records and seller obligations fit the buyer's role and destination. A portfolio listing alone establishes neither adoption nor continuing delivery.

Cosmetics and Personal Care provides documented manufacturer-facing contexts beyond household standalone oil, but conversion requires an active purchasing brief and accepted commitments. Direct supply and intermediary coordination allocate commercial work differently, while certification and finished-cosmetic responsibilities impose separate eligibility conditions. The decisive competitive question is whether an alternative preserves the buyer's product promise and supplies the required commitments-not simply whether another oil appears in a catalog.

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   · Leven Rose markets a standalone Unrefined prickly pear seed oil for external use, supporting a consumer-product purchasing example distinct from ingredient procurement. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
2. Prickly pear seed oil | SOPHIM
   · SOPHIM identifies a cosmetic seed-oil ingredient, lists skin, hair and nail-care contexts, and offers documentation and commercial contact. These establish offered purchasing contexts, not adoption. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
3. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
   · USDA's organic cosmetic framework requires certification of relevant agricultural ingredient operations, handlers and the finished-product manufacturer, supporting a separate eligibility condition. ([ams.usda.gov](https://www.ams.usda.gov/grades-standards/cosmetics-body-care-and-personal-care-products))
4. Legislation - Cosmetics | European Commission
   · The EU framework requires a designated EU responsible person and a safety report before cosmetic market placement, establishing responsibilities separate from ingredient purchasing. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
5. Entering the European market for prickly pear seed oil for cosmetics | CBI
   · CBI describes intermediary documentation coordination while retaining the supplier's obligation to provide records, supporting distinct allocations of commercial work. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

3.2. CXO Perspective

For procurement leaders, resilience means qualifying a replacement relationship, not merely adding storefronts. INKY identifies O&xx.xx as its parent, so its Refined listing does not establish

independently controlled supply. Buyers should distinguish the contracting seller from the upstream source and preserve accepted identity, certification and destination commitments. Suppliers seeking these accounts need an identifiable acceptance gap: Jedwards' standard document handover after dispatch creates one only where the buyer requires earlier approval and the seller agrees an exception.

For brand owners and capital allocators, certification and own-label expenditure should follow a defined buyer requirement rather than presumed preference. USDA's organic framework covers relevant ingredient operations, handlers and the finished-product manufacturer. EU finished cosmetics require an EU responsible person; applicable U.S. MoCRA registration and listing duties require separate allocation, with exemptions considered and no implication of FDA approval. Existing-label resale remains an alternative when proprietary positioning does not justify the additional responsibilities.

Sources & Evidence

1. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
   · USDA describes certification across relevant ingredient operations, handling and final-product manufacture. Investing against a defined buyer requirement is a conditional commercial implication, not evidence of universal preference.
   ([ams.usda.gov](https://www.ams.usda.gov/grades-standards/cosmetics-body-care-and-personal-care-products))
2. Legislation - Cosmetics | European Commission
   · Only cosmetics with a designated responsible person within the EU may be placed on its market; this supports explicit assignment of finished-product responsibilities.
   ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
3. Registration & Listing of Cosmetic Product Facilities and Products | FDA
   · FDA describes MoCRA registration and listing responsibilities, the label-based responsible-person definition and specified exemptions. Registration and listing do not indicate FDA approval.
   ([fda.gov](https://www.fda.gov/cosmetics/registration-listing-cosmetic-product-facilities-and-products))
4. Prickly Pear Seed Oil, Refined | INKY Ingredients
   · INKY's Refined seed-oil page identifies O&xx.xx as its parent and directs buyers to matched O&xx.xx documentation. This establishes affiliation, not upstream-source independence.
   ([inky-ingredients.com](https://inky-ingredients.com/products/prickly-pear-seed-oil-refined))
5. Vous êtes un professionnel - Comptoir des Huiles
   · Comptoir des Huiles directs professional buyers to Ankorstore and Faire and separately invites private-label enquiries, supporting resale as an alternative commercial role.
   ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
6. Third-Party Certifications | Jedwards International
   · Jedwards states that certificates of analysis accompany shipment notices emailed the morning after dispatch. Other enquiries are accepted, without a promised pre-dispatch exception.
   ([bulknaturaloils.com](https://bulknaturaloils.com/certificates))

3.3. New Revenue Opportunities

Selective revenue routes center on active cosmetic ingredient briefs, Professional Service Providers' distinct consumption and resale needs, and separately contracted own-label or branded-resale accounts. ZINEGLOB's private-label offer and PUREZA's sourcing disclosure provide a concrete brand-entry lead, not transferable rights or demonstrated unmet demand.

As detailed in Opportunity Mapping, capture depends on the named purchasing principal, exact offer and destination commitments. Food and Beverages and Dietary Supplements remain product-specific access questions; Pharmaceuticals has a documented inactive-ingredient example, not an established standalone therapeutic opportunity.

Sources & Evidence

1. Prickly pear seed oil | SOPHIM
   · The named ingredient and account-support routes support screening active cosmetic briefs; the listing does not demonstrate an unmet buyer requirement or willingness to switch. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
2. Novel Food | European Commission
   · The EU novel-food framework requires premarket authorization where applicable. The general framework does not establish the legal status of a particular studied oil. ([food.ec.europa.eu](https://food.ec.europa.eu/food-safety/novel-food_en))
3. New Dietary Ingredient Notification Process | FDA
   · FDA describes notification obligations for manufacturers and distributors marketing supplements containing new dietary ingredients. This does not determine a particular seed-oil offering's status. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
4. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
   · DailyMed lists Opuntia ficus-indica seed oil as inactive in Eminence Daily Defense Tinted SPF and identifies the finished product as an OTC Monograph Drug. The record does not establish an available oil-supply appointment. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
5. Hyatt Regency Casablanca Spa Brochure
   · Hyatt Regency Casablanca's undated brochure advertises a facial service involving pure prickly pear seed oil. It establishes a professional consumption setting, not continuing procurement or a supplier appointment. ([hyatt.com](https://www.hyatt.com/content/dam/hotel/propertysites/assets/regency/casab/documents/en_us/home/Brochure%20SPA%20English.pdf))
6. Vous êtes un professionnel - Comptoir des Huiles
   · The professional page establishes advertised resale and private-label enquiry routes, not an oil-specific appointment, active professional purchasing requirement or destination commitment. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
7. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   · ZINEGLOB's oil page advertises private-label services and support for cosmetic brands and distributors. These are sourcing leads rather than entrant-specific rights or accepted commitments. ([zineglob.com](https://zineglob.com/products/prickly-pear-moisturizing-oil?search=top-products))
8. Prickly Pear Seed Oil Canada - Organic Moroccan Face Oil | PUREZA
   · PUREZA identifies ZINEGLOB SARL as its prickly pear seed-oil source. The buyer-published connection corroborates a sourcing relationship, not transferable terms or exclusivity. ([pureza.ca](https://pureza.ca/products/pureza-prickly-pear-seed-oil-30ml))

3.4. Next-Generation Business Models

A service-backed ingredient contract is a conditional commercial route: an intermediary can coordinate documentation and delivery while the exporter remains responsible for supplying underlying records. Its value depends on written obligations addressing an actual access burden. Direct manufacturer supply remains an alternative when the parties can manage those responsibilities themselves. Buyer-timed document handover is a potential service distinction, but a standard enquiry route does not establish an agreed exception.

For consumer-facing commercialization, ZINEGLOB's advertised private-label service and Comptoir des Huiles' professional resale routes illustrate different allocations of brand control. Own-label participation adds packaging, record and market-placement commitments; resale preserves an existing proposition with less control over positioning. Certification continuity is another contract-dependent service proposition. The September 2025 COSMOS guidance distinguishes repacking or replacement of the manufacturer's label from unchanged material retaining that label. Presentation flexibility therefore requires the applicable certification relationship rather than an assumption that upstream recognition transfers automatically.

Sources & Evidence

1. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
   · The September 2025 COSMOS guide distinguishes distributor repacking or removal of the manufacturer's label from unchanged material retaining that label, with different ingredient-certification consequences. This supports arrangement-specific continuity rather than automatic transfer. ([media.cosmos-standard.org](https://media.cosmos-standard.org/filer_public/xx.xx/a2/43a20531-d35d-46c2-xx.xx-50a4f145d2b1/cosmos-standard_technical_guide_v4-xx.xx.pdf))
2. Legislation - Cosmetics | European Commission
   · EU responsible-person and premarket safety-report requirements support treating market placement as an additional commitment in own-label commercialization, not an automatic ingredient-supplier service. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
3. Entering the European market for prickly pear seed oil for cosmetics | CBI
   · CBI's European entry guidance distinguishes intermediary coordination from supplier record provision and describes direct manufacturer sourcing. Preferring either route remains conditional on the obligations the parties can meet. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
4. Vous êtes un professionnel - Comptoir des Huiles
   · The separate professional resale and private-label routes support comparing brand control and retained responsibilities without treating an enquiry as an executed agreement. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
5. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   · The advertised private-label service establishes an option for investigating own-label commercialization, without demonstrating another brand's appointment or contractual responsibilities. ([zineglob.com](https://zineglob.com/products/prickly-pear-moisturizing-oil?search=top-products))
6. Third-Party Certifications | Jedwards International
   · The disclosed post-dispatch document sequence supports a conditional buyer-timed service proposition where earlier acceptance is required; the enquiry route does not establish an agreed exception. ([bulknaturaloils.com](https://bulknaturaloils.com/certificates))

3.5. Industry Roadmap

For 2026-2027, continuity of qualified cosmetic accounts is the immediate priority. AOT GmbH's oil-specific COSMOS certificate states validity through January xx.xx 2027; later commitments relying on that recognition require renewed applicable evidence. Aromantic Limited entered administration on September xx.xx 2026, creating a separate need to confirm the entity accepting new orders and obligations. These are qualification gates, not evidence of an oil shortage or cessation of every associated brand.

For 2028-2029, staged territorial extension remains conditional on distributor appointments and assigned responsibilities. EU centralized notification removes repeat national notification but does not establish retailer acceptance or delivery coverage. Brands should extend an already supported packaged-cosmetic proposition only after agreeing territorial duties, record access, replenishment and complaint ownership. Narrower appointments remain preferable where a regional partner cannot demonstrate its remit.

For 2030-2032, Food and Beverages, Dietary Supplements and Pharmaceuticals remain separate intended-use decisions, not scheduled expansions. EU novel-food authorization and U.S. new-dietary-ingredient notification apply where their respective conditions are met. DailyMed's Eminence Daily Defense Tinted SPF label documents an inactive seed-oil role, not permission for a standalone therapeutic oil. Definitive intended-use status and an accepted buyer relationship are the commercial triggers; unresolved access favors deferring dedicated expansion expenditure.

Sources & Evidence

1. Legislation - Cosmetics | European Commission
   · The EU framework combines centralized notification with defined responsible-person obligations, supporting territorial planning that retains accountable actors.
   ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
2. Cosmetic product notification portal | European Commission
   · The Commission states that CPNP notification removes further national notification within the EU and identifies responsible-person and specified distributor submissions. This administrative framework does not establish a commercial appointment or delivery coverage.
   ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/cosmetic-product-notification-portal_en))
3. Novel Food | European Commission
   · Novel foods require premarket authorization; applying that requirement to the exact oil remains an offering-specific access determination rather than a consequence of the planning horizon.
   ([food.ec.europa.eu](https://food.ec.europa.eu/food-safety/novel-food_en))
4. New Dietary Ingredient Notification Process | FDA
   · The U.S. new-dietary-ingredient notification obligation is conditional on applicability to the proposed supplement; cosmetic participation does not establish that determination.
   ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
5. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
   · The named drug label documents a narrower inactive-ingredient application, not therapeutic activity of the oil or permission for a separate standalone therapeutic offering.
   ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
6. IONC COSMOS CERTIFIED Certificate - AOT GmbH
   · The IONC certificate names AOT GmbH, lists organic Prickly Pear Seed Oil at COSMOS CERTIFIED level, and states validity from January xx.xx 2026, through January xx.xx 2027. It does not establish future renewal.
   ([aot.de](https://www.aot.de/files/content/Zertifikate/cosmos-certified.pdf))
7. AROMANTIC LIMITED - Insolvency | Companies House
   · Companies House records Aromantic Limited's administration beginning September xx.xx 2026. This establishes the legal event, not a replacement operator, continuing oil supply or cessation of every associated brand.
   ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/SC299277/insolvency))

4. Market Overview

4.1. Introduction

The Global Prickly Pear Seed Oil market contains two distinct buying objects: an ingredient purchased for incorporation into another product and a standalone packaged oil purchased for use or resale. ▪▪▪ ▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ These portfolio examples establish different commercial relationships, not purchasing equivalence, completed transactions, or suitability for every application.

Manufacturers and Formulators, Professional Service Providers, and Individuals and Households consequently face different acceptance conditions. ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ The central commercial question is whether a specifically identified oil, its documentation, and its seller's obligations fit the intended buyer and jurisdiction.

Figure 5. Global Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million, Growth %)

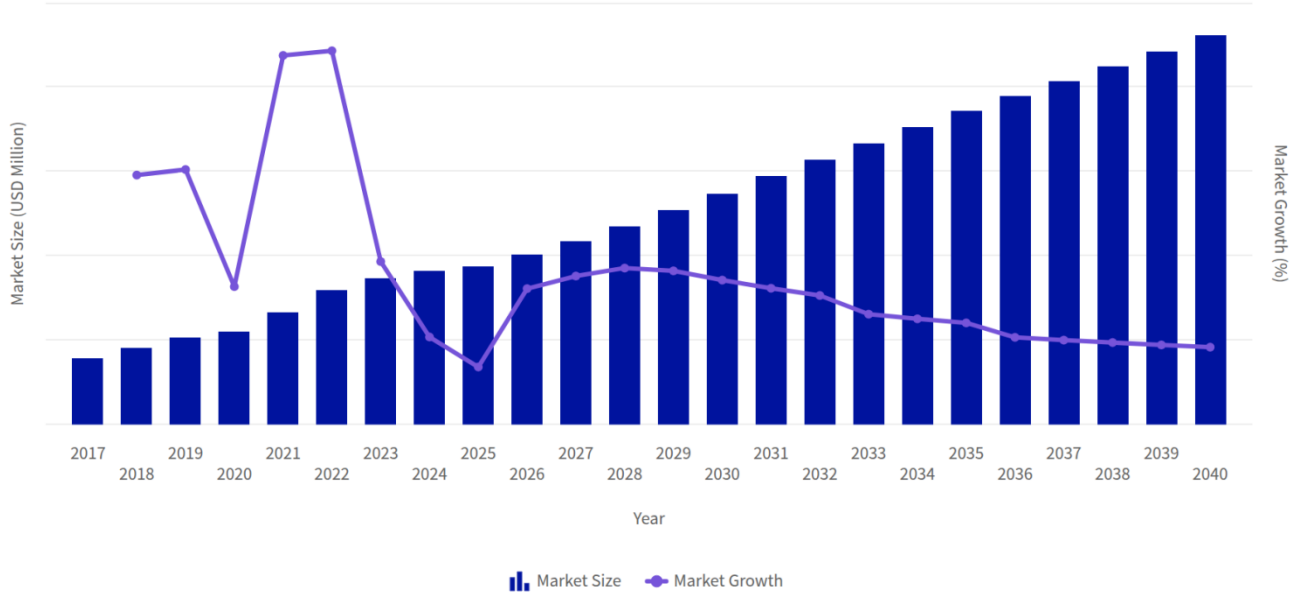


Table 2. Global Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million, Growth %)

Metric	2017	2024	2025	2026	2027	2032	2040
Market Size (USD Million)	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Market Growth (%)	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Sources & Evidence

1. Prickly Pear Seed Oil, Refined - O&3
   · O&xx.xx lists a Refined Prickly Pear Seed Oil ingredient with enquiry and sample-request routes. ([oand3.com](https://www.oand3.com/product/prickly-pear-seed-oil-refined/))
2. Prickly Pear Cactus Seed Oil - Leven Rose
   · Leven Rose markets a standalone oil identified as Unrefined and intended for external use. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
5. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
7. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
8. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
10. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
12. Entering the European market for prickly pear seed oil for cosmetics | CBI
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

4.2. Key Growth Contribution

Prickly Pear Seed Oil can reach additional purchasing occasions when an identified cosmetic ingredient is accepted into a named buyer's product brief. SOPHIM's skin, hair and nail-care offering and O&xx.xx's documentation routes establish commercial entry points beyond standalone household oil. Serving them requires account support that preserves the exact declaration and delivers required records at the agreed approval stage. Application listings are not purchasing commitments, and an incumbent with already accepted records can remain preferable to an unqualified new offer.

Figure 6. Global Prickly Pear Seed Oil Market, Key Growth Contribution, by Region, 2025-2032 (USD Million)

Figure 7. Global Prickly Pear Seed Oil Market, Key Growth Contribution, by Country, 2025-2032 (CAGR %)

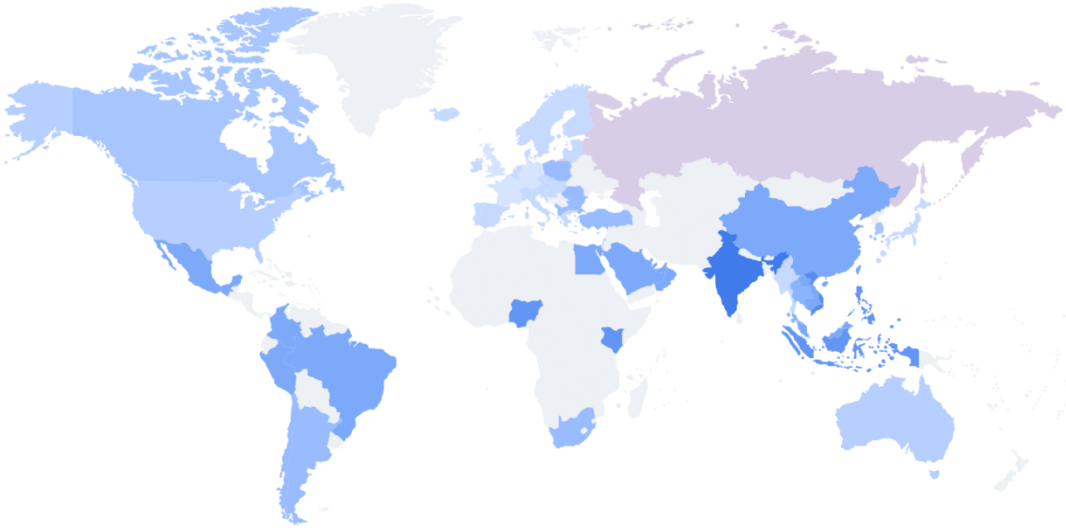


Table 3. Global Prickly Pear Seed Oil Market, Key Growth Contribution, 2025-2032

Scope	Leading Category	Added Market Size (USD Million)	Growth Share (%)	CAGR (%)
Application	xx.xx	xx.xx	xx.xx	xx.xx
Botanical Source	xx.xx	xx.xx	xx.xx	xx.xx
Country	xx.xx	xx.xx	xx.xx	xx.xx
End User	xx.xx	xx.xx	xx.xx	xx.xx
Organic Certification Status	xx.xx	xx.xx	xx.xx	xx.xx
Refinement Status	xx.xx	xx.xx	xx.xx	xx.xx
Region	xx.xx	xx.xx	xx.xx	xx.xx
Sales Channel	xx.xx	xx.xx	xx.xx	xx.xx
Supply Format	xx.xx	xx.xx	xx.xx	xx.xx

Sources & Evidence

1. Prickly pear seed oil | SOPHIM

   · SOPHIM identifies skin, hair and nail-care contexts and provides documentation and commercial-contact routes; these are offered purchasing contexts, not demonstrated adoption. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

2. Prickly Pear Seed Oil, Cold Pressed - O&3

   · O&xx.xx's named seed-oil ingredient has a specific declaration and document-access route, supporting buyer-specific commercial qualification. ([oand3.com](https://www.oand3.com/product/prickly-pear-seed-oil-cold-pressed/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

3. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
4. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

5. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.

6. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

7. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.

8. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canisters and drums corroborate ingredient-handling presentations. The guidance does not disclose their annual global sales value.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canisters and drums corroborate ingredient-handling presentations. The guidance does not disclose their annual global sales value.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Retail oil bottles of xx.xx xx.xx and xx.xx mL corroborate completed standalone presentations, not their global purchased mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Retail oil

9. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

10. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
11. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
12. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

13. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
14. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
15. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
16. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.

17. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
18. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
19. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
20. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
21. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

22. European Commission - Frequently asked questions on organic rules - March 19, 2025
· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
23. New Dietary Ingredient Notification Process | FDA
· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
24. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

25. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
26. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
27. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

28. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
29. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
30. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
31. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

32. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.
33. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
34. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
35. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.

36. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
37. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.
38. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
39. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
40. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
41. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.

42. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.

43. PhileoL - Huile de pépins de Figue de Barbarie
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

44. The European market potential for prickly pear seed oil for cosmetics | CBI
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

4.3. Industry Ecosystem & Value Chain Analysis

[redacted] A buyer needing acceptance before dispatch should negotiate earlier access rather than assume that a standard online order settles pre-purchase qualification. The trade-off is convenience versus control over the approval sequence.

At the packaged-product end, commercial value also depends on responsibility for the finished offering. EU cosmetics rules require a designated EU responsible person and a product safety report before market placement. [redacted]

■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■ ■■■■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■ ■■ ■■■■■■■■ ■■■ ■ ■■■■■■■■ ■■■■■ ■■ ■■■■■■■■

Sources & Evidence

1. Prickly Pear Seed Oil - Virgin Organic | Jedwards International
   · Jedwards identifies itself as a wholesale supplier and states that lot-specific certificates of analysis accompany shipment notification. Earlier buyer acceptance is an explicit contracting implication, not a disclosed universal service. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html?utm_source=openai))
2. Legislation - Cosmetics | European Commission
   · The EU cosmetic framework requires a designated EU responsible person and a product safety report before market placement. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))

4.3.1. Supply-Side Analysis

■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■■ ■■■■■■ ■■■■ ■■ ■■■■■■■■■■■■■■ ■■■■■■ ■■■■■ ■■■ ■■■■ ■■■■■■■■■■ ■■■■■ ■■■■■■■■ ■■■■ ■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■ ■■■■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■ ■■■■■■■■ ■■■■ ■■■ ■■■■■ ■■■■ ■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■ ■■■■ dillenii terminology. These are supplier-specific descriptions; neither geographic diversity nor a shared common product name establishes purchasing equivalence.

Kew accepts Opuntia tuna and lists both of SAHARÔME's dillenii names as synonyms. ■■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■■■ ■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■ ■■ ■■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■ ■■ ■■■■■■■■■ ■ ■■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ The same dillenii-described offer should not automatically be treated as separate Opuntia stricta and Opuntia tuna alternatives merely because its wording contains stricta.

Buyers comparing Opuntia ficus-indica, Opuntia stricta, and Opuntia tuna should preserve each seller's original terminology and obtain a reconciled declaration tied to the exact commercial offer. ■■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■ ■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■ ■■■■■■■■■■■■■■ ■■■■■■■■ ■■■■■ ■■■■■ ■ ■■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ A revised botanical brief may broaden the shortlist, but changes the promised product identity unless the buyer expressly accepts the reconciliation.

Sources & Evidence

1. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa
   · PRÍ PEAR advertises South African seed oil for cosmetic formulators, traceability, and certificates of analysis available on request. These statements establish an advertised sourcing route, not buyer acceptance or a destination-specific delivery commitment. ([pripear.com](https://www.pripear.com/raw-ingredients-supplier))

2. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
   · SAHARÔME advertises a Morocco-origin seed oil using both Opuntia dillenii and Opuntia stricta var. dillenii terminology and provides a product-information enquiry route. The page does not establish a buyer-qualified replacement or contractual delivery commitment.
   ([saharome.com](https://saharome.com/vegetable-oils/prickly-pear-o%CF%89ega6-seed-oil/))
3. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
   · Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms. Associating SAHARÔME's explicitly dillenii-described offering with the included Opuntia tuna category is therefore a nomenclatural inference, not evidence of commercial qualification or purchasing equivalence.
   ([powo.science.kew.org](https://powo.science.kew.org/taxon/urn%3Alsid%3Aipni.org%3Anames%3A137125-xx.xx))

4.3.2. Demand-Side Analysis

Manufacturers and Formulators purchase an identified ingredient for a particular product brief, rather than buying the complete consumer proposition. ■■■■■■■■ ■■■■■■ ■■■■■ ■■■■■ ■■■ ■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■ ■■■■■ ■■■■■■■■ ■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■ ■■■■ ■■■■■ ■■■■ ■■■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■■■ ■■■ ■■■■■ ■■■■■■■■■■ The buyer must connect the offered oil to its own accepted ingredient identity, documentation, and intended product positioning.

Professional Service Providers can occupy two roles: consuming oil within a service and reselling packaged products. KENZA expressly solicits bulk-oil business from spas and professional hair salons and wholesale business from beauty stores. ■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■ ■■■■■■■■■■■■ ■■■■■ ■■■■■ ■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■ ■ ■■■■ ■■■■■■ ■■■■■ ■■■■ ■■■ ■■■■■■ ■■■■■■ ■■■ ■■■■■■ ■■ ■ ■■■■■■■■ ■■■■■■ ■■■■■■■■■■■■■

Individuals and Households encounter a finished purchasing proposition. Leven Rose's standalone product is presented for external skin and hair use and identifies its oil as Unrefined. ■■■■■ ■■■■■■■■■ ■■■ ■■■ ■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■■■■ ■■■■ ■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■ ■■ ■■■ ■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■ ■ ■■■■■■■■■ ■■■■■■■■■ ■■■■ ■■■■■■ ■■■ ■■■ ■■■■ ■■■■■ ■■■■■■■■■ ■■■■■■■■■

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   · The brand's own product page presents the packaged oil for skin and hair use; it does not establish buyer preference or clinical outcomes.
   ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
2. Prickly pear seed oil | SOPHIM
   · SOPHIM lists skin, hair, and nail-care applications and provides documentation and enquiry routes for its named oil. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
3. Contact - Clean Beauty Brand & Wholesale Moroccan Oils Supplier NY
   · KENZA solicits bulk Prickly Pear Seed Oil business from spas, beauty stores, and professional hair salons.
   ([kenza-international-beauty.com](https://kenza-international-beauty.com/contact/?utm_source=openai))

4.3.3. Stakeholder Analysis

For Certified Organic positioning, the seller, certifier, and finished-product marketer control different parts of the proposition. USDA requires relevant ingredient producers, handlers, and

final-product manufacturers to be certified within its framework. ■■■ ■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■ ■■■■■■■■■■ ■■■■■■■ ■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■ ■■■ ■■■■■■■■■■ ■■ ■ ■■■■■■ ■■ ■■■■■■■■■■■■ ■■■■■■ ■■ ■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■ ■ ■■■■■■■■■ ■■■■■■ ■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■

Regulators and designated market-placement actors also influence geographic access. EU centralized notification avoids further national cosmetic notifications after the product is notified through the CPNP, but the notification relationship still sits with responsible persons and, in specified circumstances, distributors. ■■■■ ■■■■■■■■ ■ ■■■■■■ ■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■ ■ ■■■■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■■■ ■■■■ ■ ■■■■■■ ■■■■■■ ■■■■■ ■■■■■■■■■■ ■■ ■■■■ ■ ■■■■■■■■■■■ ■■■■■■ ■■■■■■■■■■ ■■■■■■■■

Sources & Evidence

1. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
   · USDA states that relevant agricultural ingredient producers, handlers, and final-product manufacturers must be certified for the NOP cosmetic framework. ([ams.usda.gov](https://www.ams.usda.gov/grades-standards/cosmetics-body-care-and-personal-care-products))
2. "Organic" Cosmetics | FDA
   · FDA states that USDA organic requirements are separate from cosmetic safety and labeling requirements. ([fda.gov](https://www.fda.gov/cosmetics/labeling-claims/organic-cosmetics))
3. Cosmetic product notification portal | European Commission
   · CPNP notification removes the need for further national cosmetic notification within the EU; responsible persons and certain distributors submit information. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/cosmetic-product-notification-portal_en))

4.4. Market Dynamics

Commercial conversion depends on the interaction between offered use contexts and qualified access. Cosmetic portfolios and professional wholesale routes make the oil discoverable to different buyers, while certification and intended-use requirements determine which offers can actually enter a purchasing shortlist. ■■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■ ■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■ ■■■■■■■■■■■

A disruption scenario illustrates the tension. ■ ■■■■■ ■■■ ■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■ ■■■ ■■■■■ ■■ ■■■■■■ ■■ ■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■ ■■■■ ■■■■■■■■■ ■■■■■■■■■■■■■■ ■ ■■■■■■■■■■■■■■■ ■■■■■ ■■■ ■■■■■■■ ■■ ■■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■ ■■■■ ■■■■■■■■■ ■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■ The decision-relevant indicators are changes in certificate scope, buyer acceptance, contractual delivery commitments, and the availability of a documented alternative-not the appearance of another catalog listing alone.

Sources & Evidence

1. Prickly pear seed oil | SOPHIM
   · The supplier's commercial application list supports discoverability across different cosmetic buyer briefs. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
2. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
   · The channel-handling distinctions support a conditional scenario in which another advertised supplier does not preserve certification continuity. ([media.cosmos-standard.org](https://media.cosmos-standard.org/filer_public/xx.xx/a2/43a20531-d35d-46c2-xx.xx-50a4f145d2b1/cosmos-standard_technical_guide_v4-xx.xx.pdf))
3. Prickly Pear Organic Carrier Oil | Florihana
   · Complementary oils provide a bounded alternative-positioning scenario for a consumer-facing brand. ([florihana.com](https://www.florihana.com/us/carrier-oils/xx.xx-xx.xx-figue-de-barbarie-bio.html))

4.4.1. Key Drivers

4.4.1.1. Multiple documented cosmetic purchasing contexts

SOPHIM lists Prickly Pear Seed Oil for skin, hair, and nail care and provides commercial documentation and enquiry routes. ■■■■ ■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■ ■■■■ ■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■■■■■ The mechanism is access to different product briefs, not demonstrated adoption across them; a named buyer's acceptance remains necessary.

Sources & Evidence

1. Prickly pear seed oil | SOPHIM
   · The application portfolio establishes multiple offered cosmetic contexts, not demonstrated adoption in each. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/?utm_source=openai))

4.4.1.2. Certification-linked purchasing eligibility

Where a buyer has committed to an organic proposition, appropriately certified agricultural ingredients can become eligible sourcing options. USDA's framework covers ingredient producers, handlers, and final-product manufacturers, making certification a purchasing condition rather than merely a marketing adjective. ■■■■ ■■■ ■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■ ■■■ ■■■■■■■■■ ■ ■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■■■■ ■■■ ■■ ■■■■■■ ■■■■■■■■ ■■■■■■ ■■■■■■■■■■■■

Sources & Evidence

1. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
   · Agricultural-ingredient cosmetics may qualify for NOP certification when the applicable standards are met; buyer eligibility is a conditional commercial implication. ([ams.usda.gov](https://www.ams.usda.gov/grades-standards/cosmetics-body-care-and-personal-care-products))
2. "Organic" Cosmetics | FDA
   · Organic status does not remove the safety requirements applying to cosmetics. ([fda.gov](https://www.fda.gov/cosmetics/labeling-claims/organic-cosmetics))

4.4.1.3. Professional-use and resale channel access

KENZA advertises bulk Prickly Pear Seed Oil to spas, beauty stores, and professional hair salons, alongside wholesale and distribution enquiries. ■■■■■ ■■■■■■ ■■■■■■■ ■■■ ■■■ ■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■■■■ They can widen commercial access where delivery and channel terms are agreed, but an advertised route is not evidence of professional uptake or an exclusive distributor appointment.

Sources & Evidence

1. Contact - Clean Beauty Brand & Wholesale Moroccan Oils Supplier NY
   · The company advertises wholesale and professional distribution enquiries; these are offered routes, not evidence of uptake or exclusive appointment.
   ([kenza-international-beauty.com](https://kenza-international-beauty.com/contact/?utm_source=openai))

4.4.2. Key Restraints

4.4.2.1. Competition within the botanical-oil proposition

Prickly Pear Seed Oil competes within a broader botanical-oil purchasing context. Florihana presents Argan, Jojoba, and Rose Hip oils as complementary options. ■■■■ ■■■■■■ ■■■ ■■■■■■■■■ ■■■■ ■■■■■■■■ ■■ ■■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■ ■■■■ ■■■■■■ ■■■ ■■■■■ ■■■■■■■■■■ ■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■ ■■■■■■■■■■■■■■■ ■■■■■■■ ■■ ■■■■■■ ■■■■■■■ ■■ ■■■ ■■■ ■■■■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■■■■■

Sources & Evidence

1. Prickly Pear Organic Carrier Oil | Florihana
   · Florihana lists Argan, Jojoba, and Rose Hip among complementary carrier oils; this does not establish interchangeable purchasing specifications.
   ([florihana.com](https://www.florihana.com/us/carrier-oils/xx.xx-xx.xx-figue-de-barbarie-bio.html))

4.4.2.2. Nontransferable intended-use permissions

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Sources & Evidence

1. Novel Food | European Commission
   · The European Commission requires novel-food authorization where applicable and consultation with the relevant national authority when status is uncertain; it does not settle every studied oil's status.
   ([food.ec.europa.eu](https://food.ec.europa.eu/food-safety/novel-food_en))
2. New Dietary Ingredient (NDI) Notification Process | FDA
   · FDA describes notification obligations for supplements containing new dietary ingredients; the page does not determine the status of a specific Prickly Pear Seed Oil offering.
   ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process?trk=article-ssr-frontend-pulse_little-text-block))

3. Opuntia Ficus-Indica Seed Oil | FDA UNII Search Service
   · The FDA record identifies Opuntia Ficus-Indica Seed Oil and expressly states that UNII availability does not imply regulatory review or approval.
   ([precision.fda.gov](https://precision.fda.gov/uniisearch/srs/unii/1XGW49AK2J))
4. Defined Organism Substance - Opuntia Ficus-Indica Seed Oil | Health Canada
   · Health Canada's ingredient entry assigns a non-medicinal emollient role and specifies topical use only; it is not a product-specific medicinal authorization.
   ([webprod.hc-sc.gc.ca](https://webprod.hc-sc.gc.ca/nhpid-bdipsn/ingredReq?id=xx.xx))

4.4.2.3. Claims can change the commercial access regime

The selling proposition is constrained by intended-use claims. FDA states that disease-treatment or body-structure/function claims can make a product a drug even when it also affects appearance. ■ ■■■■■■■■■■ ■■■ ■■■■■ ■■■■■■ ■■■■■■ ■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■ ■■ ■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■■ ■■■■ ■■■ ■■■■■■■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■■■■■■■

Sources & Evidence

1. Cosmetics Labeling Claims | FDA
   · FDA states that disease-treatment or body-structure/function claims can make a product a drug, even when it affects appearance.
   ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-labeling/cosmetics-labeling-claims?trk=article-ssr-frontend-pulse_little-text-block))

4.4.3. Key Opportunities

4.4.3.1. Buyer-timed documentation commitments

Suppliers can address a defined approval gap where a manufacturer needs documents before dispatch but standard handover occurs afterward. Jedwards' disclosed sequence illustrates the issue. ■ ■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■ ■■ ■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■ ■■ ■■■ ■■■■■■ ■■■■■■■■ ■■■ ■■ ■■■■■■■■ ■■■■ ■■■■■ ■■ ■■■■■■■■■■■■■

Sources & Evidence

1. Third-Party Certifications | Jedwards International
   · Jedwards states that certificates of analysis accompany shipment notices sent the morning after dispatch; its enquiry route does not promise advance release.
   ([bulknaturaloils.com](https://bulknaturaloils.com/certificates))

4.4.3.2. Certification continuity through the channel

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Sources & Evidence

1. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
   · The September 2025 COSMOS guide distinguishes repacking or removal of the manufacturer's label from unchanged material retaining that label, with different certification consequences. ([media.cosmos-standard.org](https://media.cosmos-standard.org/filer_public/xx.xx/a2/43a20531-d35d-46c2-xx.xx-50a4f145d2b1/cosmos-standard_technical_guide_v4-xx.xx.pdf))

4.4.3.3. Separately contracted origin-backed own-label supply

Brand owners seeking a Moroccan oil proposition have an evidenced supplier-to-brand lead: ZINEGLOB advertises private-label services and PUREZA identifies it as its source. Capture requires a separate agreement for the entrant's exact oil, branding and territory. ■■■■■■■■■■■■■■ ■■■■■■ ■■■■■■■ ■■ ■■■■■■■■■■■ ■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■■■■■■

Sources & Evidence

1. Vous êtes un professionnel - Comptoir des Huiles
   · Comptoir des Huiles directs professional buyers to Ankorstore and Faire and separately invites private-label enquiries. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
2. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   · ZINEGLOB advertises Prickly Pear Moisturizing Oil, private-label services and support for cosmetic brands. ([zineglob.com](https://zineglob.com/products/prickly-pear-moisturizing-oil?search=top-products))
3. Prickly Pear Seed Oil Canada - Organic Moroccan Face Oil | PUREZA
   · PUREZA explicitly identifies ZINEGLOB SARL as its prickly pear seed-oil source; the disclosure does not confer another brand's rights. ([pureza.ca](https://pureza.ca/products/pureza-prickly-pear-seed-oil-30ml))

4.4.4. Key Challenges

4.4.4.1. Reconciling product names with ingredient declarations

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Sources & Evidence

1. Prickly Pear Carrier Oil - Cosmetic Grade - Refined | New Directions Aromatics
   · New Directions Aromatics names both Olus Oil and Opuntia Ficus-Indica Seed Oil for its Refined cosmetic-grade offering. The declaration is specific to that commercial product. ([newdirectionsaromatics.com](https://www.newdirectionsaromatics.com/oils/carrier-oils/prickly-pear-carrier-oil-cosmetic-grade-refined?utm_source=openai))

4.4.4.2. Managing origin exposure without assuming a shortage

FAO's December 2023 account identifies cactus cochineal as a livelihood and farm threat in North Africa, including Morocco and Tunisia. ■■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■ ■■■ ■ ■■■■■ ■■ ■■ ■■■ ■■■■■■■■■ Buyers should establish supplier-specific delivery commitments

and a qualified alternative; a South African offer such as PRÍ PEAR provides another sourcing lead, but does not itself prove independence or equivalence.

Sources & Evidence

1. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa
   · The South African supply description establishes an alternative sourcing lead, not equivalence or independence from another supplier.
   ([pripear.com](https://www.pripear.com/raw-ingredients-supplier?utm_source=openai))
2. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   · FAO's December xx.xx 2023 account describes cactus cochineal as a threat to farms and livelihoods and reports its presence in Morocco and Tunisia; it does not establish an oil shortage.
   ([fao.org](https://www.fao.org/neareast/news/details/fao-strengthens-national-capacities-to-surveillance-and-manage-cactus-cochineal-in-the-mediterranean/en))

4.4.4.3. Preserving certification through intermediary handling

[redacted] Intermediaries serving certification-led buyers must establish their permitted handling and labeling role before promising continuity. Convenience from repacking can therefore create additional qualification work.

Sources & Evidence

1. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
   · COSMOS guidance distinguishes certification treatment for repacking, replacement labeling, and unchanged material retaining the manufacturer's label.
   ([media.cosmos-standard.org](https://media.cosmos-standard.org/filer_public/xx.xx/a2/43a20531-d35d-46c2-xx.xx-50a4f145d2b1/cosmos-standard_technical_guide_v4-xx.xx.pdf))

4.5. Porter’s Five Forces Analysis

[redacted] A supplier serving formulation procurement does not automatically possess consumer distribution, while a retail brand does not automatically provide an ingredient buyer's documentation and contracting arrangements. Competitive comparisons should therefore match the buying relationship before assessing differentiation.

Supplier bargaining power depends on the buyer's qualified alternatives, not simply the existence of other cactus-oil sellers. Origin, botanical identity, certification, and accepted documentation can narrow the practical choice set. [redacted]

Substitution is a constraint on consumer positioning, although not proof of ingredient interchangeability. ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ A brand therefore needs an evidenced reason for the particular oil, rather than relying on botanical novelty alone.

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Sources & Evidence

1. Prickly Pear Seed Oil, Refined - O&3
   · The offering is sourced through vetted suppliers and accompanied by commercial documentation; this establishes a supplier route, not exclusive access. ([oand3.com](https://www.oand3.com/product/prickly-pear-seed-oil-refined/))
2. Prickly Pear Cactus Seed Oil - Leven Rose
   · The standalone packaged offering provides a commercial counterpoint to specialist ingredient procurement. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
3. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa
   · A publicly advertised wholesale route supports the bounded conclusion that buyers can investigate more than one commercial relationship. ([pripear.com](https://www.pripear.com/raw-ingredients-supplier?utm_source=openai))
4. Legislation - Cosmetics | European Commission
   · Finished-cosmetic responsibilities remain a market-entry condition distinct from ingredient catalog access. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
5. Prickly Pear Organic Carrier Oil | Florihana
   · The broader oil routine supports a conditional competing-attention mechanism, rather than demonstrated substitution. ([florihana.com](https://www.florihana.com/us/carrier-oils/xx.xx-xx.xx-figue-de-barbarie-bio.html))
6. Frequently Asked Questions: Patents | WIPO
   · WIPO explains that patent rights are territorial and licensing permission depends on defined terms and territory. This supports requiring a specific right before accepting an exclusivity proposition. ([wipo.int](https://www.wipo.int/en/web/patents/faq_patents))

4.6. PESTLE Analysis

Regulatory architecture affects who can commercialize packaged Prickly Pear Seed Oil. ▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ Small-business exemptions from those administrative requirements therefore should not be confused with exemption from cosmetic safety and labeling responsibilities.

[illegible] An importer should establish the exact offering, origin, customs classification, entry-period treatment, and allocation of border charges before comparing supply contracts. Exchange-rate or freight deterioration would transmit through the agreed commercial terms; it is a contracting scenario, not an established oil-specific demand trend.

Social and environmental positioning requires separate scrutiny. Organic certification supports a defined claim rather than a general assurance of superior safety. [illegible]

[illegible] O&xx.xx provides enquiry, sample-request, and document-access routes for its Refined offering. Such access can accelerate supplier screening, but the buyer still needs confirmation that the documents, certification claims, and delivery commitment cover the exact transaction.

Sources & Evidence

1. Prickly Pear Seed Oil, Refined - O&3
   · Product files, enquiries, and sample requests are offered, with requester details required for document access. ([oand3.com](https://www.oand3.com/product/prickly-pear-seed-oil-refined/))
2. "Organic" Cosmetics | FDA
   · FDA cautions that an ingredient's source does not determine safety; organic positioning is not a general safety assurance. ([fda.gov](https://www.fda.gov/cosmetics/labeling-claims/organic-cosmetics))
3. Legislation - Cosmetics | European Commission
   · EU requirements allocate safety and market-placement responsibilities to the designated actor. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
4. Cosmetic product notification portal | European Commission
   · The centralized notification framework supports a distinction between administrative access and commercial distribution coverage. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/cosmetic-product-notification-portal_en))
5. Registration & Listing of Cosmetic Product Facilities and Products | FDA
   · MoCRA establishes facility-registration and product-listing obligations with specified exemptions. FDA states that registration and listing do not indicate approval. ([fda.gov](https://www.fda.gov/cosmetics/registration-listing-cosmetic-product-facilities-and-products))
6. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   · The documented agricultural exposure supports monitoring origin-linked supply commitments rather than assuming crop resilience guarantees continuity. ([fao.org](https://www.fao.org/neareast/news/details/fao-strengthens-national-capacities-to-surveillance-and-manage-cactus-cochineal-in-the-mediterranean/en))
7. Binding Ruling Program | U.S. Customs and Border Protection
   · CBP explains that pre-entry classification decisions can be binding while duty rates are not; product-specific import treatment remains a transaction question. ([help.cbp.gov](https://www.help.cbp.gov/s/article/Article-xx.xx?language=en_US&utm_source=openai))

4.7. Market Outlook

The commercial outlook for Prickly Pear Seed Oil is conditional on account conversion rather than catalog proliferation. ■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■ ■■■■■■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■ Suppliers able to secure those commitments have a defensible proposition; another oil listing alone does not establish a reason for buyers to switch.

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Sources & Evidence

1. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa
   · PRÍ PEAR advertises South African ingredient supply, traceability and certificates on request; this is a sourcing lead rather than an accepted replacement. ([pripear.com](https://www.pripear.com/raw-ingredients-supplier))
2. Prickly pear seed oil | SOPHIM
   · The named cosmetic ingredient and its support routes establish a commercialization proposition, not renewable customer commitments.
   ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
3. Legislation - Cosmetics | European Commission
   · The EU framework requires an EU responsible person and a product safety report before finished-cosmetic market placement, separately from distribution reach.
   ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
4. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   · FAO's December xx.xx 2023 account documents a North African cactus threat, including reported presence in Morocco and Tunisia; it does not establish an oil shortage.
   ([fao.org](https://www.fao.org/neareast/news/details/fao-strengthens-national-capacities-to-surveillance-and-manage-cactus-cochineal-in-the-mediterranean/en))
5. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   · The advertised oil and private-label route establish a packaged-product commercialization lead, not an accepted appointment.
   ([zineglob.com](https://zineglob.com/products/prickly-pear-moisturizing-oil?search=top-products))

4.7.1. Near-Term Market Outlook (0-2 Years)

For 2026-2027, continuity of existing cosmetic purchasing relationships is the immediate decision issue. ■■■ ■■■■■■ ■■■■■■■■■■■ ■■■■■ ■■■■■■■ ■■■■■■■ ■■■■ ■■■■ ■■■ ■■■■ ■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■ ■■ ■■■■■ ■■■■■■■ ■■■■■■■ ■■■ ■■■■■ Buyers relying on that recognition should make subsequent commitments contingent on renewed applicable evidence rather than treat the certificate as indefinite coverage.

Counterparty continuity is a separate trigger. Companies House records Aromantic Limited's administration beginning September xx.xx 2026; that does not establish cessation of every associated brand or an oil shortage. ■■■■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■ ■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■ ■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■ ■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■ ■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■■■■ ■■■■■■ ■■■■■■ ■ ■■■■■■■■■ ■■■■■■■■■■■ ■■ ■■■■■■■■■ ■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■ ■■■■■■ ■■■■ ■■■■■■■■■ ■■■■■■■■■■■■■■

Sources & Evidence

1. IONC COSMOS CERTIFIED Certificate - AOT GmbH
   · The IONC certificate names AOT GmbH, lists organic Prickly Pear Seed Oil at COSMOS CERTIFIED level, and states validity from January xx.xx 2026, through January xx.xx 2027. ([aot.de](https://www.aot.de/files/content/Zertifikate/cosmos-certified.pdf))
2. AROMANTIC LIMITED - Insolvency | Companies House
   · Companies House records Aromantic Limited's administration beginning September xx.xx 2026; the record does not identify a replacement operator or continuing oil supply. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/SC299277/insolvency))

4.7.2. Medium-Term Market Outlook (3-5 Years)

For 2028-2029, a conditional route is staged territorial extension of an already supported packaged-cosmetic proposition. EU centralized notification can reduce duplicated administration, while distributor-led label translation can retain a separate notification responsibility. ■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■■■■■ ■ ■■■■■■■■■■■■■ ■■■■■■

The investment trigger is a documented channel commitment with the necessary accountable actors, not notification alone. ■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■■■ ■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■■■■■ ■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■■■■■ ■■■■ ■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■ These are planning conditions, not predicted appointments or regulatory changes.

Sources & Evidence

1. Legislation - Cosmetics | European Commission
   · Defined accountable actors remain necessary for EU cosmetic placement despite centralized notification. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
2. Cosmetic product notification portal | European Commission
   · CPNP removes further national notification after EU notification, while the Commission separately identifies distributors translating labeling to meet national law. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/cosmetic-product-notification-portal_en))

4.7.3. Long-Term Market Outlook (5-10 Years)

[redacted] Dietary Supplements requires an independent intended-use assessment, including applicable U.S. new-dietary-ingredient obligations. Cosmetic participation supplies neither permission.

Pharmaceuticals should distinguish an inactive-ingredient account from a standalone therapeutic proposition. A documented drug-label example supports the former role but does not clear a new medicinal launch. [redacted]

Sources & Evidence

1. Novel Food | European Commission
   · EU novel foods require premarket authorization; operators uncertain about novel-food status must consult the relevant national authority. The framework does not determine a particular oil's status. ([food.ec.europa.eu](https://food.ec.europa.eu/food-safety/novel-food_en))
2. Cosmetics Labeling Claims | FDA
   · FDA distinguishes cosmetic positioning from disease-treatment or body-structure/function claims that classify a product as a drug. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-labeling/cosmetics-labeling-claims))
3. New Dietary Ingredient Notification Process | FDA
   · FDA requires notification for supplements containing new dietary ingredients; applicability to a particular seed-oil proposition requires separate determination. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
4. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
   · DailyMed lists Opuntia ficus-indica seed oil as inactive in Eminence Daily Defense Tinted SPF and identifies the finished product as an OTC Monograph Drug. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

4.8. Go-to-Market Strategy

[redacted] A listed distributor such as O&xx.xx is an identifiable contact to investigate, not an available appointment: establish its willingness to buy or represent the entrant's oil before committing channel resources. Agree retained supplier obligations and the intermediary's specific service remit; choose direct engagement when those obligations can be met without that additional relationship.

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Use a written quotation for a defined commercial bundle, including documentation timing, delivery services, border-charge responsibility, invoice currency and renewal treatment. ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ Progress account by account after buyer acceptance and channel commitments; defer an unsupported territory or intended use rather than promise access that the agreement does not establish.

Sources & Evidence

1. Legislation - Cosmetics | European Commission
   · EU finished-cosmetic responsibilities support assigning market-placement roles independently of private-label supply or logistics. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
2. Registration & Listing of Cosmetic Product Facilities and Products | FDA
   · FDA describes MoCRA registration and listing responsibilities, specified exemptions and the label-based responsible-person definition; submissions are not approval. ([fda.gov](https://www.fda.gov/cosmetics/registration-listing-cosmetic-product-facilities-and-products))
3. Entering the European market for prickly pear seed oil for cosmetics | CBI
   · CBI's December xx.xx 2023 guidance distinguishes intermediary documentation coordination from the exporter's obligation to supply records and recognizes direct manufacturer supply. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
4. Sales Terms & Conditions - O&3
   · O&xx.xx's published terms require written contractual variations, describe included carriage and insurance unless otherwise agreed, and allocate applicable taxes and duties to the buyer. ([oand3.com](https://www.oand3.com/wp-content/uploads/2024/xx.xx/O3-Sale-Terms-Conditions-2018.pdf))
5. Customer Service - Terms and Conditions of Sale | Jedwards International
   · Jedwards' defaults exclude delivery and border charges unless expressly included and require a separate written agreement for differing terms. ([bulknaturaloils.com](https://bulknaturaloils.com/customer-service))
6. Cosmetics Labeling Claims | FDA
   · Cosmetic labeling must be truthful and nonmisleading; therapeutic positioning is not automatically available to a cosmetic oil. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-labeling/cosmetics-labeling-claims))
7. Vous êtes un professionnel - Comptoir des Huiles
   · The separate professional resale and private-label enquiry routes support choosing the commercial role before negotiating obligations. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))

8. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB

   · Private-label support is expressly advertised, supporting a conditional negotiation route rather than assumed availability of particular terms. ([zineglob.com](https://zineglob.com/products/prickly-pear-moisturizing-oil?search=top-products))

9. Prickly Pear Seed Oil, Cold Pressed - O&3

   · The existing ingredient offering establishes an identifiable distributor contact, not willingness to buy or represent an entrant's oil. ([oand3.com](https://www.oand3.com/product/prickly-pear-seed-oil-cold-pressed/))

5. Market Insights

5.1. Consumer Insights & End-User Perspective

[redacted] O&xx.xx's client application expressly asks for the full product name or code and excludes buyer purchase-order terms unless agreed in writing. An internal ingredient preference therefore needs a supplier-accepted commercial commitment, not merely an entry on a purchase order.

[redacted] For Individuals and Households, Leven Rose instead presents an Unrefined standalone oil for external skin and hair use. These descriptions establish seller propositions and advertised routes, not universal purchasing preferences or repeat-purchase behavior.

For a USDA-organic proposition, certification across relevant ingredient, handling and finished-product operations becomes an eligibility issue. Moving to Not Certified Organic supply may preserve a procurement option only if the buyer can change its promised positioning; it is not a like-for-like replacement. [redacted]

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   · Leven Rose presents a standalone Unrefined Prickly Pear Cactus Seed Oil for external skin and hair use. This establishes the seller's proposition rather than consumer preference.
   ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
2. Prickly pear seed oil | SOPHIM
   · SOPHIM lists skin, hair and nail-care applications for its Prickly Pear Seed Oil, establishing offered purchasing contexts rather than buyer adoption.
   ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
3. Contact - Clean Beauty Brand & Wholesale Moroccan Oils Supplier NY
   · KENZA advertises bulk Prickly Pear Seed Oil for spas and professional hair salons alongside wholesale routes for its packaged skincare line. These are advertised relationships, not demonstrated customer uptake.
   ([kenza-international-beauty.com](https://kenza-international-beauty.com/contact/?utm_source=openai))
4. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
   · USDA describes organic certification requirements covering relevant agricultural ingredient producers, handlers and final-product manufacturers. Certification-linked purchasing eligibility is a conditional commercial implication.
   ([ams.usda.gov](https://www.ams.usda.gov/grades-standards/cosmetics-body-care-and-personal-care-products))

5. Client application - O&3
   - O&xx.xx asks applicants to identify the full product name or product code and states that buyer purchase-order terms do not become contractual terms unless agreed in writing. ([oand3.com](https://www.oand3.com/client-application/))

5.2. Consumer Experience Benchmarking

[redacted] The contrast concerns access and timing, not product quality or equivalent commercial grades. A buyer requiring approval before dispatch should secure a written document-delivery commitment rather than assume that catalog access settles its approval sequence.

Consumer reassurance serves a different purpose. Leven Rose invites dissatisfied purchasers to contact it within xx.xx days under its satisfaction guarantee. [redacted]

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   - The oil page invites dissatisfied purchasers to contact the company within xx.xx days under its satisfaction guarantee; the page does not establish measured service performance.
2. Prickly Pear Seed Oil - Virgin Organic | Jedwards International
   - Jedwards requires login or registration for specified product documents and states that lot-specific certificates of analysis accompany the shipment-notification email sent after shipment. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
3. Prickly pear seed oil | SOPHIM
   - The product page lists technical and marketing documentation and offers a contact route for further information; it does not promise a particular response time.

5.3. Opportunity Mapping

The most defensible initial opportunity screen is Cosmetics and Personal Care accounts with an active purchasing brief and an identifiable ingredient-acceptance decision-maker. [redacted] Direct manufacturer engagement retains coordination responsibility; an intermediary is useful only when its agreed contribution closes the actual access gap.

[redacted] A supplier pursuing a combined service-and-resale account should first confirm the active service brief, purchasing principal and resale permission, then agree separate replenishment and packaged-product obligations. A professional buyer needing only service supply should not be required to adopt a resale proposition.

For brand owners, ZINEGLOB's advertised private-label service and PUREZA's sourcing disclosure provide a concrete origin-to-brand lead. The entrant still needs its own accepted oil declaration, branding agreement and territorial commitments. [redacted]

Food and Beverages and Dietary Supplements require verification of definitive intended-use labeling and the destination-specific legal basis before commitment. [redacted] Their commercial accessibility must be established separately; the qualitative ordering here reflects identifiable entry prerequisites, not demonstrated uptake or expected profitability.

Sources & Evidence

1. Prickly pear seed oil | SOPHIM
   · SOPHIM already advertises ingredient documentation and account contact, challenging any assumption that another catalog listing alone supplies distinctive service. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
2. Novel Food | European Commission
   · The general food framework supports product-specific access verification rather than extrapolation from cosmetic participation. ([food.ec.europa.eu](https://food.ec.europa.eu/food-safety/novel-food_en))
3. Entering the European market for prickly pear seed oil for cosmetics | CBI
   · The oil-specific guidance supports comparing direct and intermediated ingredient relationships, without establishing a particular distributor appointment. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
4. New Dietary Ingredient Notification Process | FDA
   · The supplement framework establishes a separate intended-use access question, not permission derived from a cosmetic supply record. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

5. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
   · The label documents an inactive-ingredient role without identifying the oil supplier or establishing permission for a separate standalone therapeutic oil. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
6. Hyatt Regency Casablanca Spa Brochure
   · Hyatt Regency Casablanca's undated spa brochure advertises a facial service involving pure prickly pear seed oil; it does not establish continuing procurement or a supplier appointment. ([hyatt.com](https://www.hyatt.com/content/dam/hotel/propertysites/assets/regency/casab/documents/en_us/home/Brochure%20SPA%20English.pdf))
7. Vous êtes un professionnel - Comptoir des Huiles
   · The advertised trade routes provide a resale lead, not an oil-specific appointment, hotel supply relationship or universal destination commitment. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
8. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   · The offering provides an own-label sourcing lead; it does not establish an entrant's territorial rights or delivery commitments. ([zineglob.com](https://zineglob.com/products/prickly-pear-moisturizing-oil?search=top-products))
9. Prickly Pear Seed Oil Canada - Organic Moroccan Face Oil | PUREZA
   · The buyer-published sourcing connection corroborates a specific supplier-to-brand relationship, without establishing exclusivity or transferable terms. ([pureza.ca](https://pureza.ca/products/pureza-prickly-pear-seed-oil-30ml))
10. Prickly Pear Seed Oil, Cold Pressed - O&3
    · The product-specific documentation interface supports evaluating an exact ingredient account rather than treating another listing as unique differentiation. ([oand3.com](https://www.oand3.com/product/prickly-pear-seed-oil-cold-pressed/))
11. Third-Party Certifications | Jedwards International
    · The disclosed handover sequence supports investigating a specific pre-dispatch acceptance gap rather than claiming a general documentation shortage. ([bulknaturaloils.com](https://bulknaturaloils.com/certificates))
12. Shipping policy - Leven Rose
    · Leven Rose's direct-store shipping policy excludes international shipping; that restriction does not determine every possible reseller route. ([levenrose.com](https://levenrose.com/policies/shipping-policy))
13. Refund policy - Leven Rose
    · Leven Rose limits refund support to direct or official-seller purchases and disclaims authenticity and freshness assurances for unauthorized sellers. ([levenrose.com](https://levenrose.com/policies/refund-policy))

5.4. Distribution Channel Analysis

[illegible] Direct Sales to households and ingredient exports therefore require different territorial assessments. The Global market boundary does not imply universal fulfillment by either seller.

[illegible]

[redacted] Intermediation adds a commercial relationship and changes control according to the agreement; it does not automatically confer exclusivity, finished-cosmetic responsibility or access to every Retailer. The route is useful only when the intermediary's contracted contribution addresses the exporter's actual access gap.

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   - The product page states that Leven Rose does not ship internationally.
2. Prickly Pear Seed Oil - Virgin Organic | Jedwards International
   - Jedwards states that its e-commerce platform supports the United States and Canada, while other international orders require enquiry and wire payment. Its general export statement does not confirm every product-destination combination.
3. Entering the European market for prickly pear seed oil for cosmetics | CBI
   - CBI's December xx.xx 2023 guidance describes importers and distributors as documentation coordinators while retaining the supplier's obligation to provide the records. It also identifies direct manufacturer supply as an alternative route. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

5.5. Pricing Trend Analysis

Prickly Pear Seed Oil quotations should be compared as contractual bundles rather than interchangeable catalog offers. O&xx.xx's sales terms, linked from its client application, include carriage and insurance unless the sales contract states otherwise and allocate applicable taxes and duties to the buyer. [redacted]

The purchase agreement also determines exposure to changing conditions. [redacted] These are contract-dependent transmission mechanisms, not a uniform directional pricing claim.

Sources & Evidence

1. Sales Terms & Conditions - O&3
   - O&xx.xx's published sales terms include carriage and insurance unless otherwise stated, allocate applicable taxes and duties to the buyer, and permit payment in USD and other specified currencies. The sales contract can modify these defaults. ([oand3.com](https://www.oand3.com/wp-content/uploads/2024/xx.xx/O3-Sale-Terms-Conditions-2018.pdf))

2. Customer Service - Terms and Conditions of Sale | Jedwards International
   · Jedwards excludes delivery and border charges unless expressly included, reserves changes on future orders, and subjects orders to credit approval with advance payment possible. ([bulknaturaloils.com](https://bulknaturaloils.com/customer-service))

5.6. Regulatory Compliance & Standards Framework

[illegible] FDA emphasizes that registration is neither approval nor a promotional credential and does not issue registration-compliance certificates. Buyers should allocate these roles before appointing a market-placement partner; a logistics appointment alone does not settle them.

Claims and intended use can change the access regime. [illegible] Those categories remain included, but commercial commitment requires the exact intended-use status rather than extrapolation from cosmetic supply.

[illegible] Consistent with WIPO's territorial treatment of patents, buyers should verify any asserted protected right, territory and license before committing to exclusivity. An oil purchase or botanical name alone establishes neither protected exclusivity nor freedom to operate.

Sources & Evidence

1. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
   · Agricultural-ingredient cosmetics may qualify under the National Organic Program when its production, handling, processing and labeling requirements are met; this is separate from cosmetic market-access obligations.
2. Legislation - Cosmetics | European Commission
   · The European Commission describes the EU responsible-person requirement, a product safety report before finished-cosmetic market placement, and centralized cosmetic notification. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))

3. Registration & Listing of Cosmetic Product Facilities and Products | FDA
   · FDA describes MoCRA facility-registration and product-listing obligations, specified exemptions and the label-based responsible-person definition. It states that registration is not approval and that FDA does not issue registration-compliance certificates. ([fda.gov](https://www.fda.gov/cosmetics/registration-listing-cosmetic-product-facilities-and-products))
4. Novel Food | European Commission
   · The European Commission requires premarket authorization for novel foods and consultation with the relevant national authority when novel-food status is uncertain. The framework does not establish a particular studied oil's status. ([food.ec.europa.eu](https://food.ec.europa.eu/food-safety/novel-food_en))
5. Frequently Asked Questions: Patents | WIPO
   · WIPO explains that patent rights are territorial and that licensing permission depends on agreed purpose, territory and period. These principles do not establish a supplier-specific protected right or clearance. ([wipo.int](https://www.wipo.int/en/web/patents/faq_patents))
6. Customer Service - Terms and Conditions of Sale | Jedwards International
   · Jedwards' terms grant no intellectual-property license and disclaim third-party non-infringement assurance.
7. Cosmetics Labeling Claims | FDA
   · FDA requires truthful, nonmisleading cosmetic labeling and explains that disease-treatment or body-structure/function claims can classify a product as a drug. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-labeling/cosmetics-labeling-claims))
8. New Dietary Ingredient Notification Process | FDA
   · FDA states that manufacturers and distributors marketing supplements containing new dietary ingredients must notify the agency. This general obligation does not determine the status of a specific Prickly Pear Seed Oil offering. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

5.7. ESG & Sustainability Analysis

Sustainability is a claim-credibility and supplier-selection issue for this oil, not an automatic consequence of cactus origin. Comptoir des Huiles identifies its packaged offering as Opuntia stricta Seed Oil from Madagascar and markets it with organic and Fair for Life claims. ■■■■ ■■■■■■■■■■■ ■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■■■ ■ ■■■■■ ■■■■■■■ ■■ ■■■■■■■■ ■■■■ ■■■■■■■■■■■■ ■■■■■ ■■■ ■■■■■ ■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■ ■■■ ■■■■■ ■■■■■■■■■ ■■■■■■■■

Adjacent buyer policy illustrates the access mechanism: L'Oréal's purchasing charter includes ethical, environmental, social and traceability requirements, without establishing that it purchases this oil. Suppliers pursuing such briefs must support the buyer's requested disclosures; certification alone may not satisfy them. ■■■ ■■■■■■■■■ ■■ ■ ■■■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■■■■ ■■■■ ■■■■ ■ ■■■■■■■■■■■ ■■■■ ■■ ■■■■■ ■■■■ ■■■■■■■■ ■■ ■■■■ ■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■■■■

Supply continuity also has a social dimension. ■■■■■ ■■■■■■■■ ■■■ ■■■■ ■■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■■■■ ■■ ■ ■■■■■■ ■■ ■■■■■ ■■■■■■■ ■■■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■ ■■ ■■■■■■■■■■■■■ ■■ ■■■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■ ■■■■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■ ■■■■■■■■■ ■■■ ■■■■ ■■■■■■■■■

■■■ ■■■■■■■■■■ ■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■ The account does not establish an oil shortage, while changing origin does not by itself demonstrate improved sustainability.

Sources & Evidence

1. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   · FAO's December xx.xx 2023 account describes cactus cochineal as a threat to North African farms and livelihoods and reports its presence in Morocco and Tunisia. It does not establish a particular oil supplier's shortage or a comparative environmental advantage elsewhere. ([fao.org](https://www.fao.org/neareast/news/details/fao-strengthens-national-capacities-to-surveillance-and-manage-cactus-cochineal-in-the-mediterranean/en))
2. ORGANIC Prickly Pear Seed Oil - Firming | Comptoir des Huiles
   · Comptoir des Huiles identifies its packaged oil as Opuntia stricta Seed Oil from Madagascar and markets it with organic and Fair for Life claims. These are the brand's offering claims, not independent measurements of environmental or livelihood outcomes. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/en/products/huile-de-figue-de-barbarie))
3. Our Suppliers | L'Oréal
   · L'Oréal's supplier policy includes ethical, environmental, social and traceability requirements. It illustrates an adjacent beauty buyer's procurement conditions without establishing that the company purchases this oil. ([loreal.com](https://www.loreal.com/en/audiences/suppliers/))
4. Environmental Claims: Summary of the Green Guides | Federal Trade Commission
   · FTC guidance cautions against broad unqualified environmental claims, requires clear explanation of certification claims, and states that third-party certification does not remove substantiation obligations. ([ftc.gov](https://www.ftc.gov/business-guidance/resources/environmental-claims-summary-green-guides))

5.8. Disruption & Risk Scenarios

An origin-continuity scenario becomes commercially material if a seller exposed to the North African cactus threat documented by FAO can no longer maintain its delivery commitment. ■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■ ■■■■ ■■■■ ■■■■ ■■■■■■■■■■ ■■■■■■ ■■■ ■ ■■■■■■ ■■ ■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■ ■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■■■ ■■■ ■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■■■ ■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■■■ ■■ ■■■ ■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■ ■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■■■■■ Supplier notices and accepted replacement contracts are the relevant indicators; the agricultural account does not establish an oil shortage.

A certification-disruption scenario arises when an intermediary changes the labeling or repacking relationship without the recognition required by the applicable scheme. ■■■ ■■■■■■■■■ ■■■■ ■■■■■■ ■■■■■ ■■■■■■■■■ ■■■■■■■■■■■■ ■■ ■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■ ■■■ ■■■■■■■■ ■■■ ■ ■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■■■■■■■■■ ■■■■■■ ■■■■■■■■■■■■■■■■ ■■■■■■ ■■■■■■ ■■■■■■ ■■■ ■■■■■■■■■■■■■■ ■■■■ ■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■ ■ ■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■■■ ■■■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■■■ The trigger is the actual commercial arrangement, not simply appointment of a distributor.

A claims-led disruption can occur without any change to the oil itself. Under FDA's framework, disease-treatment or body-structure/function claims can classify a cosmetic proposition as a

drug. ■■■■■ ■■■■■■ ■■■■■■ ■■■■■■ ■■■■■ ■■■■■■ ■■■■■■■■ ■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■■■■■■ ■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■ ■■ ■■■■■■■■■■■■ ■■■ ■■■■ ■■■■■ ■■ ■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■■■■ ■■ ■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■ ■■■■ ■■■■■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■ ■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■

Sources & Evidence

1. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa
   · The South African offering supplies a named alternative-origin lead without establishing independence, equivalence or destination-specific delivery. ([pripear.com](https://www.pripear.com/raw-ingredients-supplier))
2. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
   · The guide's commercial examples establish a certification-continuity risk and an unchanged-label countercase, subject to the applicable arrangement. ([media.cosmos-standard.org](https://media.cosmos-standard.org/filer_public/xx.xx/a2/43a20531-d35d-46c2-xx.xx-50a4f145d2b1/cosmos-standard_technical_guide_v4-xx.xx.pdf))
3. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   · The documented agricultural exposure supports a conditional supplier-continuity scenario, not an observed oil-specific fulfillment failure. ([fao.org](https://www.fao.org/neareast/news/details/fao-strengthens-national-capacities-to-surveillance-and-manage-cactus-cochineal-in-the-mediterranean/en))
4. Cosmetics Labeling Claims | FDA
   · A change to disease or structure/function claims can change the applicable U.S. access regime, supporting a conditional claims-disruption scenario. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-labeling/cosmetics-labeling-claims))
5. Prickly Pear Seed Oil, Refined | INKY Ingredients
   · INKY identifies O&xx.xx as its parent and directs buyers to matched O&xx.xx documentation, so another interface does not establish independent source control. ([inky-ingredients.com](https://inky-ingredients.com/products/prickly-pear-seed-oil-refined))

5.9. Return on Investment & Cost-Benefit Analysis

For an ingredient importer or manufacturer, the relevant comparison is purchased coordination versus work and exposure retained internally. ■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■■ ■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■ ■■ ■■■ ■■■■ ■■■■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■■■■■■ ■■■■■ ■■ ■■■■■■■■■■■■ ■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■ ■■■ ■■ ■■■■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■ ■■■■■ ■■ ■■■■■■■■■■■■■ ■■■ ■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■ ■■■■■■■■ ■■■■■■ ■■ ■■■■■■■■ ■ ■■■■■ ■■■■■■■■■■■ ■■■■ ■■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■ Direct procurement remains preferable when the buyer can manage those responsibilities and does not need the additional relationship.

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[redacted] Benefits require buyer acceptance and a functioning authorized channel. Commitment should remain defensible under changes in freight, invoice currency, certification continuity and partner service; otherwise, a narrower resale arrangement or deferral preserves flexibility.

Sources & Evidence

1. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
   · USDA's cosmetic organic framework requires certification of relevant agricultural ingredient operations, handlers and the finished-product manufacturer, supporting a continuing chain of obligations. ([ams.usda.gov](https://www.ams.usda.gov/grades-standards/cosmetics-body-care-and-personal-care-products))
2. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
   · Different certification treatment of channel roles supports considering claim-maintenance obligations when comparing presentation and branding choices. ([media.cosmos-standard.org](https://media.cosmos-standard.org/filer_public/xx.xx/a2/43a20531-d35d-46c2-xx.xx-50a4f145d2b1/cosmos-standard_technical_guide_v4-xx.xx.pdf))
3. Legislation - Cosmetics | European Commission
   · Market-placement responsibilities provide a supported cost-and-obligation premise for comparing own-label commercialization with resale. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
4. Entering the European market for prickly pear seed oil for cosmetics | CBI
   · The documented division of commercial responsibilities supports a conditional comparison of purchased coordination with retained internal coordination work. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
5. Sales Terms & Conditions - O&3
   · The terms permit USD and other specified invoice currencies and make delivered-service and border-charge allocation contract-dependent. ([oand3.com](https://www.oand3.com/wp-content/uploads/2024/xx.xx/O3-Sale-Terms-Conditions-2018.pdf))
6. Customer Service - Terms and Conditions of Sale | Jedwards International
   · Jedwards subjects orders to credit approval, may require advance payment, and limits contractual remedies; these affect working-capital and disruption exposure. ([bulknaturaloils.com](https://bulknaturaloils.com/customer-service))
7. Vous êtes un professionnel - Comptoir des Huiles
   · Existing-label resale is a documented alternative to investigating private label; its relative economic attractiveness remains buyer-specific. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
8. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   · Advertised private-label services support evaluating brand control against the additional responsibilities of an own-label proposition. ([zineglob.com](https://zineglob.com/products/prickly-pear-moisturizing-oil?search=top-products))
9. Third-Party Certifications | Jedwards International
   · Document timing is a contract-dependent acceptance condition; the economic benefit of changing it depends on the buyer's actual approval requirement. ([bulknaturaloils.com](https://bulknaturaloils.com/certificates))

6. Cumulative Impact of Artificial Intelligence 2026

A documented commercial AI pathway is downstream beauty marketing and organization. L'Oréal's 2025 reporting describes deployed AI-supported advertising decisions and its CreAItech content platform, alongside harmonized data and processes. [redacted]

For ingredient sellers, AI-assisted document retrieval and enquiry triage are conditional service options rather than demonstrated oil-market practice. [redacted] FDA's truthful-claims boundary continues to apply to cosmetic marketing generated with AI.

Sources & Evidence

1. Cosmetics Labeling Claims | FDA
   - The truthful-claims and intended-use boundaries remain relevant when cosmetic marketing is generated with AI; this application is an analytical implication of FDA's claims framework.
2. Transformation | L'Oréal Annual Report 2025
   - L'Oréal's 2025 annual reporting describes deployed AI-supported advertising decisions, CreAItech content creation and harmonized data and processes. These are reported beauty-company uses, not evidence of Prickly Pear Seed Oil supplier deployment. ([loreal-finance.com](https://www.loreal-finance.com/en/annual-report-2025/transformation/))
3. Artificial Intelligence Risk Management Framework: Generative Artificial Intelligence Profile | NIST
   - NIST's voluntary generative-AI risk profile identifies confidently false outputs, privacy and third-party integration risks and recommends source verification, governance and defined supplier responsibilities. Applying these safeguards to oil-related commercial records is a conditional recommendation. ([nvlpubs.nist.gov](https://nvlpubs.nist.gov/nistpubs/ai/NIST.AI.xx.xx-xx.xx.pdf))
4. AI talent, skills and literacy | European Commission
   - The European Commission describes AI literacy as an obligation for providers and deployers under the AI Act, including the amended provision's applicability without a mandated specific individual literacy level. ([digital-strategy.ec.europa.eu](https://digital-strategy.ec.europa.eu/en/policies/ai-talent-skills-and-literacy))

7. Prickly Pear Seed Oil Market, by Refinement Status

Unrefined and Refined distinguish the supplied oil's commercial declaration, not its buyer or packaging. [redacted] Comparisons should preserve the exact offered identity rather than assume that oils with similar names satisfy the same purchasing brief.

[redacted] Jedwards' explicit pairing of Virgin and Unrefined establishes that supplier's terminology, not a universal convention. A changed seller declaration or revised buyer brief should trigger renewed commercial acceptance.

Figure 8. Global Prickly Pear Seed Oil Market Size, by Refinement Status, 2025 (%)

Figure 9. Global Prickly Pear Seed Oil Market, by Refinement Status, 2032 (USD Million)

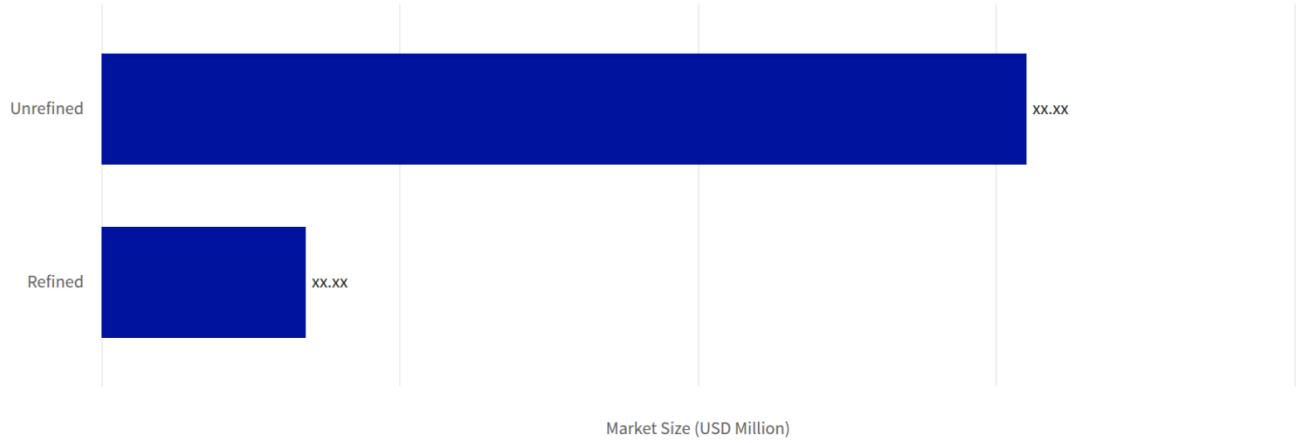

Table 4. Global Prickly Pear Seed Oil Market, by Refinement Status growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 5. Global Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Prickly Pear Seed Oil - Virgin Organic | Jedwards International

- Jedwards describes the offering's status as Unrefined (Virgin). ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.

2. Entering the European market for prickly pear seed oil for cosmetics | CBI

   · CBI's December xx.xx 2023 European guidance links refined supply with manufacturers' color and odor consistency requirements. This is a purchasing-context observation, not a universal equivalence rule. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Taxonomy evidence: The December xx.xx 2023 European guidance distinguishes refining from subsequent oil sales. It supports a sold-product specification, not additive refining-service revenue or a global 2025 split. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Taxonomy evidence: The December xx.xx 2023, government commercial study distinguishes seed-oil refining from subsequent sales to manufacturers, brands and retail channels. This supports treating final refinement status as a sold-product specification rather than adding refining-service revenue to the oil market. Its commercial observations concern Europe. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.

3. Prickly Pear Seed Oil, Refined | INKY Ingredients

   · INKY lists a Refined Prickly Pear Seed Oil offering and declares Opuntia Ficus-Indica Seed Oil. ([inky-ingredients.com](https://inky-ingredients.com/products/prickly-pear-seed-oil-refined))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.

4. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles

   · Comptoir des Huiles describes its standalone Opuntia stricta seed oil as Unrefined. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

5. The European market potential for prickly pear seed oil for cosmetics

   · Taxonomy evidence: The December xx.xx 2023, government commercial study identifies prickly pear seed oil as seed-derived vegetable oil and places it within a trade heading covering fixed vegetable oils whether refined or not. This supports retaining both refinement states within the product boundary; the heading does not isolate prickly pear seed-oil quantities or provide a refinement split. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))

6. Labelling requirements for fats and oils

   · Taxonomy evidence: Canadian food-labeling guidance, modified November xx.xx 2025, explains that the relevant general Codex oil standards recognize virgin and cold-pressed designations but do not define an extra-virgin designation for non-olive vegetable oils. This provides a terminology safeguard against inventing Extra Virgin as another refinement-status peer. It is not a cosmetic classification rule or evidence that prickly pear seed oil is authorized as food.
   ([inspection.canada.ca](https://inspection.canada.ca/en/food-labels/labelling/industry/fats-and-oils))

7. Prickly Pear Carrier Oil: A Luxurious Treat for Skin and Hair

   · Taxonomy evidence: The supplier describes its own cold-pressed offerings with different final refinement declarations, illustrating why an extraction claim alone cannot determine this axis. It also discloses standardization with vegetable oils for its named refined cosmetic-grade offering. That specific offering therefore is not used as proof of an unblended refined-oil sale within the frozen boundary. These are product-specific observations, not evidence of the market's complete partition.
   ([newdirectionsaromatics.com](https://www.newdirectionsaromatics.com/blog/prickly-pear-carrier-oil-a-luxurious-treat-for-skin-and-hair))

8. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

9. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

10. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien

    · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.

    · Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.

11. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives

    · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.

    · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.

12. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA

    · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.

13. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB

    · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

14. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
15. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
16. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
17. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
18. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.

19. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
20. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

7.1. Unrefined

Table 6. Global Prickly Pear Seed Oil Market Size, by Unrefined, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 7. Global Prickly Pear Seed Oil Market Size, by Unrefined, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 8. Global Prickly Pear Seed Oil Market Size, by Unrefined, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles

   · Taxonomy evidence: The brand's specific oil declaration names Opuntia Stricta Seed Oil as its sole ingredient and explicitly describes the oil as unrefined. This corroborates an in-boundary product specification, not the market partition or 2025 sales.
   ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

2. ACO Certification Ltd - COSMOS certificate 10282 and certified product annex

   · Taxonomy evidence: The inspected 2026 ACO certification annex lists a cosmetic raw material named Prickly Pear Virgin Oil. This independently corroborates use of the virgin commercial designation within the relevant product context, but does not establish 2025 transactions or universal equivalence between virgin and unrefined labels.
   ([newdirections.com.au](https://www.newdirections.com.au/WebRoot/Store/Shops/newdirections/MediaGallery/Certificates/PDF/Australian-COSMOS-Certified-xx.xx-Certificate.pdf))

3. Prickly Pear Carrier Oil: A Luxurious Treat for Skin and Hair

   · Taxonomy evidence: The supplier explicitly identifies its own prickly pear carrier-oil offerings as seed-derived and unrefined. This corroborates commercial use of the Unrefined specification independently of whether an offering carries organic wording; it does not establish fulfilled sales or market share.
   ([newdirectionsaromatics.com](https://www.newdirectionsaromatics.com/blog/prickly-pear-carrier-oil-a-luxurious-treat-for-skin-and-hair))

4. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
5. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
6. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
7. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
8. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
9. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
10. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

11. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
12. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.

13. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
14. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.

15. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

16. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
17. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
18. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

19. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
20. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
21. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
22. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
23. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

7.2. Refined

Table 9. Global Prickly Pear Seed Oil Market Size, by Refined, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 10. Global Prickly Pear Seed Oil Market Size, by Refined, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 11. Global Prickly Pear Seed Oil Market Size, by Refined, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: Refined oil is explicitly described in onward-sale packaging; the passage does not establish every offering's unblended composition. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Taxonomy evidence: The study explicitly describes refined prickly pear seed oil being packaged for onward sale, establishing recognition of refined oil in the European cosmetics value chain. It does not establish globally representative 2025 sales or verify the unblended composition of every refined offering. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

3. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

4. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien

   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.

5. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
6. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.

10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

13. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
14. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
15. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

16. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
17. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
18. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
19. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
20. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.

21. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

8. Prickly Pear Seed Oil Market, by Application

Cosmetics and Personal Care contains distinct purchasing opportunities rather than one interchangeable beauty application. ▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪ ▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ An ingredient seller pursuing a hair-product brief must address that buyer's acceptance requirements rather than transfer the standalone facial-oil selling proposition unchanged.

Personal Cleansing, Nail Care, and Color Cosmetics also have identifiable product contexts. Sand Rarity's Face Soap listing on Business France's marketplace declares the seed oil; Kehleia's Grounded for Hands names it in a nail-and-cuticle product; and Monika Blunder Beauty's Sweet Talk Lip Oil declares it in a pigmented lip product. ▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪

▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ Product-specific lawful access remains unresolved for these ingestible examples; intended-use labeling and the relevant legal basis should be reconciled before commercial commitment. Culinary positioning does not establish acceptance for a beverage brief.

Pharmaceuticals has a narrower documented example: DailyMed's label for Eminence Daily Defense Tinted SPF identifies Opuntia ficus-indica seed oil as an inactive ingredient in an OTC Monograph Drug. This establishes a labeled excipient application, not therapeutic efficacy or authorization of the oil as a standalone medicine. ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪

Figure 10. Global Prickly Pear Seed Oil Market Size, by Application, 2025 (%)

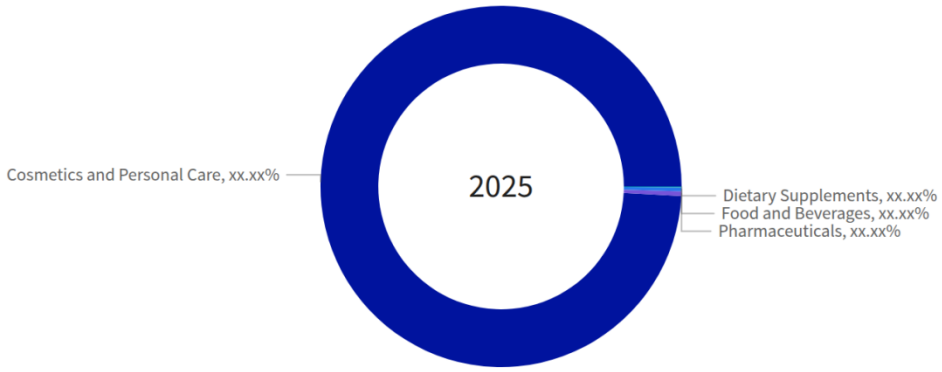

Figure 11. Global Prickly Pear Seed Oil Market, by Application, 2032 (USD Million)

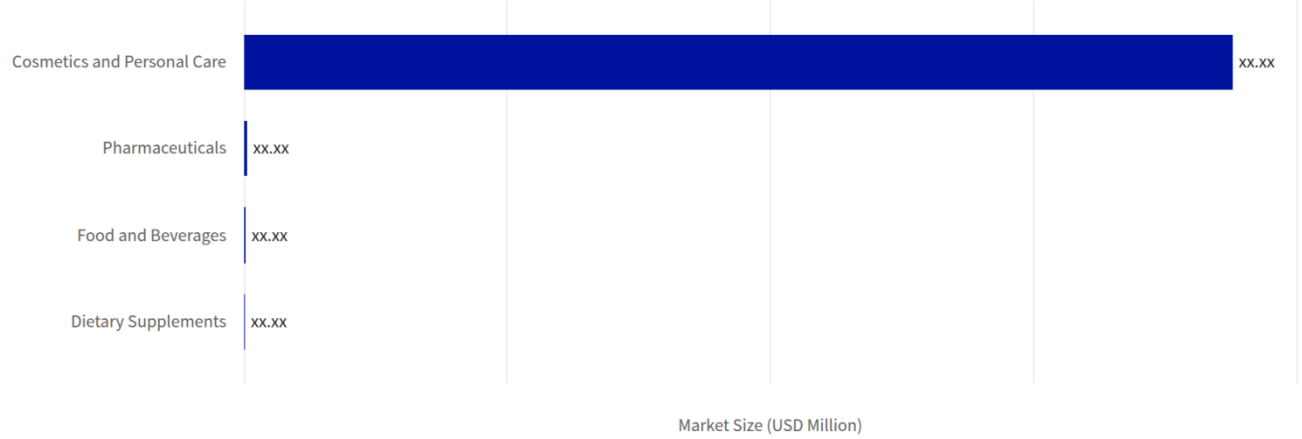

Table 12. Global Prickly Pear Seed Oil Market, by Application growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 13. Global Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   - Leven Rose presents a standalone seed oil for skin and hair care, supporting a direct-use Skin Care example. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
2. Novel Food | European Commission
   - The European Commission states that novel foods require premarket authorization. The general framework does not determine the exact advertised seed oil's status. ([food.ec.europa.eu](https://food.ec.europa.eu/food-safety/novel-food_en))
3. New Dietary Ingredient Notification Process | FDA
   - FDA describes notification obligations for manufacturers and distributors marketing supplements containing new dietary ingredients; applicability to a specific oil requires separate determination. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
4. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
   - The named Christophe Robin hair-mask version declares Opuntia ficus-indica seed oil and is marked out of stock. It establishes an application example, not continuing availability. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

5. Face Soap with Organic Prickly Pear Seed oil - Sand Rarity | Business France Marketplace
   · Sand Rarity's company-attributed Face Soap listing on Business France's marketplace identifies a cleansing product and declares Opuntia ficus-indica seed oil.
   ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
6. Grounded for Hands - Kehleia
   · Kehleia identifies Grounded for Hands as nail-and-cuticle oil, declares Opuntia ficus-indica seed oil, and displays sold-out labeling.
   ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
7. Sweet Talk Lip Oil | Monika Blunder Beauty
   · Sweet Talk Lip Oil is marketed as a pigmented lip product and declares Opuntia ficus-indica seed oil, supporting a Color Cosmetics example.
   ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
8. Kaktusfeigenkernöl - Natural Pro
   · Natural Pro identifies prickly pear seed oil as the listed ingredient and advertises culinary positioning. The page does not establish destination-specific food permission or beverage acceptance.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
9. Organic prickly pear seed oil - Byron Bay Love Organics
   · Byron Bay Love Organics advertises dietary-supplement positioning for its named oil. This establishes the company's proposition, not authorization or efficacy.
   ([byronbayloveoils.com.au](https://byronbayloveoils.com.au/pages/organic-prickly-pear-seed-oil))
10. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil - David Jones Pharmacy
    · David Jones Pharmacy's branded-oil listing contains both dietary-supplement language and an external-use-only warning, leaving definitive intended use unresolved.
    ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    · Taxonomy evidence: The contradictory intended-use descriptions show why multipurpose advertising alone cannot support a clean application allocation. This is a limitation of the specific listing, not proof that every supplement-positioned offering is contradictory.
    ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting.
    ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting.
    ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

11. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

- DailyMed's Eminence Daily Defense Tinted SPF record lists Opuntia ficus-indica seed oil as inactive and identifies the product as an OTC Monograph Drug. This supports a labeled excipient example, not standalone therapeutic permission. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
- Taxonomy evidence: This drug-designated downstream formulation demonstrates why an appearance-related sunscreen product cannot automatically be allocated to cosmetic-only use. Single allocation to Pharmaceuticals is the report's modeling convention. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
- Taxonomy evidence: The record supports retaining a drug-formulation application alongside cosmetic uses, with explicit single allocation of hybrids. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

12. Entering the European market for prickly pear seed oil for cosmetics

- Taxonomy evidence: Skin-care and hair-care uses are identified separately from the roles of ingredient intermediaries. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: The December xx.xx 2023, government commercial guidance identifies downstream cosmetic product categories separately from importers, refiners, and manufacturers. Its European scope does not establish global allocations. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

13. Frequently asked questions ON ORGANIC RULES - March 19, 2025

· Taxonomy evidence: The document does not permit cosmetic positioning or certification terminology to establish lawful ingestible use. Separate destination-specific food-status evidence remains necessary. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Taxonomy evidence: The document makes final intended use consequential to the oil's regulatory treatment, supporting separation of cosmetic and ingestible purposes. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

14. Is It a Cosmetic, a Drug, or Both? (Or Is It Soap?)

· Taxonomy evidence: FDA explains that intended use distinguishes cosmetics from drugs and that a product can meet both definitions. This supports an explicit allocation rule, not a universal global regulatory designation. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))

15. Information for Consumers on Using Dietary Supplements

· Taxonomy evidence: The official distinction between supplement marketing and premarket approval supports keeping intended-use identification separate from authorization conclusions. ([fda.gov](https://www.fda.gov/food/dietary-supplements/information-consumers-using-dietary-supplements))

16. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

· Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

17. UNIDO - The development of a new agro-industrial value chain in Tunisia

· Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

· Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

18. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien

· Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.

· Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.

19. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
20. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
21. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
22. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
23. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))

24. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

8.1. Cosmetics and Personal Care

Table 14. Global Prickly Pear Seed Oil Market, by Cosmetics and Personal Care growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 15. Global Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 16. Global Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 17. Global Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: The guidance identifies skin care and hair care as principal cosmetic uses of prickly pear seed oil.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

2. The European market potential for prickly pear seed oil for cosmetics

   · Taxonomy evidence: The December xx.xx 2023, government publication distinguishes standalone facial oil from oil incorporated into downstream cosmetic products.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))

3. Import Product Information: Prickly Pear Seed Oil

   · Taxonomy evidence: The German government-funded import-promotion factsheet identifies direct cosmetic use and incorporation into skin- and hair-care products. Only these commercial application statements are used.
   ([importpromotiondesk.de](https://www.importpromotiondesk.de/fileadmin/Importeure_Brancheninformation/NI/210617_IPFS_Prickly_pear_seed_oil_final.pdf))

4. Is It a Cosmetic, a Drug, or Both? (Or Is It Soap?)
   - Taxonomy evidence: FDA recognizes cleansing, beautifying, and appearance-related product purposes as cosmetic uses and distinguishes them from therapeutic drug purposes. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))
5. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
6. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
7. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
8. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
9. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
10. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
11. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

12. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))

13. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
14. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

15. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

16. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
17. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
18. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

19. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

20. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

21. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

22. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
23. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
24. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
25. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))

26. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))

27. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

8.1.1. Skin Care

Table 18. Global Prickly Pear Seed Oil Market Size, by Skin Care, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 19. Global Prickly Pear Seed Oil Market Size, by Skin Care, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 20. Global Prickly Pear Seed Oil Market Size, by Skin Care, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: Named skin-care product classes include facial oils, serums, moisturizers, and eye creams.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

2. The European market potential for prickly pear seed oil for cosmetics

   · Taxonomy evidence: The publication identifies moisturizers, serums, facial masks, and standalone facial oil as commercial product forms.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))

3. Import Product Information: Prickly Pear Seed Oil

   · Taxonomy evidence: The application section identifies moisturizing and skin-care product purposes.
   ([importpromotiondesk.de](https://www.importpromotiondesk.de/fileadmin/Importeure_Brancheninformation/NI/210617_IPFS_Prickly_pear_seed_oil_final.pdf))

4. Is It a Cosmetic, a Drug, or Both? (Or Is It Soap?)

   · Taxonomy evidence: FDA distinguishes cosmetic massage-oil purposes from therapeutic claims. This is a classification distinction, not evidence of efficacy for prickly pear seed oil.
   ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))

5. Hyatt Regency Casablanca Spa Brochure

   · Taxonomy evidence: The advertised facial service supplies a professional skin-care use example. Treatment fees are outside the oil-only revenue boundary.
   ([hyatt.com](https://www.hyatt.com/content/dam/hotel/propertysites/assets/regency/casab/documents/en_us/home/Brochure%20SPA%20English.pdf))

6. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

7. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
8. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
9. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
10. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
11. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
12. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

13. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
14. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))

15. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
16. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

17. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
18. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
19. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

20. 2025 Annual Results | L'Oréal Finance

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

21. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

22. L'Oreal - 2024 Consolidated Financial Statements

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

23. Prickly pear seed oil | SOPHIM

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

24. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

8.1.2. Hair Care

Table 21. Global Prickly Pear Seed Oil Market Size, by Hair Care, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 22. Global Prickly Pear Seed Oil Market Size, by Hair Care, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 23. Global Prickly Pear Seed Oil Market Size, by Hair Care, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: Hair-care products are identified as a downstream seed-oil application; individual branded formulations still require ingredient-identity checks. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

2. The European market potential for prickly pear seed oil for cosmetics

   · Taxonomy evidence: Hair-care products are explicitly included among downstream applications. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))

3. Import Product Information: Prickly Pear Seed Oil

   · Taxonomy evidence: The application section separately identifies hair-care formulations as a use class. ([importpromotiondesk.de](https://www.importpromotiondesk.de/fileadmin/Importeure_Brancheninformation/NI/210617_IPFS_Prickly_pear_seed_oil_final.pdf))

4. Regenerating Mask with Rare Prickly Pear Oil - Christophe Robin

   · Taxonomy evidence: A specific Christophe Robin hair-mask catalog version explicitly declares Opuntia ficus-indica seed oil. The inspected page is marked out of stock; it corroborates a formulated hair-care application but not current sales or every product version. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

5. Reinforce Shampoo Prickly Pear - Levia

   · Taxonomy evidence: Levia's Reinforce Shampoo description refers to prickly pear oil, but its declared ingredient list identifies Opuntia vulgaris extract rather than seed oil. This record cannot independently establish in-scope seed-oil consumption and illustrates the need for product-identity checks. ([levia-paris.fr](https://www.levia-paris.fr/?product=reinforce-shampoo-prickly-pear-500ml))

6. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
7. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
8. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
9. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
10. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
11. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
12. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

13. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
14. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
15. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

16. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

17. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
18. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
19. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

20. 2025 Annual Results | L'Oréal Finance

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

21. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

22. L'Oreal - 2024 Consolidated Financial Statements

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

23. Prickly pear seed oil | SOPHIM

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

24. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

8.1.3. Color Cosmetics

Table 24. Global Prickly Pear Seed Oil Market Size, by Color Cosmetics, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 25. Global Prickly Pear Seed Oil Market Size, by Color Cosmetics, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 26. Global Prickly Pear Seed Oil Market Size, by Color Cosmetics, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Sweet Talk Lip Oil - Monika Blunder Beauty

   · Taxonomy evidence: Monika Blunder Beauty's Sweet Talk Lip Oil is marketed as lip makeup in multiple shades and explicitly declares prickly pear seed oil. It corroborates decorative-cosmetics use, not sales of the oil input. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

3. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
4. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
5. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
6. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

12. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

14. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
15. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

19. L'Oreal - 2024 Consolidated Financial Statements
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

8.1.4. Personal Cleansing

Table 27. Global Prickly Pear Seed Oil Market Size, by Personal Cleansing, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 28. Global Prickly Pear Seed Oil Market Size, by Personal Cleansing, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 29. Global Prickly Pear Seed Oil Market Size, by Personal Cleansing, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Face Soap - Sand Rarity

   · Taxonomy evidence: Sand Rarity's official Face Soap record describes a face-cleansing product and explicitly declares Opuntia ficus-indica seed oil. This corroborates a downstream personal-cleansing application without counting finished-soap revenue. ([sandrarity.com](https://www.sandrarity.com/en/product/savon-visage/))

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
3. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
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   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
4. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
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   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
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   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

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13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
19. L'Oreal - 2024 Consolidated Financial Statements
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
20. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))

8.1.5. Nail Care

Table 30. Global Prickly Pear Seed Oil Market Size, by Nail Care, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 31. Global Prickly Pear Seed Oil Market Size, by Nail Care, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 32. Global Prickly Pear Seed Oil Market Size, by Nail Care, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Grounded for Hands - Kehleia

   · Taxonomy evidence: Kehleia's Grounded for Hands is explicitly offered as nail-and-cuticle oil and declares Opuntia ficus-indica seed oil. The page contains sold-out labeling, so it supports a category example rather than continuous availability. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

3. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
4. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
5. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
6. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

12. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

14. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
15. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

19. L'Oreal - 2024 Consolidated Financial Statements

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

20. Prickly pear seed oil | SOPHIM

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

8.2. Pharmaceuticals

Table 33. Global Prickly Pear Seed Oil Market Size, by Pharmaceuticals, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 34. Global Prickly Pear Seed Oil Market Size, by Pharmaceuticals, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 35. Global Prickly Pear Seed Oil Market Size, by Pharmaceuticals, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

   · Taxonomy evidence: The inspected label lists Opuntia ficus-indica seed oil among inactive ingredients and classifies the sunscreen as an OTC Monograph Drug, with reported marketing beginning June xx.xx 2024. This establishes a labeled excipient application, not approval of the oil, therapeutic efficacy or fulfilled oil purchases. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

   · Taxonomy evidence: The DailyMed label for Eminence Daily Defense Tinted SPF lists Opuntia ficus-indica seed oil as an inactive ingredient and identifies the finished product as an OTC Monograph Drug, with a reported marketing start of June xx.xx 2024. This establishes a labeled excipient application, not approval of the oil itself. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

2. Is It a Cosmetic, a Drug, or Both? (Or Is It Soap?)
   · Taxonomy evidence: FDA explains that cosmetic/drug combinations must meet both regulatory regimes; cosmetic positioning alone cannot exclude a drug-designated downstream product. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-laws-regulations/it-cosmetic-drug-or-both-or-it-soap))
3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
5. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
7. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
8. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

10. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
11. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.

12. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
- Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
- Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

13. Entering the European market for prickly pear seed oil for cosmetics | CBI
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

14. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

15. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
16. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
17. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

18. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
19. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

8.3. Food and Beverages

Table 36. Global Prickly Pear Seed Oil Market Size, by Food and Beverages, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 37. Global Prickly Pear Seed Oil Market Size, by Food and Beverages, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 38. Global Prickly Pear Seed Oil Market Size, by Food and Beverages, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Frequently asked questions ON ORGANIC RULES - March 19, 2025

   · Taxonomy evidence: The March xx.xx 2025 Commission guidance distinguishes edible prickly pear fruit from its seed oil and states that the oil had not then been assessed under novel-food rules. This remains a dated statement, not evidence of current authorization or realized food sales.
   ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

   · Taxonomy evidence: The European Commission document dated March xx.xx 2025, distinguishes edible prickly pear fruit from its seed oil and states that the oil had not yet been assessed under novel-food rules. This dated statement does not establish current authorization.
   ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
   ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
   ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

2. Kaktusfeigenkernöl - Natural Pro

   · Taxonomy evidence: The direct product page identifies prickly pear seed oil as its listed ingredient and advertises culinary positioning. It also displays inconsistent availability signals. This supports advertised intended use only, not lawful food status, completed sales or beverage participation.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))

   · Taxonomy evidence: Natural Pro's direct product record identifies prickly pear seed oil as the listed ingredient and markets the standalone oil for culinary purposes. The page presents inconsistent availability signals. This establishes advertised food positioning, not lawful food status or completed sales.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales.
   ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))

3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
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   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
5. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
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   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

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    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
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    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
12. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

13. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
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16. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
17. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
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18. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
19. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

8.4. Dietary Supplements

Table 39. Global Prickly Pear Seed Oil Market Size, by Dietary Supplements, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 40. Global Prickly Pear Seed Oil Market Size, by Dietary Supplements, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 41. Global Prickly Pear Seed Oil Market Size, by Dietary Supplements, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Frequently asked questions ON ORGANIC RULES - March 19, 2025

   · Taxonomy evidence: The seed-oil-specific food-status discussion prevents inferring lawful ingestion merely from the plant's edible fruit or general botanical-supplement positioning. It does not establish a supplement-specific authorization.
   ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
   ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
   ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

2. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml - David Jones Pharmacy

   · Taxonomy evidence: The retailer's listing simultaneously contains dietary-supplement positioning and an external-use-only warning. It reports a stock-information check dated July xx.xx 2026. The contradictory descriptions do not resolve the definitive on-pack designation, lawful ingestible status or supplement-use transactions.
   ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

   · Taxonomy evidence: David Jones Pharmacy's specific listing for the same branded seed oil repeats dietary-supplement positioning but also carries an external-use-only warning. These conflicting intended-use statements prevent treating the offer as an unambiguous ingestible product.
   ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting.
   ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting.
   ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))

3. Information for Consumers on Using Dietary Supplements

   · Taxonomy evidence: FDA states that dietary supplements are not approved for safety and effectiveness before marketing. A commercial supplement claim therefore cannot be treated as product approval. This general rule does not establish seed-oil-specific status.
   ([fda.gov](https://www.fda.gov/food/dietary-supplements/information-consumers-using-dietary-supplements))

4. Organic Prickly Pear Seed Oil - Byron Bay Love Organics

   · Taxonomy evidence: Byron Bay Love Organics' specific seed-oil page expressly promotes dietary-supplement use alongside skin-care uses. This is company-advertised positioning only; it does not establish an authorized supplement label, efficacy, or completed ingestion-related sales.
   ([byronbayloveoils.com.au](https://byronbayloveoils.com.au/pages/organic-prickly-pear-seed-oil))

5. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

6. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
7. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
8. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
9. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
10. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
11. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

12. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
13. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
14. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

15. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
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20. 2025 Annual Results | L'Oréal Finance
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- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

21. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

22. New Dietary Ingredient Notification Process | FDA
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

9. Prickly Pear Seed Oil Market, by End User

Manufacturers and Formulators purchase an ingredient against a downstream product responsibility. ■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■ ■■■ ■■■ ■■■■■ ■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■■■■■■■■ ■■■■ ■■■■■■■■ ■■ ■■■■ ■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■■ ■ ■■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■ ■■■■■■■■■■ Ingredient sellers should therefore identify who controls ingredient acceptance and the purchasing commitment rather than assume that every brand named on a finished product is the procurement principal.

Professional Service Providers can purchase oil for service consumption without purchasing a formulation ingredient. ■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■ ■ ■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■■■■■■ ■■■■ ■■■■ ■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■ ■■■ ■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■ ■■■ ■■■■■■■■■■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■ Neither the service menu nor a trade enquiry establishes an exclusive appointment.

Individuals and Households encounter a completed product proposition, illustrated by Leven Rose's standalone oil marketed for skin and hair care. ■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■■■ ■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■ ■■ ■■■■■■■■■ ■■■ ■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■ ■■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■ A bottle presentation or online order does not, by itself, establish that the purchaser is a household; professional buyers may also purchase finished direct-use products.

Figure 12. Global Prickly Pear Seed Oil Market Size, by End User, 2025 (%)

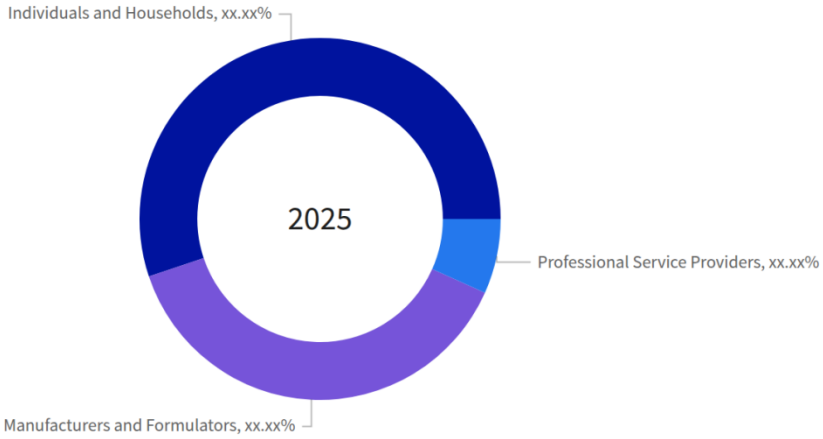

Figure 13. Global Prickly Pear Seed Oil Market, by End User, 2032 (USD Million)

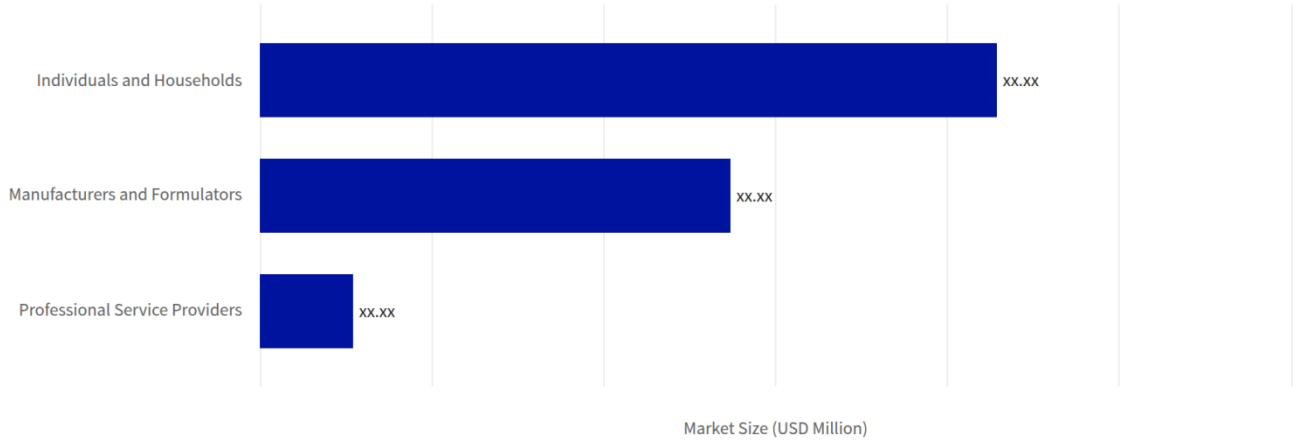

Table 42. Global Prickly Pear Seed Oil Market, by End User growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 43. Global Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose

   · The brand's own standalone-product proposition provides a household-facing purchasing example, without identifying actual purchasers' roles. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))

   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.

   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.

2. Prickly pear seed oil | SOPHIM

   · SOPHIM offers documentation and commercial enquiry routes for its named Prickly Pear Seed Oil ingredient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.

3. Grounded for Hands - Kehleia

   · Kehleia states that its named preparation is made in-house, supporting a formulator role without identifying its oil supplier. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.

4. Hyatt Regency Casablanca Spa Brochure
   - Hyatt Regency Casablanca's spa brochure advertises a facial service involving pure prickly pear seed oil, establishing an advertised professional direct-use setting rather than continuing procurement. ([hyatt.com](https://www.hyatt.com/content/dam/hotel/propertysites/assets/regency/casab/documents/en_us/home/Brochure%20SPA%20English.pdf))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
5. Vous êtes un professionnel - Comptoir des Huiles
   - Comptoir des Huiles' professional reseller page provides trade-platform routes and invites private-label enquiries. It does not establish an exclusive appointment or a particular spa customer. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
6. Entering the European market for prickly pear seed oil for cosmetics
   - Taxonomy evidence: The value chain distinguishes cosmetic manufacturers, reselling intermediaries and retail consumers. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
   - Taxonomy evidence: The value-chain discussion distinguishes cosmetic manufacturers and retail consumers from intermediary importers, distributors, and refiners. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
7. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

8. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
9. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
10. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
11. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
12. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
13. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

14. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
15. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

16. Global Wellness Economy Monitor 2025

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.

9.1. Individuals and Households

Table 44. Global Prickly Pear Seed Oil Market Size, by Individuals and Households, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 45. Global Prickly Pear Seed Oil Market Size, by Individuals and Households, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 46. Global Prickly Pear Seed Oil Market Size, by Individuals and Households, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

- Taxonomy evidence: The retail discussion explicitly identifies standalone seed oil sold to consumers. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

2. Kaktusfeigenkernöl - Natural Pro
   - Taxonomy evidence: The consumer-facing culinary offer corroborates an intended private-use purchasing setting; no actual purchaser identities or household transactions are disclosed. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
3. The European market potential for prickly pear seed oil for cosmetics
   - Taxonomy evidence: The discussion identifies consumer demand for standalone natural cosmetic oils; it does not measure household seed-oil purchases. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
4. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
5. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
6. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
7. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
8. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
9. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

10. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
11. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.

12. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
13. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

14. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

15. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
16. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
17. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

18. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
19. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
20. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.

9.2. Manufacturers and Formulators

Table 47. Global Prickly Pear Seed Oil Market Size, by Manufacturers and Formulators, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 48. Global Prickly Pear Seed Oil Market Size, by Manufacturers and Formulators, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 49. Global Prickly Pear Seed Oil Market Size, by Manufacturers and Formulators, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: Cosmetic manufacturers are described as ingredient purchasers sourcing through importers or directly from exporters. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.

2. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

   · Taxonomy evidence: The label documents incorporation of seed oil into a downstream drug formulation. It identifies a labeler but does not establish which entity purchased the oil or fulfilled procurement quantities. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

3. Face Soap - Sand Rarity

   · Taxonomy evidence: The product declaration establishes an example of seed-oil incorporation into a commercially offered cosmetic formulation; it does not disclose the oil purchaser or procurement volume. ([sandrarity.com](https://www.sandrarity.com/en/product/savon-visage/))

4. Sweet Talk Lip Oil - Monika Blunder Beauty

   · Taxonomy evidence: The downstream product's ingredient declaration demonstrates incorporation into a makeup formulation, while leaving the actual oil-purchasing entity and quantities unidentified. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

5. Grounded for Hands - Kehleia

   · Taxonomy evidence: The brand states that this downstream preparation is made in-house, corroborating a formulator role for this specific offering without establishing purchased seed-oil quantities. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.

6. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

7. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
8. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
9. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
10. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
11. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
12. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

13. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
14. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.

15. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
16. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

17. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
18. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
19. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

20. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

21. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

22. Prickly pear seed oil | SOPHIM
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.

23. Global Wellness Economy Monitor 2025
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.

9.3. Professional Service Providers

Table 50. Global Prickly Pear Seed Oil Market Size, by Professional Service Providers, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 51. Global Prickly Pear Seed Oil Market Size, by Professional Service Providers, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 52. Global Prickly Pear Seed Oil Market Size, by Professional Service Providers, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Hyatt Regency Casablanca Spa Brochure

   · Taxonomy evidence: Hyatt Regency Casablanca's official spa brochure advertises a facial service explicitly using pure prickly pear seed oil. This is demand-side evidence of a professional direct-use setting, not proof of purchased quantities or delivered treatments. ([hyatt.com](https://www.hyatt.com/content/dam/hotel/propertysites/assets/regency/casab/documents/en_us/home/Brochure%20SPA%20English.pdf))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

3. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
4. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
5. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
6. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.

11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
- Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
- Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

12. Entering the European market for prickly pear seed oil for cosmetics | CBI
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.

13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

14. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
15. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
19. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.

10. Prickly Pear Seed Oil Market, by Supply Format

Bulk Packaging and Consumer Packaging distinguish the commercial presentation of the oil rather than its sales channel or the buyer's organizational identity. Jedwards advertises wholesale bulk ingredient supply, whereas Comptoir des Huiles presents standalone bottle and roll-on offerings. ■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■ ■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■■■■■■ ■■■■ ■ ■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■ ■■■■■■■■■■ ■■■■■■■■

Changing the presentation can change the qualification responsibilities attached to it. ■■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■■■■■■■■ ■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■ ■■■■■■■■ ■■ ■■■ ■■■■■■■■■■■■■■■ ■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■■■■■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■ ■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■■■ ■■■■■ ■■■■■■■■ ■ ■■■■■■■■■■■■ ■■ ■■■■■ ■■■■■■■ ■■■■ ■■■■■■■■■■ ■ ■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■ ■■ ■■■■■■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■■■■ Ready-labeled supply may suit a buyer that does not require its own branding; repacking offers presentation control only when the applicable certification and market-placement responsibilities are secured.

Figure 14. Global Prickly Pear Seed Oil Market Size, by Supply Format, 2025 (%)

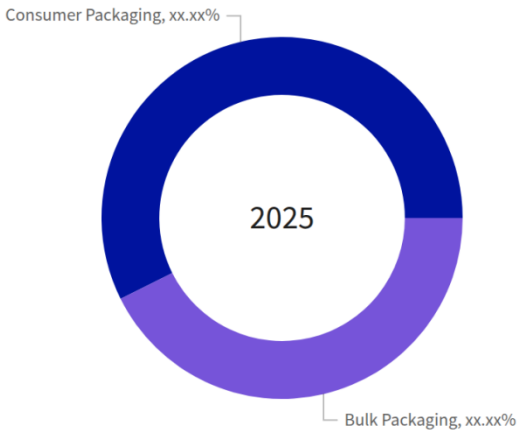

Figure 15. Global Prickly Pear Seed Oil Market, by Supply Format, 2032 (USD Million)

Table 53. Global Prickly Pear Seed Oil Market, by Supply Format growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 54. Global Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Prickly Pear Seed Oil - Virgin Organic | Jedwards International

   · Jedwards identifies itself as a wholesale bulk supplier of the named oil. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))

   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.

   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.

2. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025

   · The September 2025 COSMOS guide distinguishes distributor repacking and replacement labeling from unchanged material retaining the manufacturer's label, with different certification consequences. ([media.cosmos-standard.org](https://media.cosmos-standard.org/filer_public/xx.xx/a2/43a20531-d35d-46c2-xx.xx-50a4f145d2b1/cosmos-standard_technical_guide_v4-xx.xx.pdf))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.

3. Legislation - Cosmetics | European Commission
   - The European Commission identifies the EU responsible-person requirement and a safety report before finished-cosmetic market placement. These responsibilities are distinct from buying an ingredient presentation.
   ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
4. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
   - The brand presents bottle and roll-on versions of its standalone oil.
   ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
5. Issue brief - ISO definitions of key terms for plastic pollution
   - Taxonomy evidence: ISO's packaging vocabulary distinguishes supply-chain functions. Its broad bulk definition concerns loose materials or liquids in transport/storage, while consumer packaging concerns final-user sales units. Their adaptation into an exclusive ingredient-versus-standalone presentation model is analytical, not a literal standardized binary.
   ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))
   - Taxonomy evidence: The packaging vocabulary distinguishes industrial supply-chain packaging, final-user sales packaging, and outer transport packaging. Applying these functions to the oil-containing sales unit is an analytical adaptation, not a package-size segmentation.
   ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))
6. The European market potential for prickly pear seed oil for cosmetics
   - Taxonomy evidence: The product description identifies both standalone oil sales and oil supplied as an ingredient, supporting distinct commercial presentation functions without establishing their global proportions.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))
7. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
8. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

9. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
10. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
11. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
12. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
13. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
14. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.

15. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
16. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canisters and drums corroborate ingredient-handling presentations. The guidance does not disclose their annual global sales value.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canisters and drums corroborate ingredient-handling presentations. The guidance does not disclose their annual global sales value.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Retail oil bottles of xx.xx xx.xx and xx.xx mL corroborate completed standalone presentations, not their global purchased mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Retail oil bottles of xx.xx xx.xx and xx.xx mL corroborate completed standalone presentations, not their global purchased mix.
17. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.

10.1. Consumer Packaging

Table 55. Global Prickly Pear Seed Oil Market Size, by Consumer Packaging, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 56. Global Prickly Pear Seed Oil Market Size, by Consumer Packaging, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 57. Global Prickly Pear Seed Oil Market Size, by Consumer Packaging, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: The retail discussion separately identifies consumer bottles of the oil. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Taxonomy evidence: The guidance separately documents consumer retail bottles of prickly pear seed oil. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Retail oil bottles of xx.xx xx.xx and xx.xx mL corroborate completed standalone presentations, not their global purchased mix.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Retail oil bottles of xx.xx xx.xx and xx.xx mL corroborate completed standalone presentations, not their global purchased mix.

2. Issue brief - ISO definitions of key terms for plastic pollution

   · Taxonomy evidence: Consumer, retail and sales packaging are defined around a completed sales unit for the final user. Extending this function to professional direct-use oil units is a disclosed modeling decision. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

   · Taxonomy evidence: Consumer, retail, or sales packaging is distinguished by its function as a completed sales unit for the final user. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

3. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles

   · Taxonomy evidence: The same offering displays standalone bottle and roll-on presentations, corroborating completed direct-use packaging independently of an assumed household buyer. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.

4. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

5. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
6. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
7. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
8. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
9. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
10. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

11. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.

12. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
13. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

14. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

15. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
16. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
17. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

18. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
19. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
20. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
21. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
22. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.

10.2. Bulk Packaging

Table 58. Global Prickly Pear Seed Oil Market Size, by Bulk Packaging, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 59. Global Prickly Pear Seed Oil Market Size, by Bulk Packaging, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 60. Global Prickly Pear Seed Oil Market Size, by Bulk Packaging, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: Canisters and drums are recognized oil-shipment presentations, corroborating ingredient-handling packaging. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Taxonomy evidence: The December xx.xx 2023 European guidance identifies canisters and drums as commercial oil-shipment presentations. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canisters and drums corroborate ingredient-handling presentations. The guidance does not disclose their annual global sales value.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canisters and drums corroborate ingredient-handling presentations. The guidance does not disclose their annual global sales value.

2. Issue brief - ISO definitions of key terms for plastic pollution

   · Taxonomy evidence: The vocabulary separately recognizes industrial packaging for manufacturer/intermediary distribution. This supports the ingredient-handling interpretation without imposing a numerical size threshold. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

   · Taxonomy evidence: The vocabulary recognizes bulk packaging for liquids in transport or storage and industrial packaging for manufacturer or intermediary supply. ([iso.org](https://www.iso.org/files/live/sites/isoorg/files/store/en/PUB100472.pdf))

3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

4. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

5. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
7. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
8. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

10. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
11. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.

12. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

14. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
15. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
19. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
20. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.

11. Prickly Pear Seed Oil Market, by Sales Channel

Direct Sales and Intermediated Sales cannot be distinguished by whether an order is placed online. ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ INKY Ingredients' referral to its parent O&xx.xx for matching product documentation also shows why different storefront names need not represent independent supply relationships.

For European ingredient entry, CBI's December 2023 guidance describes importers and distributors coordinating specifications and certifications while the exporter remains responsible for providing them. An exporter with that coordination gap can evaluate an intermediary against a written document-handling and delivery commitment. ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪

Territorial fulfillment remains seller-specific within either route. ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ Buyers seeking a replacement channel should confirm the exact offering, destination, documentation access, and contractual principal before treating a visible listing as an accessible alternative.

Figure 16. Global Prickly Pear Seed Oil Market Size, by Sales Channel, 2025 (%)

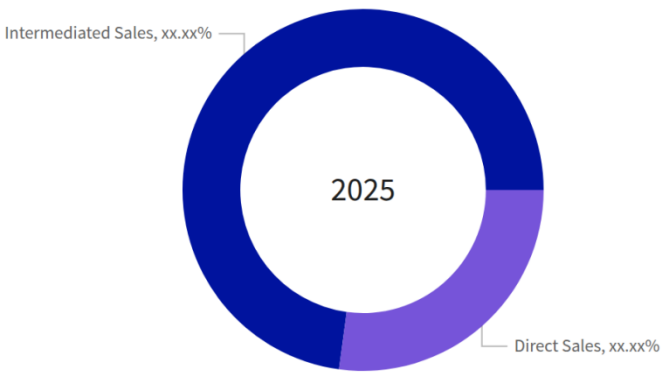

Figure 17. Global Prickly Pear Seed Oil Market, by Sales Channel, 2032 (USD Million)

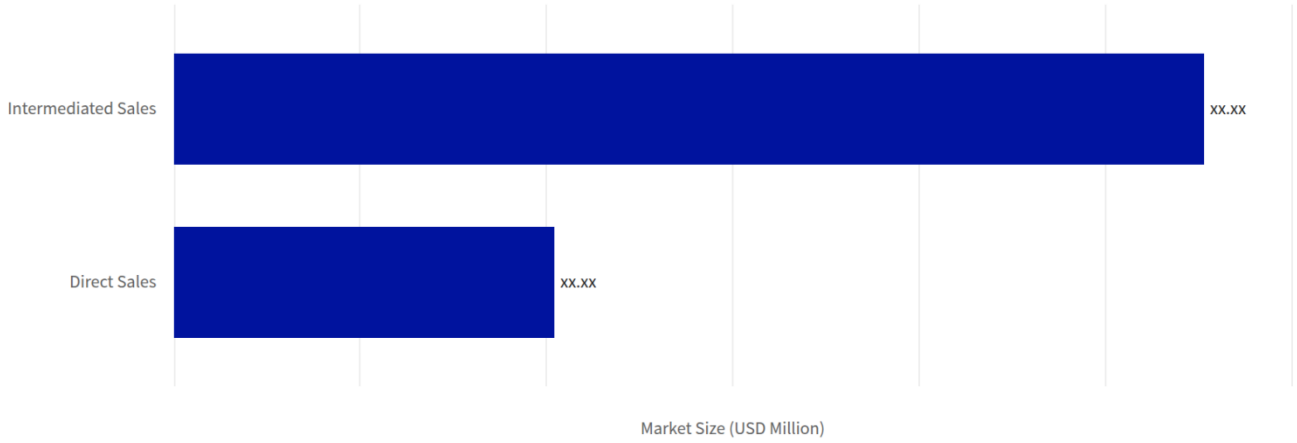

Table 61. Global Prickly Pear Seed Oil Market, by Sales Channel growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 62. Global Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose

- Leven Rose offers the product through its brand storefront and states that it does not ship internationally. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

2. Prickly Pear Seed Oil - Virgin Organic | Jedwards International
   - Jedwards discloses a wholesale role, U.S. and Canadian e-commerce coverage, and enquiry-based international business requiring wire payment. Its general statement does not settle each destination. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The online wholesale offering demonstrates why online ordering does not establish direct sales; its price is an input check, not independent forecast evidence.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The online wholesale offering demonstrates why online ordering does not establish direct sales; its price is an input check, not independent forecast evidence.
3. Entering the European market for prickly pear seed oil for cosmetics | CBI
   - The guidance describes importer/distributor documentation coordination, retains the supplier's obligation to provide records, and recognizes direct manufacturer supply. Contractual route selection is a conditional commercial implication. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
   - Taxonomy evidence: Direct sourcing, merchant distribution and commission agency are distinguished, supporting seller-role allocation rather than an online/offline partition. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
   - Taxonomy evidence: The oil-channel model distinguishes origin suppliers, importers/distributors, retailers, and commission agents. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Larger manufacturers may source directly. This constrains the nonzero direct ingredient route retained in both anchors, without establishing its incidence.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Larger manufacturers may source directly. This constrains the nonzero direct ingredient route retained in both anchors, without establishing its incidence.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Importer-led European entry supports a substantial intermediary route; its continuation to 2032 is a modeling assumption, not an observed future share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Importer-led European entry supports a substantial intermediary route; its continuation to 2032 is a modeling assumption, not an observed future share.
4. Prickly Pear Seed Oil, Refined | INKY Ingredients
   - INKY directs buyers to parent company O&xx.xx for product documentation with matching product identifiers, establishing a disclosed affiliation rather than independent supply. ([inky-ingredients.com](https://inky-ingredients.com/products/prickly-pear-seed-oil-refined))

5. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil - David Jones Pharmacy
   - The pharmacy offers a separately branded packaged oil through its own retail listing, supporting the retailer-channel distinction. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
6. Frequently Asked Questions - Wholesale, 2022 Economic Census
   - Taxonomy evidence: The U.S. Economic Census distinguishes own-brand importers, manufacturer-affiliated selling offices, merchant activity and commission-based facilitators. These are useful role definitions, not global prickly pear oil channel measurements. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))
   - Taxonomy evidence: The commercial definitions separately identify manufacturer-controlled selling branches, commission agents, and fee-based electronic markets. The proposed seller-of-record rule uses these distinctions without treating facilitator fees as oil sales. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
7. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
8. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
9. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.

10. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
11. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
12. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
13. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
14. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
15. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.

11.1. Intermediated Sales

Table 63. Global Prickly Pear Seed Oil Market, by Intermediated Sales growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 64. Global Prickly Pear Seed Oil Market Size, by Intermediated Sales, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 65. Global Prickly Pear Seed Oil Market Size, by Intermediated Sales, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 66. Global Prickly Pear Seed Oil Market Size, by Intermediated Sales, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: The documented value chain includes independent distribution and retail stages between origin suppliers and users. ([cbi.eu](https://www.cbi.eu/sites/default/files/styles/image_large/public/2023-xx.xx/2023_NIC_PFS_ME_Prickly_pear_oil_figure-xx.xx.jpg))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Importer-led European entry supports a substantial intermediary route; its continuation to 2032 is a modeling assumption, not an observed future share.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Importer-led European entry supports a substantial intermediary route; its continuation to 2032 is a modeling assumption, not an observed future share.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Importers and distributors supply manufacturers and coordinate commercial documentation, supporting ingredient-merchant classification and the assumed sourcing relationship.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Importers and distributors supply manufacturers and coordinate commercial documentation, supporting ingredient-merchant classification and the assumed sourcing relationship.

2. Frequently Asked Questions - Wholesale, 2022 Economic Census

   · Taxonomy evidence: Agents, brokers and electronic markets can operate for commissions or fees rather than on their own account. Therefore facilitator presence alone does not establish an additional merchant oil sale. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
5. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
7. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
8. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
10. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards identifies itself as a bulk wholesaler and advertises USD xx.xx per gallon presentation. This checks the bulk value category and merchant role, not sales volume.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Jedwards identifies itself as a bulk wholesaler and advertises USD xx.xx per gallon presentation. This checks the bulk value category and merchant role, not sales volume.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The online wholesale offering demonstrates why online ordering does not establish direct sales; its price is an input check, not independent forecast evidence.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The online wholesale offering demonstrates why online ordering does not establish direct sales; its price is an input check, not independent forecast evidence.

11. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
12. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

14. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
15. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
19. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
20. Consumer behavior and sustainability: Exploring Italy’s green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.

11.1.1. Retailers

Table 67. Global Prickly Pear Seed Oil Market Size, by Retailers, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 68. Global Prickly Pear Seed Oil Market Size, by Retailers, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 69. Global Prickly Pear Seed Oil Market Size, by Retailers, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

- Taxonomy evidence: Consumer retail sales are documented without globally representative channel allocations. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Taxonomy evidence: Both online and offline retailers appear in the oil's commercial channel diagram. ([cbi.eu](https://www.cbi.eu/sites/default/files/styles/image_large/public/2023-xx.xx/2023_NIC_PFS_ME_Prickly_pear_oil_figure-xx.xx.jpg))
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
3. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
4. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
5. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
6. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
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15. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
18. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
19. Consumer behavior and sustainability: Exploring Italy’s green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.

11.1.2. Ingredient Distributors and Wholesalers

Table 70. Global Prickly Pear Seed Oil Market Size, by Ingredient Distributors and Wholesalers, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 71. Global Prickly Pear Seed Oil Market Size, by Ingredient Distributors and Wholesalers, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 72. Global Prickly Pear Seed Oil Market Size, by Ingredient Distributors and Wholesalers, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

· Taxonomy evidence: Importers and distributors supply ingredients to manufacturers; this identifies a channel, not its global volume.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

· Taxonomy evidence: Importers and distributors supply prickly pear seed oil to cosmetic manufacturers.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

· Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Importers and distributors supply manufacturers and coordinate commercial documentation, supporting ingredient-merchant classification and the assumed sourcing relationship.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Importers and distributors supply manufacturers and coordinate commercial documentation, supporting ingredient-merchant classification and the assumed sourcing relationship.

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

· Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

3. UNIDO - The development of a new agro-industrial value chain in Tunisia

· Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

· Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

4. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
5. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
6. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards identifies itself as a bulk wholesaler and advertises USD xx.xx per gallon presentation. This checks the bulk value category and merchant role, not sales volume.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Jedwards identifies itself as a bulk wholesaler and advertises USD xx.xx per gallon presentation. This checks the bulk value category and merchant role, not sales volume.
10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.

11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

13. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
14. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
15. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

16. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
17. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

11.2. Direct Sales

Table 73. Global Prickly Pear Seed Oil Market Size, by Direct Sales, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 74. Global Prickly Pear Seed Oil Market Size, by Direct Sales, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 75. Global Prickly Pear Seed Oil Market Size, by Direct Sales, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics

   · Taxonomy evidence: Direct supply from exporters to cosmetic manufacturers is documented as a commercial route. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Larger manufacturers may source directly. This constrains the nonzero direct ingredient route retained in both anchors, without establishing its incidence.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Larger manufacturers may source directly. This constrains the nonzero direct ingredient route retained in both anchors, without establishing its incidence.

2. Frequently Asked Questions - Wholesale, 2022 Economic Census

   · Taxonomy evidence: Manufacturer selling branches are defined through ownership or corporate affiliation; own-brand importing is also separately recognized. Treating controlled sellers and consumer-brand principals as direct is an explicit analytical adaptation. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

   · Taxonomy evidence: A manufacturer's sales branch or office is defined through ownership or corporate affiliation with the manufacturer, supporting treatment of controlled selling operations within a direct route. ([census.gov](https://www.census.gov/programs-surveys/economic-census/year/2022/about/faq/faq-wholesale.html))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.

3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
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   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
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   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
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   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
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    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

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    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
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    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

14. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
15. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

12. Prickly Pear Seed Oil Market, by Organic Certification Status

Certified Organic is a scheme-specific purchasing qualification, not a synonym for natural positioning. The COSMOS certified-raw-material database contains Prickly Pear Seed Oil entries for AOT and Statfold Natural Products with named certification bodies. ■■■■■■■■■■■■ ■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■ ■■■■■■■ ■■■■■■■ ■■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■■■ ■■ ■■■■ ■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■ ■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■ ■ ■■■■■■■■■■■ ■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■■

The commercial choice between Certified Organic and Not Certified Organic depends on the buyer's promised proposition and required scheme. Under USDA's framework, the relevant agricultural ingredient producers, handlers, and finished-product manufacturer must be certified. ■■■ ■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■ ■■■■■ ■■■■■■■■■ ■ ■■■■■■■ ■■■■■■■ ■■■■■■■ ■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■ ■■■ ■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■■ ■■■■■ ■■■ ■■■■■ ■■■ ■■ ■■■■ ■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■■ ■■■■■■ ■ ■■■■■■■■■ ■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■■■ ■■■■■■■■■ ■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■ ■■■ ■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■ ■■■■■ ■■ ■■■■■■■■ ■■■■■■■■ ■■■■■ ■■■■■■■

Figure 18. Global Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2025 (%)

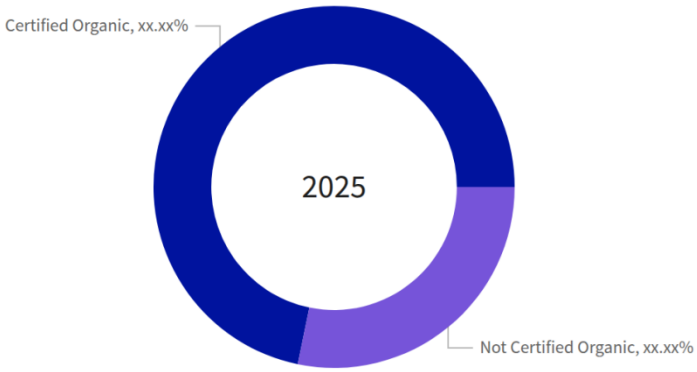

Figure 19. Global Prickly Pear Seed Oil Market, by Organic Certification Status, 2032 (USD Million)

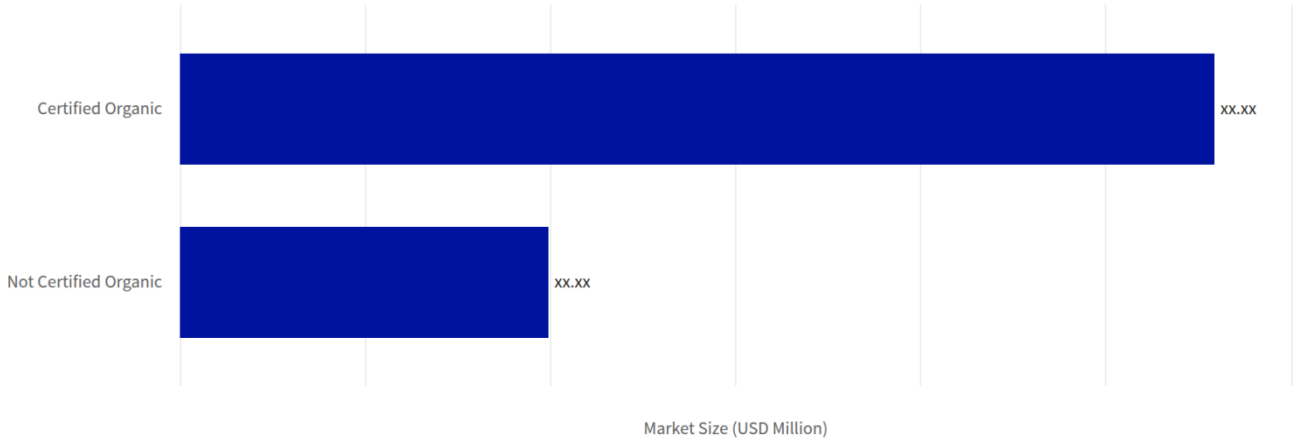

Table 76. Global Prickly Pear Seed Oil Market, by Organic Certification Status growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 77. Global Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service

   · USDA describes certification requirements covering relevant agricultural ingredient producers, handlers, and final-product manufacturers under its cosmetic organic framework. ([ams.usda.gov](https://www.ams.usda.gov/grades-standards/cosmetics-body-care-and-personal-care-products))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.

2. "Organic" Cosmetics | FDA

   · FDA states that USDA organic requirements are separate from cosmetic labeling and safety requirements and that an ingredient's source does not determine safety. ([fda.gov](https://www.fda.gov/cosmetics/cosmetics-labeling-claims/organic-cosmetics))

3. COSMOS Certification - Organic and Natural

   · COSMOS distinguishes CERTIFIED raw materials with organic content from APPROVED nonorganic raw materials eligible within its cosmetic framework. Approval is not organic certification. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))

   · Taxonomy evidence: COSMOS distinguishes certified organic-content raw materials from approved nonorganic raw materials. Natural-product approval and organic certification therefore cannot be treated as interchangeable. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))

   · Taxonomy evidence: The standard distinguishes organic-content raw-material certification from nonorganic raw-material approval and from natural finished-product certification. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.

4. COSMOS CERTIFIED - Certified Raw Materials Database
   - The COSMOS database lists Prickly Pear Seed Oil entries for AOT with IONC and Statfold Natural Products with Soil Association Certification. These are certification records, not fulfilled purchases. ([cosmos-standard.org](https://www.cosmos-standard.org/en/databases/certified-raw-materials/?page=xx.xx))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
5. Entering the European market for prickly pear seed oil for cosmetics
   - Taxonomy evidence: The guidance distinguishes organic certification from conventional ingredient approval and notes that not all oil buyers require organic certification. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance identifies a possible xx.xx%-xx.xx% organic price increment. Its midpoint anchors the modeled relative realization; global applicability and continuation through 2032 are assumptions.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance identifies a possible xx.xx%-xx.xx% organic price increment. Its midpoint anchors the modeled relative realization; global applicability and continuation through 2032 are assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance states that organic certification is not required by every buyer, supporting retention of a noncertified purchasing category without establishing its numerical share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance states that organic certification is not required by every buyer, supporting retention of a noncertified purchasing category without establishing its numerical share.
6. Frequently asked questions ON ORGANIC RULES - March 19, 2025
   - Taxonomy evidence: The guidance makes intended final use consequential: cosmetic-labeled oil is outside the specified EU agricultural organic regime. This regime-specific restriction must not be generalized to all cosmetic certification schemes. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
7. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

8. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
9. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
10. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
11. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
12. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
13. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

14. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
15. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
16. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
17. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

12.1. Certified Organic

Table 78. Global Prickly Pear Seed Oil Market Size, by Certified Organic, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 79. Global Prickly Pear Seed Oil Market Size, by Certified Organic, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 80. Global Prickly Pear Seed Oil Market Size, by Certified Organic, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. COSMOS CERTIFICATION - Organic and Natural

   · Taxonomy evidence: COSMOS CERTIFIED is available to compliant agro-ingredients containing organic content. This is scheme-specific recognition, not automatic equivalence with every agricultural organic regime. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))

   · Taxonomy evidence: COSMOS CERTIFIED applies to compliant raw materials with organic content; this establishes a certification class rather than a universal equivalence among schemes. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.

2. COSMOS CERTIFIED - Certified raw materials database

   · Taxonomy evidence: The inspected certified-raw-material database contains multiple prickly pear seed-oil records with named certifying bodies, establishing certified commercial ingredient entries rather than merely organic marketing terminology. It does not establish fulfilled sales. ([cosmos-standard.org](https://www.cosmos-standard.org/en/databases/certified-raw-materials/?page=xx.xx))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.

3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
5. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
7. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
8. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

10. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
11. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
12. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

13. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance identifies a possible xx.xx%-xx.xx% organic price increment. Its midpoint anchors the modeled relative realization; global applicability and continuation through 2032 are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance identifies a possible xx.xx%-xx.xx% organic price increment. Its midpoint anchors the modeled relative realization; global applicability and continuation through 2032 are assumptions.
14. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

15. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
16. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
17. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

18. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

19. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

20. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.

21. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

12.2. Not Certified Organic

Table 81. Global Prickly Pear Seed Oil Market Size, by Not Certified Organic, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 82. Global Prickly Pear Seed Oil Market Size, by Not Certified Organic, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 83. Global Prickly Pear Seed Oil Market Size, by Not Certified Organic, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. COSMOS CERTIFICATION - Organic and Natural

   · Taxonomy evidence: COSMOS APPROVED concerns nonorganic raw materials within that scheme. It supports the distinction from organic certification, but does not independently establish that a particular oil lacks every other applicable organic certificate. The latter limitation is an analytical inference. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))

   · Taxonomy evidence: COSMOS APPROVED is available for nonorganic raw materials. Such approval alone is not organic certification. ([cosmos-standard.org](https://www.cosmos-standard.org/en/certification/cosmos-certification/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.

2. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.
3. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
4. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
5. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
6. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
7. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

8. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
9. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
10. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.

11. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
- Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
- Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

12. Entering the European market for prickly pear seed oil for cosmetics | CBI
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance states that organic certification is not required by every buyer, supporting retention of a noncertified purchasing category without establishing its numerical share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance states that organic certification is not required by every buyer, supporting retention of a noncertified purchasing category without establishing its numerical share.

13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

14. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
15. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
16. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

17. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

18. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

19. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.

13. Prickly Pear Seed Oil Market, by Botanical Source

Botanical Source differentiates the declared purchasing identity, not simply the oil's origin story. ■■■■■■ ■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■■ ■■■■ ■■■■■■ ■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■ ■■■■ ■■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■ ■■■■ ■■■■ ■■■■■ ■■■ ■■■■■■■■ ■■■■■■ ■■■■■■■■■■■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■■ ■■■■■ ■■ ■■■■■■■■ ■■■■■■■ ■■■■■ ■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■■ ■■■■ ■■■ ■■■■■■ ■■■■■■■ ■■■■ ■■■■ ■■■■ A brand may instead choose a different botanical proposition, but that changes the commercial brief and requires its own acceptance.

Opuntia tuna requires synonym-aware interpretation. Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. ■■■■■■■■ ■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■ ■■■■■■■■■■■■ ■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■■ ■■■■ ■■ ■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■ ■■ ■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■ ■■■■■■■■■■■■■■■■■■ ■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■■■■■■ ■■ ■■■■■■■■ ■■ ■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■

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Figure 20. Global Prickly Pear Seed Oil Market Size, by Botanical Source, 2025 (%)

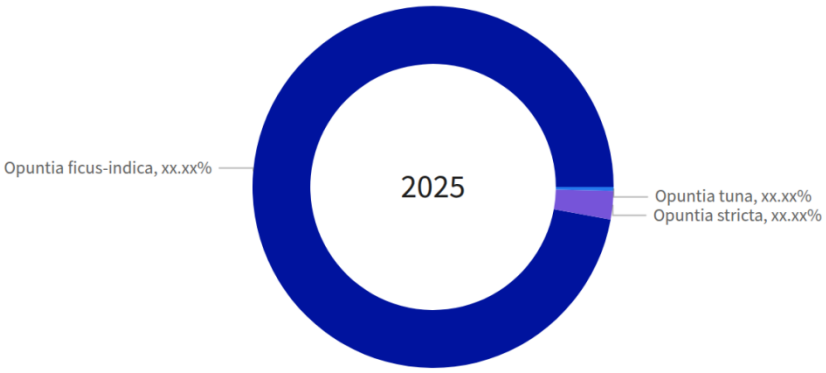

Figure 21. Global Prickly Pear Seed Oil Market, by Botanical Source, 2032 (USD Million)

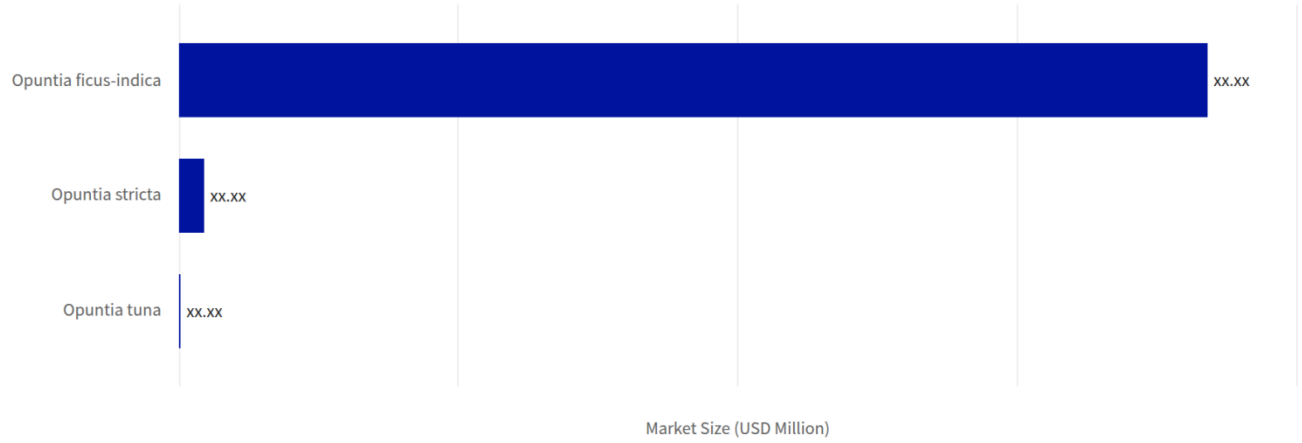

Table 84. Global Prickly Pear Seed Oil Market, by Botanical Source growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 85. Global Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
   - SAHARÔME advertises its seed oil using both Opuntia dillenii and Opuntia stricta var. dillenii terminology. ([saharome.com](https://saharome.com/vegetable-oils/prickly-pear-o%CF%89ega6-seed-oil/))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.

2. Prickly pear seed oil | SOPHIM

   · SOPHIM identifies its offered ingredient as Opuntia Ficus-Indica Seed Oil. This supports seller-declared identity, not purchasing equivalence. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

3. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles

   · Comptoir des Huiles declares Opuntia Stricta Seed Oil as the standalone oil's sole ingredient. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

4. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science

   · Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms. Associating the explicitly dillenii-described offer with Opuntia tuna is a nomenclatural inference, not commercial qualification. ([powo.science.kew.org](https://powo.science.kew.org/taxon/urn%3Alsid%3Aipni.org%3Anames%3A137125-xx.xx))

   · Taxonomy evidence: The accepted-species record lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms of Opuntia tuna. This supports explicit synonym normalization rather than overlapping botanical siblings. ([powo.science.kew.org](https://powo.science.kew.org/taxon/urn%3Alsid%3Aipni.org%3Anames%3A137125-xx.xx))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.

5. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

6. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
7. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
8. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
9. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
10. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
11. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
12. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.

13. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
14. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
15. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's December 2023 guidance establishes ingredient, intermediary and manufacturer purchasing routes and commercial access conditions. These inform the conditional customer-format model, not measured ficus-indica growth.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's December 2023 guidance establishes ingredient, intermediary and manufacturer purchasing routes and commercial access conditions. These inform the conditional customer-format model, not measured ficus-indica growth.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The documented routes support distinguishing ingredient valuation from standalone-oil valuation; they do not establish the assumed stricta purchasing-format split or account conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The documented routes support distinguishing ingredient valuation from standalone-oil valuation; they do not establish the assumed stricta purchasing-format split or account conversion.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Commercial access remains conditional, supporting restraint in the tuna forecast rather than inferring demand from availability or synonym normalization.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Commercial access remains conditional, supporting restraint in the tuna forecast rather than inferring demand from availability or synonym normalization.
16. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.

17. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
18. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
19. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

13.1. Opuntia ficus-indica

Table 86. Global Prickly Pear Seed Oil Market Size, by Opuntia ficus-indica, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 87. Global Prickly Pear Seed Oil Market Size, by Opuntia ficus-indica, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 88. Global Prickly Pear Seed Oil Market Size, by Opuntia ficus-indica, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. The European market potential for prickly pear seed oil for cosmetics

   · Taxonomy evidence: The commercial classification table explicitly identifies OPUNTIA FICUS-INDICA SEED OIL as the ingredient name for the described market product. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-potential))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

2. COSMOS CERTIFIED - Certified raw materials database

   · Taxonomy evidence: The listed prickly pear seed-oil entries explicitly use Opuntia ficus-indica seed-oil ingredient declarations. ([cosmos-standard.org](https://www.cosmos-standard.org/en/databases/certified-raw-materials/?page=xx.xx))

3. Opuntia ficus-indica (L.) Mill. - Plants of the World Online

   · Taxonomy evidence: The botanical record accepts Opuntia ficus-indica as a species. This establishes nomenclatural identity, not commercial volume or product authorization. ([powo.science.kew.org](https://powo.science.kew.org/taxon/xx.xx-xx.xx))

4. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

5. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

6. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien

   · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.

7. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
8. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
9. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
10. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
11. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.

12. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
13. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.
14. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's December 2023 guidance establishes ingredient, intermediary and manufacturer purchasing routes and commercial access conditions. These inform the conditional customer-format model, not measured ficus-indica growth.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's December 2023 guidance establishes ingredient, intermediary and manufacturer purchasing routes and commercial access conditions. These inform the conditional customer-format model, not measured ficus-indica growth.

15. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

16. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
17. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
18. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

19. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

20. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

21. Prickly pear seed oil | SOPHIM
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

22. PhileoL - Huile de pépins de Figue de Barbarie
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.

13.2. Opuntia stricta

Table 89. Global Prickly Pear Seed Oil Market Size, by Opuntia stricta, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 90. Global Prickly Pear Seed Oil Market Size, by Opuntia stricta, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 91. Global Prickly Pear Seed Oil Market Size, by Opuntia stricta, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles

   · Taxonomy evidence: The specific standalone-oil declaration uses Opuntia stricta rather than ficus-indica. This is commercial label identity, not independent botanical authentication or a market-share claim. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

   · Taxonomy evidence: The independently inspected standalone-oil declaration identifies its sole ingredient as Opuntia Stricta Seed Oil. This supports an advertised sold-oil identity distinct from ficus-indica, not a market-share claim. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

2. Opuntia stricta (Haw.) Haw. - Plants of the World Online

   · Taxonomy evidence: The botanical record accepts Opuntia stricta as a species, supporting its distinct normalized identity without establishing trade quantities. ([powo.science.kew.org](https://powo.science.kew.org/taxon/xx.xx-xx.xx))

3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
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   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
5. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
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   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
7. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
8. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

10. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
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    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
12. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

13. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The documented routes support distinguishing ingredient valuation from standalone-oil valuation; they do not establish the assumed stricta purchasing-format split or account conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The documented routes support distinguishing ingredient valuation from standalone-oil valuation; they do not establish the assumed stricta purchasing-format split or account conversion.
14. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.

15. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
16. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
17. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
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18. 2025 Annual Results | L'Oréal Finance
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
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- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

19. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

20. Renala - Natural Ingredient Catalog
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.

21. Huile végétale de Figues de Barbarie - PhileoL
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.

22. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.

23. PhileoL - Huile de pépins de Figue de Barbarie
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

13.3. Opuntia tuna

Table 92. Global Prickly Pear Seed Oil Market Size, by Opuntia tuna, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 93. Global Prickly Pear Seed Oil Market Size, by Opuntia tuna, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 94. Global Prickly Pear Seed Oil Market Size, by Opuntia tuna, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Opuntia tuna (L.) Mill. - Plants of the World Online

   · Taxonomy evidence: Opuntia tuna is accepted in the inspected botanical backbone. Its synonym mapping supplies nomenclatural support only; commercial participation must be established separately. ([powo.science.kew.org](https://powo.science.kew.org/taxon/urn%3Alsid%3Aipni.org%3Anames%3A137125-xx.xx))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.

2. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
   - Taxonomy evidence: A dedicated commercial seed-oil page uses both Opuntia dillenii seed oil and Opuntia stricta var. dillenii for its advertised offering. Combined with the botanical synonym record, allocation to Opuntia tuna is an explicit analytical inference, not evidence of fulfilled sales or material global demand. ([saharome.com](https://saharome.com/vegetable-oils/prickly-pear-o%CF%89ega6-seed-oil/))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
3. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
4. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
5. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
6. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
7. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.

8. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
9. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
10. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
11. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.

12. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
- Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
- Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

13. Entering the European market for prickly pear seed oil for cosmetics | CBI
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Commercial access remains conditional, supporting restraint in the tuna forecast rather than inferring demand from availability or synonym normalization.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Commercial access remains conditional, supporting restraint in the tuna forecast rather than inferring demand from availability or synonym normalization.

14. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
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    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
16. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
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    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
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- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

19. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

14. Prickly Pear Seed Oil Market, by Region

[redacted] An Australian cosmetic buyer can investigate this intermediary route instead of arranging direct origin sourcing, but should secure the exact declaration and delivery commitment. The listing does not establish availability elsewhere in Asia-Pacific or access to the studied noncosmetic applications.

[redacted] Ingredient buyers should confirm the product-destination combination, while brands evaluating cross-border retail need a separately committed fulfillment route. These supplier policies do not characterize every North American seller.

Latin America requires attention to national implementation even where countries work through shared technical rules. [redacted] The relevant trigger is national implementation, not regional adoption alone; this mechanism does not establish any particular oil's local authorization.

[redacted] Direct supply preserves greater relationship control but requires the exporter to manage those commitments itself. The guidance establishes a commercial route, not a particular intermediary's appointment or performance.

Middle East entry should distinguish a distributor's sales remit from its country-specific import responsibilities. [redacted]

RESEARCH SAMPLE REPORT

[redacted] The Saudi arrangement cannot establish eligibility in other Middle Eastern jurisdictions or authorization of the particular oil.

Africa offers differentiated origin-linked propositions, not an automatically interchangeable supplier pool. [redacted] Supplier acceptance and continuing delivery remain separate commercial conditions.

Figure 22. Global Prickly Pear Seed Oil Market, by Region: Market share evolution, 2025-2032

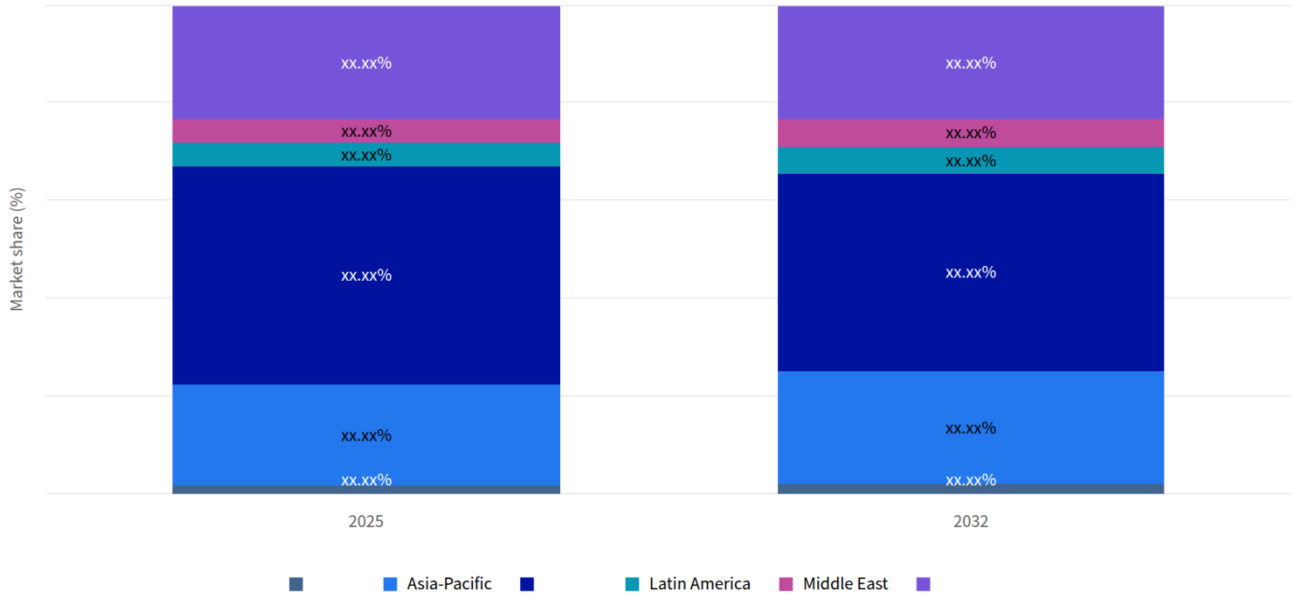

Figure 23. Global Prickly Pear Seed Oil Market, by Region: Market size by category, 2025

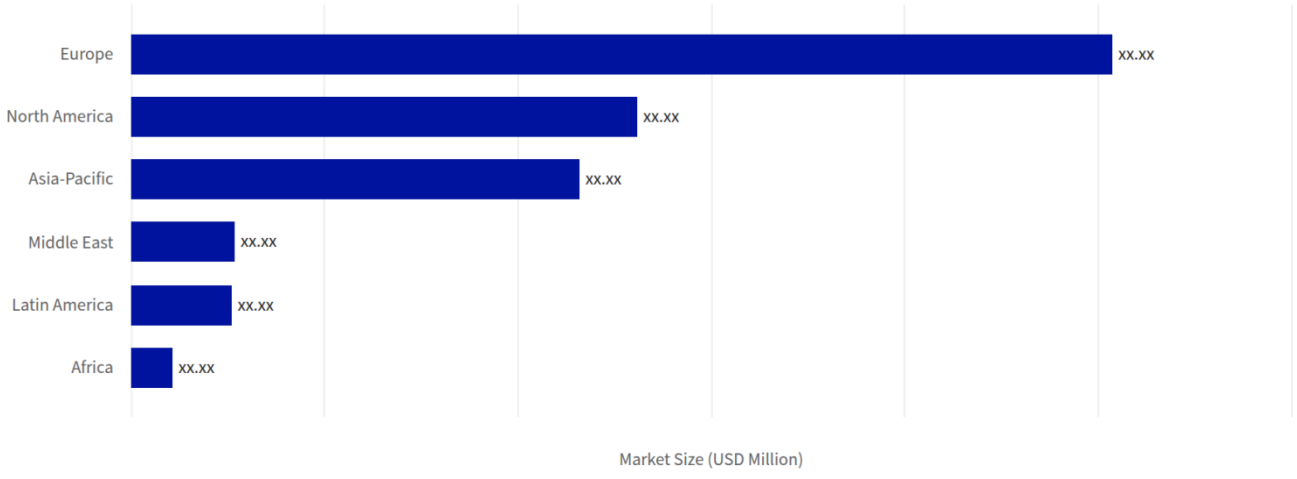

Figure 24. Global Prickly Pear Seed Oil Market, Regional growth by Refinement Status, 2025-2032 (CAGR %)

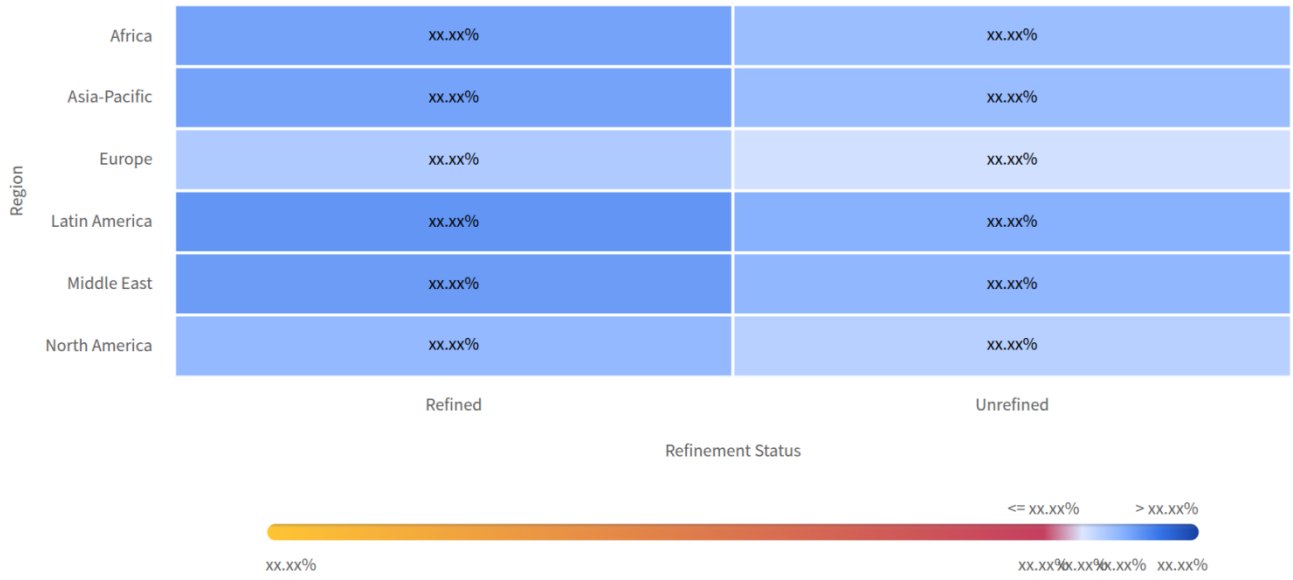

Table 95. Global Prickly Pear Seed Oil Market, by Region growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 96. Global Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Asia-Pacific	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Europe	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latin America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Middle East	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North America	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose

   · Leven Rose's packaged-oil page states that it does not ship internationally. This is a seller-specific restriction, not a regional prohibition.
   ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))

   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.

   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.

2. Prickly Pear Seed Oil - Virgin Organic | Jedwards International

   · Jedwards states that its e-commerce site supports the United States and Canada; other international business requires enquiry, and international payments are by wire. Its general statement does not establish every product-destination combination.
   ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))

   · Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.

   · Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.

3. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME

   · SAHARÔME states Morocco as the origin of its dillenii-described offering. This establishes a seller-specific sourcing proposition, not equivalence to another origin.
   ([saharome.com](https://saharome.com/vegetable-oils/prickly-pear-o%CF%89ega6-seed-oil/))

4. Entering the European market for prickly pear seed oil for cosmetics | CBI

   · CBI describes importers and distributors coordinating specifications and certifications while suppliers provide them, and identifies manufacturer relationships as an alternative route. The proposed route choice is conditional on the intermediary's contracted contribution.
   ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.

5. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles

   · The brand links its Opuntia stricta proposition to seeds from Madagascar; this is its sourcing declaration, not proof of supplier interchangeability. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))

6. Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia

   · New Directions Australia lists Opuntia Ficus-Indica Seed Oil with India as origin, identifies itself as a wholesaler, and states that it does not supply food-grade raw materials. ([newdirections.com.au](https://www.newdirections.com.au/epages/newdirections.sf/en_AU/?ObjectPath=%2FShops%2Fnewdirections%2FProducts%2FOV100PRICPEAR))

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.

7. MERCOSUR Resolution 6/2025 - Restricted cosmetic substances and national incorporation

   · MERCOSUR Resolution xx.xx/2025 requires national incorporation. Its official record shows differing incorporation positions and no recorded entry-into-force date, supporting destination-specific implementation checks rather than assumed uniformity. ([normas.mercosur.int](https://normas.mercosur.int/public/normativas/xx.xx))

8. SFDA Issues Certificates of Conformity for Beauty Sector Consignments via FASEH

   · SFDA describes GHAD product and licensing requirements followed by FASEH consignment clearance. This supports checking a Saudi partner's specific administrative role rather than inferring capability from regional sales coverage. ([sfda.gov.sa](https://sfda.gov.sa/en/news/xx.xx))

9. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

10. UNIDO - The development of a new agro-industrial value chain in Tunisia

    · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

    · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

    · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

    · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.

11. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien

    · Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.

    · Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.

12. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
13. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
14. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
15. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
16. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

17. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
18. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.

14.1. Europe

Table 97. Europe Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Austria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Belgium	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Denmark	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Finland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Netherlands	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Norway	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Poland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Portugal	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Sweden	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Switzerland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 98. Europe Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Austria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Belgium	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Denmark	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Finland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Netherlands	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Norway	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Poland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Portugal	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Sweden	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Switzerland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 99. Europe Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 100. Europe Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 101. Europe Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 102. Europe Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 103. Europe Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 104. Europe Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 105. Europe Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 106. Europe Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 107. Europe Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Oil-specific guidance identifies skincare use and ingredient-distributor/manufacturer channels, supporting the proxy connection but not numerical oil penetration or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support European weights, with separately explained ingredient-procurement and redistribution assumptions.
13. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Dutch gross import/export activity supports a redistribution qualification rather than direct oil-demand attribution.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Dutch gross import/export activity supports a redistribution qualification rather than direct oil-demand attribution.
14. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
15. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company European growth supplies a maturity comparator without establishing future oil penetration.
16. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.

17. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
18. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
19. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
20. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

21. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

22. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
23. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
24. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

25. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
26. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
27. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
28. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

29. European Commission - Frequently asked questions on organic rules - March 19, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
30. New Dietary Ingredient Notification Process | FDA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
31. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
32. 化粧品出荷 - Japan Cosmetic Industry Association
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

33. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
34. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
35. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

36. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
37. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
38. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
39. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

40. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
41. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
42. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
43. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
44. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

45. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
46. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
47. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
48. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
49. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

50. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

14.2. North America

Table 108. North America Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 109. North America Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 110. North America Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 111. North America Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 112. North America Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 113. North America Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 114. North America Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 115. North America Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 116. North America Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 117. North America Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 118. North America Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.
2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The seller's e-commerce policy names United States and Canada, supporting a differentiated ingredient-access premise rather than universal country fulfillment.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 broad-skincare import primitives underpin the joint North American demand-proxy model; they are not oil revenues.
13. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's own 2025 regional performance provides a mature-market comparator, not seed-oil sales or a directly copied growth rate.
14. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
15. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
16. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
17. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

18. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

19. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

20. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
21. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
22. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

23. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
24. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
25. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
26. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

27. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

28. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

29. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

30. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

31. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
32. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
33. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

34. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
35. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
36. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
37. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

38. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
39. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
40. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
41. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
42. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

43. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
44. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
45. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
46. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
47. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

48. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

14.3. Asia-Pacific

Table 119. Asia-Pacific Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Indonesia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Malaysia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Philippines	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Singapore	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Taiwan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Thailand	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 120. Asia-Pacific Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Indonesia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Malaysia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Philippines	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Singapore	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Taiwan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Thailand	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 121. Asia-Pacific Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 122. Asia-Pacific Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 123. Asia-Pacific Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 124. Asia-Pacific Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 125. Asia-Pacific Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 126. Asia-Pacific Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 127. Asia-Pacific Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 128. Asia-Pacific Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 129. Asia-Pacific Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 trade primitives support Asia-Pacific weights and noncatalog coverage; older missing-country observations are separately sourced.
13. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Singapore exports exceed its broad-skincare imports, qualifying gross imports as a terminal-demand proxy; assumed retention remains unverified.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Singapore exports exceed its broad-skincare imports, qualifying gross imports as a terminal-demand proxy; assumed retention remains unverified.
14. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The country-specific cosmetic listing qualifies regional availability assumptions and does not prove wider Asia-Pacific or noncosmetic access.
15. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Weak North Asian growth and faster activity elsewhere independently qualify a uniformly bullish Asia-Pacific oil-adoption thesis.
16. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.

17. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
18. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
19. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
20. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
21. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

22. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

23. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
24. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
25. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

26. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
27. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
28. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
29. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

30. European Commission - Frequently asked questions on organic rules - March 19, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
31. New Dietary Ingredient Notification Process | FDA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
32. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
33. 化粧品出荷 - Japan Cosmetic Industry Association
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

34. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
35. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
36. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

37. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
38. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
39. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
40. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

41. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
42. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
43. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
44. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
45. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

46. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
47. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
48. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
49. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
50. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

51. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

14.4. Middle East

Table 130. Middle East Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Israel	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Qatar	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Saudi Arabia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Turkey	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Arab Emirates	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 131. Middle East Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Israel	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Qatar	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Saudi Arabia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Turkey	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Arab Emirates	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 132. Middle East Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 133. Middle East Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 134. Middle East Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 135. Middle East Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 136. Middle East Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 137. Middle East Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 138. Middle East Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 139. Middle East Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 140. Middle East Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.
2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives anchor the Middle Eastern basket except its separately sourced older UAE observation.
13. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2023 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The UAE's 2023 broad-skincare imports of USD xx.xx are the older observed primitive, with timing and terminal-retention adjustments explicitly modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The UAE's 2023 broad-skincare imports of USD xx.xx are the older observed primitive, with timing and terminal-retention adjustments explicitly modeled.
14. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company activity in GCC and its wider regional grouping supports a conditional channel-expansion premise, not a national oil-sales observation.
15. SFDA Issues Certificates of Conformity for Beauty Sector Consignments via FASEH
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Saudi-specific import arrangements and cumulative broad-cosmetics administrative counts support an access-infrastructure premise, not oil sales or pan-GCC eligibility.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Saudi-specific import arrangements and cumulative broad-cosmetics administrative counts support an access-infrastructure premise, not oil sales or pan-GCC eligibility.
16. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
17. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.

18. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
19. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
20. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

21. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

22. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
23. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
24. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

25. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
26. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
27. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
28. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

29. European Commission - Frequently asked questions on organic rules - March 19, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
30. New Dietary Ingredient Notification Process | FDA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
31. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
32. 化粧品出荷 - Japan Cosmetic Industry Association
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

33. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
34. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
35. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

36. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
37. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
38. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
39. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

40. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
41. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
42. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
43. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
44. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

45. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
46. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
47. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
48. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
49. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

50. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

14.5. Latin America

Table 141. Latin America Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Argentina	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Chile	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Colombia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Peru	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 142. Latin America Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Argentina	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Chile	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Colombia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Peru	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 143. Latin America Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 144. Latin America Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 145. Latin America Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 146. Latin America Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 147. Latin America Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 148. Latin America Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 149. Latin America Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 150. Latin America Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 151. Latin America Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

- Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

- Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives support the Latin American proxy basket and noncatalog coverage inputs.
13. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Own-company Latin American growth supplies an independent commercial comparator for differentiated adoption; its regional boundary is not copied.
14. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
15. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
16. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
17. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

18. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

19. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

20. Prickly pear seed oil | SOPHIM

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

21. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

22. Sweet Talk Lip Oil | Monika Blunder Beauty

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

23. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
24. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
25. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
26. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

27. European Commission - Frequently asked questions on organic rules - March 19, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
28. New Dietary Ingredient Notification Process | FDA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
29. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
30. 化粧品出荷 - Japan Cosmetic Industry Association
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

31. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
32. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
33. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

34. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
35. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
36. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
37. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

38. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
39. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
40. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
41. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
42. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

43. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
44. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
45. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
46. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
47. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

48. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

14.6. Africa

Table 152. Africa Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Egypt	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Kenya	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nigeria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 153. Africa Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million)

Region	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Egypt	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Kenya	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nigeria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 154. Africa Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 155. Africa Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 156. Africa Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 157. Africa Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 158. Africa Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 159. Africa Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 160. Africa Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 161. Africa Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 162. Africa Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

- Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

- Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The broader Tunisian cactus sector's xx.xx% exporter incidence independently qualifies production-origin allocation; it is not an oil-volume or destination share.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official 2024 country trade primitives constrain African buyer-market weights rather than production-origin allocation.
13. 2025 Annual Results | L'Oréal Finance
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company's reported African activity is a commercial comparator only; it does not determine oil-only demand.
14. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
15. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
16. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
17. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

18. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

19. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

20. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
21. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
22. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

23. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
24. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
25. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
26. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

27. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

28. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

29. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

30. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

31. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
32. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
33. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

34. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
35. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
36. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
37. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

38. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
39. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
40. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
41. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
42. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

43. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
44. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
45. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
46. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
47. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

48. The European market potential for prickly pear seed oil for cosmetics | CBI

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

15. Prickly Pear Seed Oil Market, by Group

Americas-wide distribution requires different product-administration commitments across constituent markets. ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ A country-limited appointment reduces unverified territorial exposure; a broader appointment becomes useful when the distributor can demonstrate the necessary local commitments.

Europe, Middle East & Africa is useful for organizing a cross-border sourcing relationship, but the relationship must distinguish origin, ingredient sale, and destination market placement. Comptoir des Huiles links Madagascar seed sourcing with French operations, while CBI describes the documentation contribution of European ingredient intermediaries. ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪ ▪▪▪▪▪▪

ASEAN's shared Cosmetic Directive can support reuse of commercial documentation, but national notification relationships remain important. ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ A Singapore notification is not evidence of a Malaysian notification relationship, despite the shared framework.

GCC offers a common technical reference through GSO 1943:2024, covering cosmetic safety, labeling, and packaging. That reference can organize a packaged-oil compliance brief, but it does not establish a single commercial import appointment. ▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪

▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ A Prickly Pear Seed Oil importer should obtain the relevant supplier declarations and resolve each country's applicability before committing to a shared launch. Neither universal registration nor universal exemption follows from the botanical name.

[illegible] Brands should pursue Nordic Swan positioning when it meets a defined buyer brief and can be maintained, while allocating national obligations separately. The additional claim can differentiate the packaged offer, but introduces documentation and packaging commitments without guaranteeing retail acceptance.

[illegible] A packaged-oil brand extending from France to Germany should therefore separate the common notification relationship from the receiving distributor's labeling and commercial commitments. A shared administrative foundation can support broader coverage, but neither notification nor translation establishes a retailer listing, exclusivity, or continuing delivery.

BRICS is a comparison framework for distinct national access relationships, not evidence that one oil proposition has qualified throughout the group. China requires an overseas cosmetic registrant or filer to designate a domestic responsible enterprise; Brazil distinguishes notified and registered cosmetics. [illegible]

[illegible] A packaged-oil brand evaluating a multi-market service provider should require a territory-by-territory statement of appointments, record access, and continuity if a distributor changes. This route can consolidate administration, but a provider's ability to perform every role must be demonstrated; separate national arrangements remain an alternative.

NATO procurement eligibility should not be converted into an oil-demand proposition. NATO states that eligibility is specified in each procurement call and that opportunities are generally reserved for firms registered in member nations, subject to exceptions. [illegible]

These groups overlap with one another and with the regional and country views. ■■■■■ ■■■■■■■■ ■■ ■■■■■■■■■■■■■■ ■ ■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■■■ ■■■■■■■■ ■■■ ■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■

Figure 25. Global Prickly Pear Seed Oil Market Size, by Group, 2025 vs 2026 vs 2032

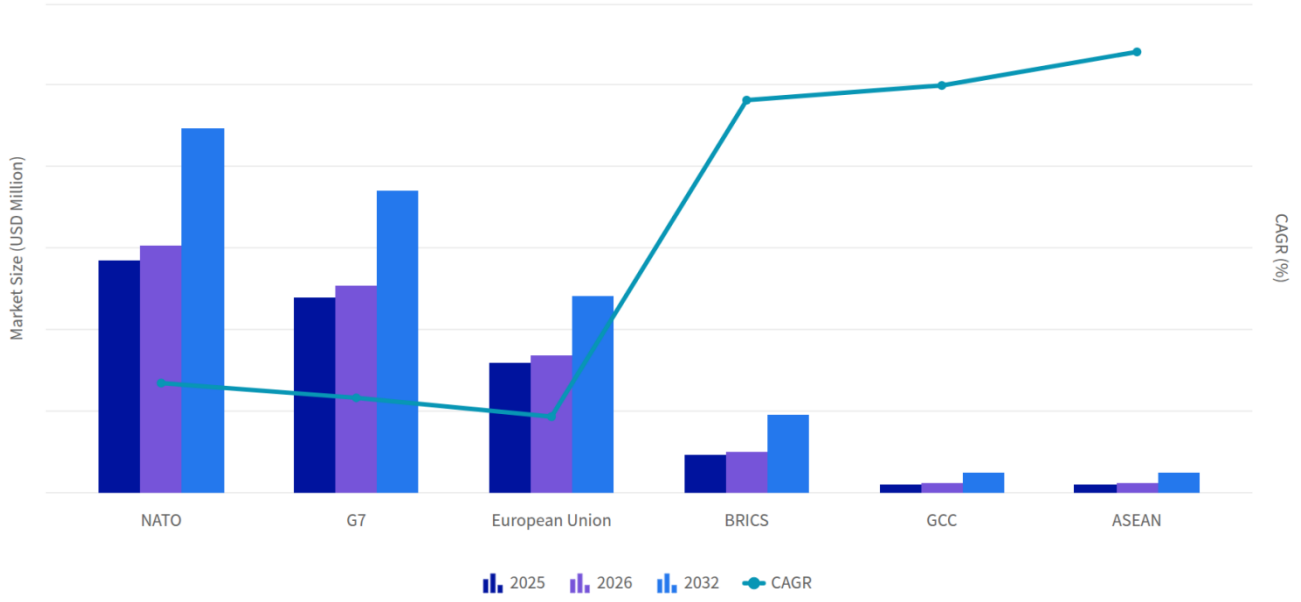

Table 163. Global Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
ASEAN	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
BRICS	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
European Union	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
G7	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
GCC	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
NATO	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Sources & Evidence

1. Legislation - Cosmetics | European Commission
   · The European Commission describes an EU responsible person and centralized cosmetic notification. These establish a shared administrative framework rather than distribution rights and also support the G7 comparison of accountable actors. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/legislation_en))
2. Cosmetic product notification portal | European Commission
   · CPNP guidance addresses distributors translating labeling to comply with national law. This supports separating centralized notification from subsequent distributor responsibilities. ([single-market-economy.ec.europa.eu](https://single-market-economy.ec.europa.eu/sectors/cosmetics/cosmetic-product-notification-portal_en))

3. Registration & Listing of Cosmetic Product Facilities and Products | FDA
   · FDA describes separate MoCRA facility-registration and product-listing responsibilities, with exemptions. These support requiring explicit U.S. service scope from a proposed G7 coordinator. ([fda.gov](https://www.fda.gov/cosmetics/registration-listing-cosmetic-product-facilities-and-products))
4. Entering the European market for prickly pear seed oil for cosmetics | CBI
   · CBI's oil-specific channel description supports distinguishing the exporter's documentation responsibility from an intermediary's coordination role. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
5. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
   · The brand describes Madagascar seed sourcing and French operations, supporting a distinction between sourcing geography and commercial roles. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))
6. SFDA Issues Certificates of Conformity for Beauty Sector Consignments via FASEH
   · The Saudi import arrangement is jurisdiction-specific and does not establish another GCC constituent's access route. ([sfda.gov.sa](https://sfda.gov.sa/en/news/xx.xx))
7. ASEAN Cosmetic Directive | Health Sciences Authority
   · HSA describes the ASEAN Cosmetic Directive as an agreement harmonizing cosmetic requirements to reduce regional technical barriers. National commercial access is not established by this shared framework alone. ([hsa.gov.sg](https://www.hsa.gov.sg/cosmetic-products/asean-cosmetic-directive/))
8. Regulatory overview of cosmetic products | Health Sciences Authority
   · Singapore usually requires cosmetic notification before sale and subsequent re-notification. These national obligations support a distinction between shared ASEAN requirements and the Singapore notification relationship. ([hsa.gov.sg](https://www.hsa.gov.sg/cosmetic-products/overview/))
9. Frequently Asked Questions - Cosmetics | National Pharmaceutical Regulatory Agency
   · NPRA states that overseas companies appoint a locally registered notification holder. Its guidance places printing and distribution of the notification note under the notifying company's control, supporting a conditional record-access and continuity concern. ([npra.gov.my](https://www.npra.gov.my/index.php/my/frequently-asked-questions-faqs))
10. GSO 1943:2024 - Cosmetic Products: Safety Requirements of Cosmetics and Personal Care Products
   · GSO identifies GSO 1943:2024 as a Gulf technical regulation covering cosmetic safety, labeling, and packaging. Its scope does not establish a particular national import appointment or oil authorization. ([gso.org.sa](https://www.gso.org.sa/store/standards/GSO%3A871899/GSO%xx.xx%3A2024?lang=en))
11. Natural and organic ingredients | Australian Industrial Chemicals Introduction Scheme
   · AICIS distinguishes natural or organic marketing from its legal naturally occurring category and states that registration is not required where all relevant ingredients meet the exemption conditions. The page does not classify the particular oil. ([industrialchemicals.gov.au](https://www.industrialchemicals.gov.au/business/natural-and-organic-ingredients))
12. Cosmetics | New Zealand Environmental Protection Authority
   · New Zealand expanded cosmetic group-standard scope on January xx.xx 2026 to products containing a hazardous substance even if the final product is not hazardous. Its guidance separately addresses products containing only nonhazardous ingredients. ([epa.govt.nz](https://www.epa.govt.nz/hazardous-substances/rules-notices-and-how-to-comply/specific-substance-guidance/cosmetics/))

13. Cosmetic products 090 | Nordic Swan Ecolabel
    - The Nordic Swan cosmetic framework includes raw-material and packaging requirements and a licensing application. Organic positioning alone does not establish eligibility for this separate label; buyer acceptance remains unverified.
    ([nordic-swan-ecolabel.org](https://www.nordic-swan-ecolabel.org/criteria/cosmetic-products-xx.xx/))
14. Registrering og melding når du produserer eller importerer kosmetikk | Mattilsynet
    - Norway describes national business registration and notification duties associated with translated labeling, illustrating responsibilities separate from a shared Nordic certification proposition.
    ([mattilsynet.no](https://www.mattilsynet.no/kosmetikk-og-kroppspleieprodukter/registrering-og-melding))
15. Notification of Cosmetics | Health Canada
    - Canada links cosmetic notification to first sale, establishing a national administration relationship relevant to an Americas distributor mandate.
    ([canada.ca](https://www.canada.ca/en/health-canada/services/consumer-product-safety/cosmetics/notification-cosmetics.html))
16. Consulta de cosméticos | Anvisa
    - Anvisa distinguishes notified registration-exempt cosmetics from products requiring registration. This supports national access distinctions within both Americas and BRICS analysis.
    ([gov.br](https://www.gov.br/anvisa/pt-br/comunicacao/campanhas/estetica/consulta-de-cosmeticos))
17. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - China requires overseas cosmetic registrants and filers to designate a domestic responsible enterprise, supporting a distinct national-counterparty requirement in BRICS comparisons.
    ([english.nmpa.gov.cn](https://english.nmpa.gov.cn/2022-xx.xx/xx.xx/c_961747.htm))
18. Making cosmetic products available to consumers in Great Britain | GOV.UK
    - Great Britain has a premarket OPSS notification relationship, supporting a separate territorial service commitment within a G7 coordination arrangement.
    ([gov.uk](https://www.gov.uk/guidance/making-cosmetic-products-available-to-consumers-in-great-britain))
19. Procurement Opportunities | NATO
    - NATO states that eligibility is specified in each procurement call and that opportunities are generally reserved for member-nation firms, with exceptions. This does not establish an oil requirement or award.
    ([nato.int](https://www.nato.int/en/work-with-us/business-and-project-opportunities/procurement-opportunities))
20. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
21. UNIDO - The development of a new agro-industrial value chain in Tunisia
    - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
22. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
    - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.

23. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
24. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
25. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
26. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
27. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
28. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
29. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

15.1. NATO

Table 164. NATO Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Albania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Belgium	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Bulgaria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Croatia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Czech Republic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Denmark	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Estonia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Finland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Greece	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hungary	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Iceland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latvia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Lithuania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Luxembourg	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Montenegro	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Netherlands	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North Macedonia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Norway	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Poland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Portugal	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Romania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovakia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovenia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Sweden	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 164 - continued

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Turkey	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 165. NATO Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Albania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Belgium	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Bulgaria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Croatia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Czech Republic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Denmark	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Estonia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Finland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Greece	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hungary	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Iceland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latvia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Lithuania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Luxembourg	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Montenegro	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Netherlands	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
North Macedonia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Norway	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Poland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 165 - continued

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Portugal	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Romania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovakia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovenia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Sweden	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Turkey	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 166. NATO Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 167. NATO Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 168. NATO Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 168 - continued

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 169. NATO Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 170. NATO Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 171. NATO Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 172. NATO Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 173. NATO Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 174. NATO Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Dutch gross import/export activity supports a redistribution qualification rather than direct oil-demand attribution.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Dutch gross import/export activity supports a redistribution qualification rather than direct oil-demand attribution.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.

16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
21. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

15.2. G7

Table 175. G7 Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 176. G7 Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 177. G7 Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 178. G7 Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 179. G7 Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 180. G7 Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 181. G7 Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 182. G7 Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 183. G7 Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 184. G7 Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 185. G7 Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.

16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

21. Sweet Talk Lip Oil | Monika Blunder Beauty

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

15.3. European Union

Table 186. European Union Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Austria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Belgium	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Bulgaria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Croatia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Cyprus	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Czech Republic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Denmark	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Estonia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Finland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Greece	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hungary	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Ireland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latvia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Lithuania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Luxembourg	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Malta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Netherlands	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Poland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Portugal	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Romania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovakia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovenia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Sweden	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 187. European Union Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Austria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Belgium	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Bulgaria	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Croatia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Cyprus	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Czech Republic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Denmark	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Estonia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Finland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Greece	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hungary	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Ireland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Latvia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Lithuania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Luxembourg	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Malta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Netherlands	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Poland	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Portugal	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Romania	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovakia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Slovenia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Sweden	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 188. European Union Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 189. European Union Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 190. European Union Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 191. European Union Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 192. European Union Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 193. European Union Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 194. European Union Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 195. European Union Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 196. European Union Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Dutch gross import/export activity supports a redistribution qualification rather than direct oil-demand attribution.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Dutch gross import/export activity supports a redistribution qualification rather than direct oil-demand attribution.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.

16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

21. Sweet Talk Lip Oil | Monika Blunder Beauty

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

15.4. BRICS

Table 197. BRICS Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 198. BRICS Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Africa	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 199. BRICS Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 200. BRICS Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 201. BRICS Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 202. BRICS Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 203. BRICS Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 204. BRICS Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 205. BRICS Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 206. BRICS Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 207. BRICS Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
13. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
14. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
15. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
16. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.

17. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
18. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

19. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

20. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
21. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
22. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

23. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
24. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
25. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
26. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

27. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

28. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

29. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

30. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

31. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
32. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
33. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

34. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
35. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
36. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
37. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

38. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
39. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
40. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
41. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
42. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

43. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
44. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
45. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
46. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
47. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

48. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

15.5. GCC

Table 208. GCC Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Bahrain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Kuwait	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Oman	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Qatar	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Saudi Arabia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Arab Emirates	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 209. GCC Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bahrain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Kuwait	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Oman	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Qatar	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Saudi Arabia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Arab Emirates	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 210. GCC Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 211. GCC Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 212. GCC Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 213. GCC Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 214. GCC Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 215. GCC Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 216. GCC Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 217. GCC Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 218. GCC Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2023 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The UAE's 2023 broad-skincare imports of USD xx.xx are the older observed primitive, with timing and terminal-retention adjustments explicitly modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The UAE's 2023 broad-skincare imports of USD xx.xx are the older observed primitive, with timing and terminal-retention adjustments explicitly modeled.
13. SFDA Issues Certificates of Conformity for Beauty Sector Consignments via FASEH
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Saudi-specific import arrangements and cumulative broad-cosmetics administrative counts support an access-infrastructure premise, not oil sales or pan-GCC eligibility.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Saudi-specific import arrangements and cumulative broad-cosmetics administrative counts support an access-infrastructure premise, not oil sales or pan-GCC eligibility.
14. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
15. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
16. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.

17. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
18. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

19. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

20. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
21. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
22. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

23. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
24. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
25. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
26. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

27. European Commission - Frequently asked questions on organic rules - March 19, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
28. New Dietary Ingredient Notification Process | FDA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
29. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
30. 化粧品出荷 - Japan Cosmetic Industry Association
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

31. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
32. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
33. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

34. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
35. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
36. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
37. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

38. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
39. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
40. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
41. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
42. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

43. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
44. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
45. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
46. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
47. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

48. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

15.6. ASEAN

Table 219. ASEAN Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Brunei	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Cambodia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Indonesia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Lao People's Democratic Republic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Malaysia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Myanmar	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Philippines	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Singapore	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Thailand	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Vietnam	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 220. ASEAN Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million)

Group	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Brunei	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Cambodia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Indonesia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Lao People's Democratic Republic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Malaysia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Myanmar	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Philippines	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Singapore	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Thailand	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Vietnam	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 221. ASEAN Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 222. ASEAN Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 223. ASEAN Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 224. ASEAN Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 225. ASEAN Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 226. ASEAN Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 227. ASEAN Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 228. ASEAN Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 229. ASEAN Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Singapore exports exceed its broad-skincare imports, qualifying gross imports as a terminal-demand proxy; assumed retention remains unverified.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Singapore exports exceed its broad-skincare imports, qualifying gross imports as a terminal-demand proxy; assumed retention remains unverified.
13. Vietnam Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2023 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Vietnam's 2023 broad-skincare imports of USD xx.xx anchor the older-period proxy, not observed oil sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Vietnam's 2023 broad-skincare imports of USD xx.xx anchor the older-period proxy, not observed oil sales.
14. Myanmar Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2023 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Myanmar's 2023 broad-skincare imports of USD xx.xx constrain its small positive proxy weight; timing, incidence and growth are modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Myanmar's 2023 broad-skincare imports of USD xx.xx constrain its small positive proxy weight; timing, incidence and growth are modeled.
15. Lao PDR Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2023 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Lao PDR's 2023 broad-skincare imports of USD xx.xx anchor its small positive proxy weight; the result is not a disclosed oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Lao PDR's 2023 broad-skincare imports of USD xx.xx anchor its small positive proxy weight; the result is not a disclosed oil share.
16. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
17. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.

18. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
19. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
20. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

21. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

22. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
23. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
24. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

25. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
26. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
27. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
28. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

29. European Commission - Frequently asked questions on organic rules - March 19, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
30. New Dietary Ingredient Notification Process | FDA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
31. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
32. 化粧品出荷 - Japan Cosmetic Industry Association
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

33. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
34. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
35. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

36. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
37. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
38. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
39. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

40. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
41. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
42. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
43. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
44. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

45. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
46. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
47. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
48. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
49. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

50. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16. Prickly Pear Seed Oil Market, by Country

[redacted] A cross-border brand should allocate these responsibilities independently and maintain the records needed for each relationship. Both authorities distinguish these administrative submissions from approval, so a registration or notification claim is not a substitute for assessing the exact product and seller.

The United Kingdom requires territorial precision within the commercial mandate. [redacted] The particular product's appointments and notifications remain matters to establish before launch.

[redacted] Combining distribution and compliance may simplify coordination but creates dependence on that counterparty. The general framework does not determine the particular oil's classification, ingredient status, or completed filing.

[redacted] A buyer should request the exact marketed product identity and check the appropriate status route rather than reject or accept an oil solely because a seller describes it as not registered. The commercial decision depends on the product category and claims; the general distinction does not establish a particular Prickly Pear Seed Oil's eligibility.

Norway makes labeling adaptation an identifiable distributor responsibility. [redacted]

[redacted] Reusing a broader European product proposition can simplify sourcing, but the commercial benefit depends on completing the applicable Norwegian responsibilities rather than assuming the original label settles them.

Figure 26. Global Prickly Pear Seed Oil Market Size, by Country, 2025 vs 2032 (%)

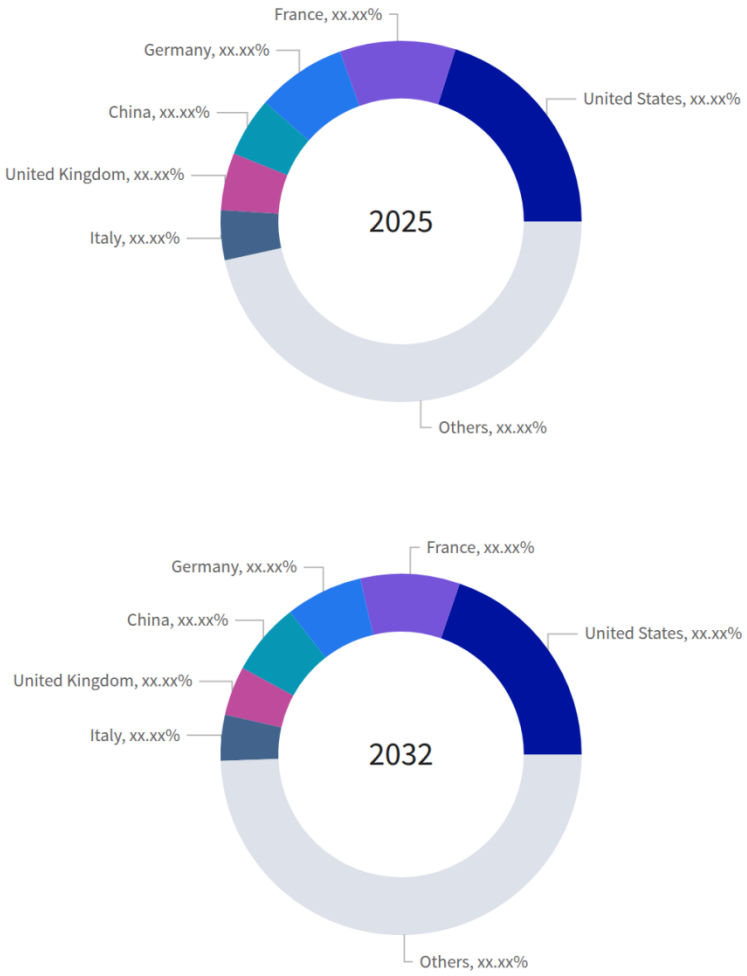

Figure 27. Global Prickly Pear Seed Oil Market Size, by Country, 2025 vs 2026 vs 2032

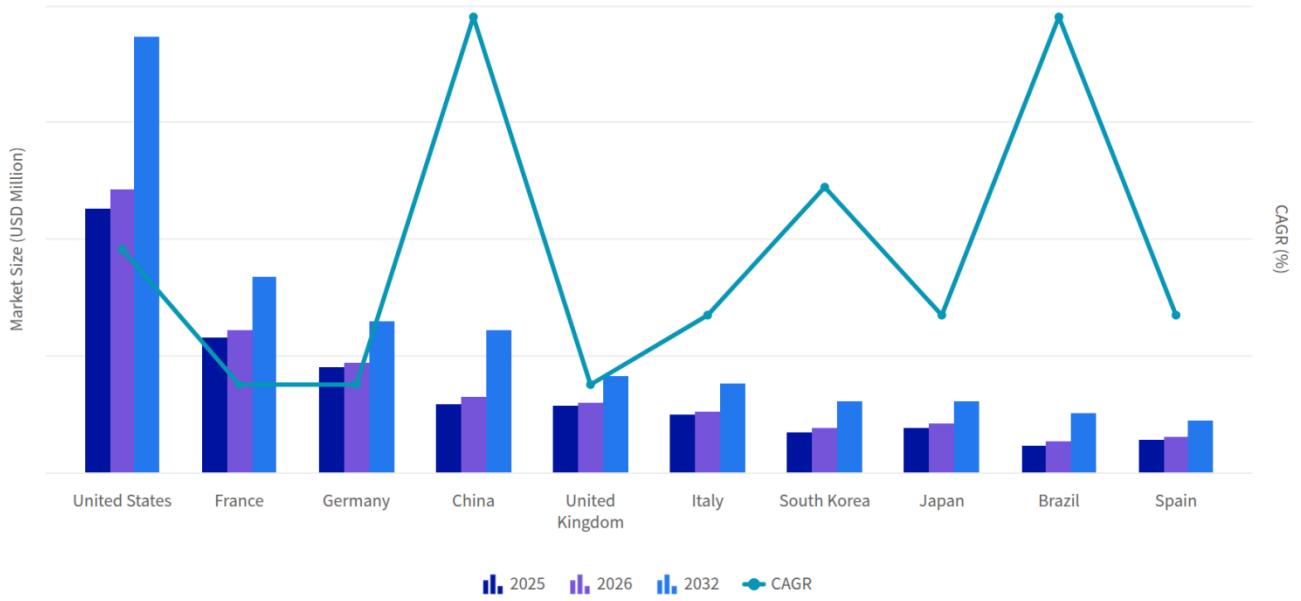

Table 230. Global Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032

Category	2025 value (USD Million)	2032 value (USD Million)	Added value (USD Million)	2025 share (%)	2032 share (%)	Change (pp)	Growth share (%)	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unallocated / remaining scope	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Scope total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 231. Global Prickly Pear Seed Oil Market Size, by Country, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Brazil	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Canada	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
China	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
France	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Germany	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
India	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Italy	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Japan	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Mexico	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Russia	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
South Korea	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Spain	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United Kingdom	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Others	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Registration & Listing of Cosmetic Product Facilities and Products | FDA
   · FDA identifies the label-named manufacturer, packer, or distributor as the responsible person and states that registration and listing do not indicate approval.
   ([fda.gov](https://www.fda.gov/cosmetics/registration-listing-cosmetic-product-facilities-and-products))
2. Registrering og melding når du produserer eller importerer kosmetikk | Mattilsynet
   · Norwegian guidance addresses translation of cosmetics from EU countries and CPNP notification when distributors change labels to meet national requirements. Applicability depends on the actual role and presentation.
   ([mattilsynet.no](https://www.mattilsynet.no/kosmetikk-og-kroppspleieprodukter/registrering-og-melding))
3. Notification of Cosmetics | Health Canada
   · Manufacturers and importers must notify Health Canada within xx.xx days after first sale. Submission does not constitute approval or establish compliance with every requirement.
   ([canada.ca](https://www.canada.ca/en/health-canada/services/consumer-product-safety/cosmetics/notification-cosmetics.html))
4. Consulta de cosméticos | Anvisa
   · Anvisa provides separate consultation routes for registered and registration-exempt cosmetics and explains that the latter undergo notification. It does not determine the status of a particular oil.
   ([gov.br](https://www.gov.br/anvisa/pt-br/comunicacao/campanhas/estetica/consulta-de-cosmeticos))

5. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
   - The domestic responsible enterprise handles registration or filing and assists recalls and regulatory cooperation. The framework does not establish the exact oil's classification or completed filing. ([english.nmpa.gov.cn](https://english.nmpa.gov.cn/2022-xx.xx/xx.xx/c_961747.htm))
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
6. Making cosmetic products available to consumers in Great Britain | GOV.UK
   - The business guidance applies to Great Britain, expressly distinguishes Northern Ireland, and requires OPSS notification before cosmetics are made available in Great Britain. ([gov.uk](https://www.gov.uk/guidance/making-cosmetic-products-available-to-consumers-in-great-britain))
7. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
8. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
9. D'un fruit marginalisé à une filière stratégique : l'ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
10. Analyse du processus d'émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
    - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
11. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
12. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

13. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.
14. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
15. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
16. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

17. Entering the European market for prickly pear seed oil for cosmetics | CBI
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
18. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
19. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
20. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.

16.1. United States

Table 232. United States Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
United States	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx

Table 233. United States Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 234. United States Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 235. United States Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 236. United States Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 237. United States Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 238. United States Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 239. United States Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 240. United States Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 241. United States Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023
   - Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.
2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A listed ingredient route supports U.S. commercial access, but does not measure annual purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The U.S. standalone-oil listing establishes an offered channel, not annual sales volume or a measured national share.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

26. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

28. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

RESEARCH SAMPLE REPORT

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.2. France

Table 242. France Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
France	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 243. France Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 244. France Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 245. France Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 246. France Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 247. France Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 248. France Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 249. France Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 250. France Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 251. France Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

· Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: France's broad-skincare exports constrain the ingredient-procurement correction; export value is not counted as seed-oil demand.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
21. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.3. Germany

Table 252. Germany Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Germany	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 253. Germany Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 254. Germany Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 255. Germany Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 256. Germany Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 257. Germany Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 258. Germany Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 259. Germany Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 260. Germany Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 261. Germany Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: German export activity challenges an import-only consumer allocation, without establishing the oil-demand multiplier.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
21. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.4. China

Table 262. China Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
China	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 263. China Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 264. China Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 265. China Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 266. China Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 267. China Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 268. China Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 269. China Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 270. China Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 271. China Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. The Provisions for Registration and Filing of Cosmetics | National Medical Products Administration
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The domestic responsible-enterprise requirement supports retaining a country-specific access constraint; it does not measure adoption or establish this oil's filing.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
21. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.5. United Kingdom

Table 272. United Kingdom Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
United Kingdom	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 273. United Kingdom Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 274. United Kingdom Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 275. United Kingdom Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 276. United Kingdom Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 277. United Kingdom Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 278. United Kingdom Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 279. United Kingdom Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 280. United Kingdom Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 281. United Kingdom Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia

   · Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.

   · Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.

3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.
7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

26. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

28. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.6. Italy

Table 282. Italy Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Italy	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 283. Italy Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 284. Italy Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 285. Italy Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 286. Italy Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 287. Italy Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 288. Italy Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 289. Italy Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 290. Italy Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 291. Italy Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status. ([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))
26. New Dietary Ingredient Notification Process | FDA
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share. ([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))
27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales. ([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))
28. 化粧品出荷 - Japan Cosmetic Industry Association
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.7. Japan

Table 292. Japan Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Japan	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 293. Japan Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 294. Japan Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 295. Japan Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 296. Japan Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 297. Japan Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 298. Japan Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 299. Japan Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 300. Japan Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 301. Japan Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Japanese broad-skincare exports provide an industrial-activity cross-check for the domestic-procurement adjustment.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
21. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.8. South Korea

Table 302. South Korea Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
South Korea	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 303. South Korea Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 304. South Korea Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 305. South Korea Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 306. South Korea Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 307. South Korea Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 308. South Korea Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 309. South Korea Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 310. South Korea Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 311. South Korea Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Beauty, make-up, skin-care (incl. suntan), nes exports by country | 2024 - WITS / UN Comtrade
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: South Korean export activity supports allowing domestic ingredient procurement, not copying finished-product exports into oil revenue.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
18. L'Oreal - 2024 Consolidated Financial Statements
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.

20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))

21. Sweet Talk Lip Oil | Monika Blunder Beauty

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.9. Spain

Table 312. Spain Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Spain	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 313. Spain Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 314. Spain Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 315. Spain Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 316. Spain Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 317. Spain Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 318. Spain Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 319. Spain Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 320. Spain Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 321. Spain Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

26. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

28. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.10. Brazil

Table 322. Brazil Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Brazil	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 323. Brazil Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 324. Brazil Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 325. Brazil Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 326. Brazil Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 327. Brazil Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 328. Brazil Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 329. Brazil Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 330. Brazil Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 331. Brazil Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

26. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

28. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.11. Australia

Table 332. Australia Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Australia	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 333. Australia Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 334. Australia Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 335. Australia Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 336. Australia Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 337. Australia Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 338. Australia Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 339. Australia Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 340. Australia Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 341. Australia Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. 100mL Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: An Australian wholesale listing and commercial price support a cosmetic ingredient route; India is stated origin, not buyer attribution, and food-grade supply is excluded.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
21. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.12. Canada

Table 342. Canada Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Canada	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 343. Canada Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 344. Canada Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 345. Canada Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 346. Canada Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 347. Canada Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 348. Canada Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 349. Canada Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 350. Canada Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 351. Canada Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Canada is explicitly supported by the ingredient seller's e-commerce policy; resulting sales and growth remain modeled.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The packaged-oil page excludes international shipping, qualifying any inference that visible U.S. consumer listings imply Canadian fulfillment.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

26. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

28. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.13. Mexico

Table 352. Mexico Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Mexico	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 353. Mexico Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 354. Mexico Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 355. Mexico Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 356. Mexico Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 357. Mexico Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 358. Mexico Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 359. Mexico Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 360. Mexico Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 361. Mexico Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

26. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

28. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.14. India

Table 362. India Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
India	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 363. India Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 364. India Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 365. India Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 366. India Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 367. India Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 368. India Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 369. India Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 370. India Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 371. India Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
13. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
14. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
15. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
16. Prickly Pear Seed Oil for Hydrated Skin | Aromantic
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

17. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

18. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
19. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
20. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

21. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
22. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
23. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
24. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

25. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

26. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

27. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

28. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

29. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
30. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
31. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

32. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
33. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
34. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
35. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

36. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
37. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
38. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
39. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
40. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

41. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
42. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
43. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
44. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
45. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

RESEARCH SAMPLE REPORT

46. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

16.15. Russia

Table 372. Russia Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million)

Country	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Russia	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 373. Russia Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million)

Refinement Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Refined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Unrefined	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 374. Russia Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million)

Application	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Cosmetics and Personal Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Dietary Supplements	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Food and Beverages	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Pharmaceuticals	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 375. Russia Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million)

Cosmetics and Personal Care	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Color Cosmetics	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Hair Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Nail Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Personal Cleansing	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Skin Care	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 376. Russia Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million)

End User	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Individuals and Households	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Manufacturers and Formulators	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Professional Service Providers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 377. Russia Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million)

Supply Format	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Bulk Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Consumer Packaging	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 378. Russia Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million)

Sales Channel	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Direct Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Intermediated Sales	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 379. Russia Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million)

Intermediated Sales	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Ingredient Distributors and Wholesalers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Retailers	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 380. Russia Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million)

Organic Certification Status	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Not Certified Organic	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Table 381. Russia Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million)

Botanical Source	2017	2024	2025	2026	2027	2032	2040	CAGR (%)
Opuntia ficus-indica	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia stricta	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Opuntia tuna	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx	xx.xx
Total	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**	**xx.xx**

Sources & Evidence

1. Chaîne de valeur « Figue de barbarie » / Région Kasserine - Rapport final, Décembre 2023

   · Evidence informing the 2023 market-value input; displayed series and growth include calculations: The December 2023 study estimates xx.xx litres of annual seed-oil production across xx.xx Kasserine processing units and identifies xx.xx processing units nationally. These are regional study estimates, not audited global sales.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Regional interviews describe intermediary bulk marketing and difficulties establishing regular export relationships. This is a regional route constraint, not a global share observation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The commercial discussion identifies ingredient wholesalers among oil buyers, supporting the merchant route used in the baseline and its conditional continuation.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 interview-based study estimates approximately xx.xx annual oil litres in Kasserine and describes certified processors alongside some conventional sourcing. These inputs calibrate, but do not directly measure, the base-year certified-volume model.

   · Evidence informing base-year allocation inputs; displayed values and growth are calculated: Mixed sourcing prevents treating all output from certified establishments as certified sales; the document supplies a commercial premise for the noncertified component.

2. UNIDO - The development of a new agro-industrial value chain in Tunisia
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: UNIDO reports xx.xx Tunisian cactus-sector companies in 2024, compared with five in 2013, and states that xx.xx% export. The company count covers the broader value chain, not exclusively independent oil producers.
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: Documented development of export-facing businesses supplies a commercial premise for conditional customer expansion; it does not establish the forecast adoption rate.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: UNIDO reports xx.xx% certified-organic product participation among Tunisian sector companies and a xx.xx% certified-farmland increase over 2013-2024. These are independent calibration checks, not oil-sales weights or proof of forecast adoption.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between company participation and certified oil sales supports retaining mixed activity rather than treating the company statistic as an exhaustive sales allocation.
3. D’un fruit marginalisé à une filière stratégique : l’ascension agro-industrielle du cactus tunisien
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The July xx.xx 2025 account reports a xx.xx% increase in consolidated Tunisian cactus-processing turnover between 2020 and 2024. This is a broader-sector growth comparator, not oil-only global revenue.
   - Evidence informing the 2024 market-value input; displayed series and growth include calculations: The reported 2020-2024 turnover increase constrains the direction of the historical backcast without imposing the same growth rate on the global oil market.
4. Analyse du processus d’émergence de la filière figue de barbarie et de ses coproduits en Algérie : potentiel, contraintes et perspectives
   - Evidence informing the 2020 market-value input; displayed series and growth include calculations: The study's 2018-2020 fieldwork covered xx.xx functioning Algerian processing units. Its aggregate table reports xx.xx litres processed, xx.xx litres of annual capacity and xx.xx litres exported; these are survey-period quantities rather than a definitive 2020 national observation.
   - Evidence informing the 2040 market-value input; displayed series and growth include calculations: The large difference between surveyed output and capacity supports distinguishing commercial demand from available capability. It does not prove future demand or supplier continuity.
5. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current supplier disclosure constrains commercial scale and available headroom, while the forecast separately assumes utilization and customer conversion.
   - Evidence informing base-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
   - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: NADA declares its offered oil as Opuntia Ficus-Indica Seed Oil and advertises approximately xx.xx litres per month of capacity. The annualized xx.xx-L capability supports a supplier-scale comparison, not global market share or fulfilled demand.
6. Bulk Cosmetics & Wholesale Supplier Morocco | ZINEGLOB
   - Evidence informing the 2026 market-value input; displayed series and growth include calculations: The disclosed capacity supports a bounded supplier-scale assumption, not an observed global growth rate.

7. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
   - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The supplier's commercial scale anchors a comparable-producer assumption; neither the peer count nor future realized sales is disclosed.

8. Prickly Pear Seed Oil - Virgin Organic - Gallon (3.5 kg) | Jedwards International

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current quotation constrains the near-term bulk-price assumption; it does not measure annual quantity sold.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the forecast price level, with subsequent changes explicitly modeled rather than attributed to the supplier.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation is a starting-price input only; the long-term price and customer trajectory remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The gallon presentation is quoted at USD xx.xx and explicitly declared Unrefined (Virgin). It independently establishes an Unrefined business-ingredient offer, without measuring its purchasing weight.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USD xx.xx per gallon presentation constrains the common ingredient-price class, not annual sales. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The quotation is a comparison input for modeled ingredient realization, not evidence of pharmaceutical purchasing or suitability. ([bulknaturaloils.com](https://bulknaturaloils.com/prickly-pear-seed-oil-virgin-organic-xx.xx-5kg-gallon.html))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx gallon-presentation quotation checks the inherited lower-price realization category; it is not a 2025 global realized price or annual manufacturer sales observation.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides a price-category check for modeled lower-price professional procurement; professional quantities and future price changes are separately assumed.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Together with the standalone quotation, this price input checks the relative-value bridge between the two inherited pools rather than assigning household share from volume alone.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The wholesale ingredient listing quotes USD xx.xx per gallon presentation. Its approximately USD xx.xx/L equivalent checks the inherited bulk price level; future price changes remain assumptions.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The bulk quotation provides the lower-realization comparator in the joint value allocation. Territorial ordering restrictions qualify the forecast access assumption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Jedwards

9. Prickly Pear Cactus Seed Oil - 1 oz by Leven Rose

- Evidence informing the 2026 market-value input; displayed series and growth include calculations: The current consumer quotation constrains the packaged-oil price level but provides no annual sales quantity.
- Evidence informing the 2032 market-value input; displayed series and growth include calculations: The quotation anchors the packaged-oil forecast price basis; buyer additions and repeat purchasing are separately modeled.
- Evidence informing the 2040 market-value input; displayed series and growth include calculations: The quotation supports the initial commercial price category, not the long-term forecast itself.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The USD xx.xx one-ounce standalone offer constrains packaged-oil realization, not annual purchasing volume. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The external-use facial-oil proposition supports standalone Skin Care mapping and its modeled price class. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The current USD xx.xx per xx.xx-oz standalone offer checks the higher-realization pool and therefore the common value denominator; it does not disclose manufacturer purchasing.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the price-category check for modeled professional small-package purchasing, without establishing the actual purchaser's role.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named standalone oil and quoted price support household-facing category mapping and the inherited packaged-oil realization level, not annual household sales or future adoption.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The standalone quotation supplies the higher-realization comparator needed to convert the inherited physical-volume mix into conditional value shares.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The one-ounce standalone oil is advertised at USD xx.xx, approximately USD xx.xx/L using the inherited xx.xx-mL package approximation. This anchors the starting price category, not forecast prices or annual sales. International shipping is excluded.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand storefront advertises a one-ounce standalone oil at USD xx.xx and states no international shipping. This checks direct-brand availability, packaged realization and territorial limits.

10. FAO strengthens national capacities to surveillance and manage cactus cochineal in the Mediterranean
    - Evidence informing the 2023 market-value input; displayed series and growth include calculations: FAO's December 2023 account documents North African cactus-origin exposure. It does not quantify lost seed-oil sales or establish an oil shortage.
    - Evidence informing the 2026 market-value input; displayed series and growth include calculations: Origin exposure is retained as a qualification and continuity constraint, without inventing an observed market-wide supply loss.
    - Evidence informing the 2032 market-value input; displayed series and growth include calculations: The documented exposure supports retaining supply-continuity sensitivity in the customer-expansion forecast.
    - Evidence informing the 2040 market-value input; displayed series and growth include calculations: Long-term growth remains conditional on commercial continuity; no quantified agricultural-to-oil loss conversion is used.

11. Entering the European market for prickly pear seed oil for cosmetics | CBI

- Evidence informing the 2032 market-value input; displayed series and growth include calculations: Existing commercial routes support conditional expansion through qualified accounts rather than assuming that every advertised application or destination becomes a sale.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December xx.xx 2023 European commercial guidance distinguishes ingredient and retail routes, supporting the common valuation bridge without establishing their global purchasing mix.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The guidance describes refining for consistent commercial characteristics and onward sale. This supports the modeled purchasing context, not the assumed global ingredient fraction or future conversion rate.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Government commercial guidance distinguishes ingredient, manufacturer and retail routes; it does not measure their global mix.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skin care is identified as a principal commercial oil application, supporting category-specific procurement assumptions.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair care is identified separately; the guidance does not establish a global oil-value share.
([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The December 2023 guidance describes manufacturer sourcing through importers or directly from exporters, supporting terminal ingredient-purchaser attribution rather than counting earlier merchant resales.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The distinction between intermediaries and terminal buyers supports excluding professional packaged resale from service-consumption procurement; the source provides no professional sales percentage.
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The retail discussion identifies standalone oil sold to consumers in small bottles, supporting a separate terminal standalone-value pool without establishing household purchase volume.

12. Russian Federation Beauty, make-up, skin-care (incl. suntan), nes imports by country | 2021 - WITS
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Russia's 2021 broad-skincare imports of USD xx.xx supply an older commercial primitive; the base-year bridge and forecast are assumptions.
13. Consumer Behavior and Sustainability: Exploring Italy's Green Cosmetics Market with Prickly Pear Seed Oil - Heliyon accepted manuscript, Figure 5
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% cold-pressed preference; its use as an Unrefined purchasing proxy requires an explicit classification assumption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Figure xx.xx reports xx.xx% refining preference and xx.xx% fruit-maceration preference; these are regional stated preferences, not sales shares.
14. Prickly Pear Seed Oil, Refined | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected Refined K0839-50ml offer is GBP xx.xx, tax-inclusive, with an Opuntia Ficus-Indica Seed Oil declaration. It supplies the refined side of the relative-price proxy, not annual sales.
15. Prickly Pear Seed Oil, Cold Pressed | INKY Ingredients
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected K0367-50ml quotation is GBP xx.xx, tax-inclusive. Together with product-specific mapping, it anchors the Unrefined comparator in the packaged-value proxy.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The same-supplier, same-size quotation provides the denominator of the xx.xx/xx.xx relative-price relationship; extrapolation beyond these offers is modeled.
16. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The parent supplier identifies K0367 and describes its cold-pressed offering as unrefined. This supports product-specific mapping, not a universal equivalence between extraction and refinement labels.

17. Prickly Pear Seed Oil for Hydrated Skin | Aromantic

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier explicitly declares Refined, xx.xx% pure oil and offers a xx.xx-mL presentation. Its simultaneous cold-pressed wording independently demonstrates why extraction terminology alone cannot determine final refinement status.

18. L'Oreal - 2024 Consolidated Financial Statements

- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported global skincare revenue supplies a downstream activity proxy, not seed-oil sales. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported haircare revenue and category growth constrain relative activity assumptions, not oil adoption. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Skincare activity is split using an explicitly assumed cleansing eligibility bridge. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Makeup activity anchors an assumed narrow nail-grooming eligibility bridge; no nail split is disclosed. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing base-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))
- Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Reported makeup activity anchors the decorative-use procurement model, not attributable seed-oil revenue. ([loreal-finance.com](https://www.loreal-finance.com/system/files/2025-xx.xx/Consolidated%20financial%20statements.pdf))

19. Prickly pear seed oil | SOPHIM
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The supplier offers the oil for skin care; application positioning is not a sales weight. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Hair-care positioning supports retaining a distinct ingredient purchasing context in both models. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Nail-care positioning supports the commercial category, not its modeled customer population or procurement coefficient. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM's own ingredient offering, application categories and commercial contact route support the manufacturer/formulator purchasing-role premise; no sales weight is inferred from application listings.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SOPHIM identifies its commercial ingredient as Opuntia Ficus-Indica Seed Oil. This supports botanical mapping within the joint allocation, not its sales weight or future adoption.
20. Regenerating Mask with Rare Prickly Pear Oil | Christophe Robin
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The named mask declares seed oil but is out of stock; it supports application identity, not continuous sales or forecast adoption. ([christopherobin.com](https://www.christopherobin.com/p/regenerating-mask-with-rare-prickly-pear-oil/xx.xx/))
21. Sweet Talk Lip Oil | Monika Blunder Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pigmented lip product declares seed oil, supporting decorative-use mapping without counting finished-product revenue. ([monikablunderbeauty.com](https://monikablunderbeauty.com/products/sweet-talk-lip-oil))

22. Grounded for Hands | Kehleia
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The nail-and-cuticle product declares seed oil and shows sold-out labeling, limiting availability-based growth inference. ([kehleia.com](https://www.kehleia.com/products/grounded-nail-cuticle-oil-pen?variant=xx.xx))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company identifies its seed-oil-containing nail-care preparation as made in-house, corroborating a specific formulator role without establishing its oil supplier, procurement volume or attributable oil revenue.
23. Face Soap with Organic Prickly Pear Seed oil | Business France Marketplace
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The company-attributed listing identifies face soap with organic seed oil; this is a cleansing-category lead, not a revenue weight. ([marketplace.businessfrance.fr](https://www.marketplace.businessfrance.fr/face-soap-with-organic-prickly-pear-seed-oil.html))
24. Kaktusfeigenkernöl | Natural Pro
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: A culinary-positioned xx.xx mL oil offer at EUR xx.xx constrains premium commercial scale, but inconsistent availability does not establish sales. ([mynaturalpro.com](https://mynaturalpro.com/products/kaktusfeigenkernol-superfood-ol-mit-naturlichem-vitamin-e-wertvollen-fettsauren))
25. Byron Bay (Free Spirit) Love Oils Organic Prickly Pear Seed Oil 30ml | David Jones Pharmacy
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The AUD xx.xx, xx.xx mL listing contains both supplement positioning and an external-use warning, leaving intended-use attribution conflicting. ([davidjonespharmacy.com.au](https://www.davidjonespharmacy.com.au/byron-bay-free-spirit-love-oils-organic-prickly-pe/))
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The pharmacy offers another brand's xx.xx mL standalone oil online, supporting third-party retailer classification rather than equating e-commerce with direct selling; no sales weight is inferred.

26. European Commission - Frequently asked questions on organic rules - March 19, 2025

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The March xx.xx 2025 guidance states that seed oil had not then been assessed under novel-food rules; current status is not established.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dated seed-oil-specific distinction supports retaining ingestible-access uncertainty rather than assuming cosmetic participation establishes food status.
([caecv.com](https://www.caecv.com/wp-content/uploads/2025/xx.xx/organic-rules-faqs_en_2025.xx.xx.pdf))

27. New Dietary Ingredient Notification Process | FDA

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The general notification framework supports a conditional access assumption, not oil-specific compliance or a numerical supplement share.
([fda.gov](https://www.fda.gov/food/dietary-supplements/new-dietary-ingredient-ndi-notification-process))

28. DailyMed - EMINENCE DAILY DEFENSE TINTED SPF - zinc oxide liquid

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The OTC monograph label lists seed oil as inactive and reports marketing from June xx.xx 2024; it supports excipient classification, not oil sales.
([dailymed.nlm.nih.gov](https://dailymed.nlm.nih.gov/dailymed/drugInfo.cfm?setid=14854bad-317e-154d-e063-6294a90a884f))

29. 化粧品出荷 - Japan Cosmetic Industry Association

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: METI-based 2025 skincare shipment share of xx.xx% supplies an independent geographic proxy check, not a seed-oil share.
([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing base-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

· Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The corresponding xx.xx% hair share challenges representativeness of the global-company activity ratio and supports hair-mix sensitivity. ([jcia.org](https://www.jcia.org/user/statistics/shipment))

30. Global Wellness Economy Monitor 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The original spa-establishment estimates provide the lagged professional-demand footprint; assumed professional procurement is deducted from the inherited ingredient pool to derive manufacturer activity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Tables xx.xx and xx.xx estimate xx.xx worldwide spas in 2024 and xx.xx in 2019. These constrain commercial scale, not oil penetration. Improved listing coverage qualifies the growth comparison.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional footprint is an input to modeled professional standalone purchases, which are deducted before assigning remaining standalone value to households; household sales are not measured by this source.
31. Hyatt Regency Casablanca Spa Brochure
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The undated brochure advertises a professional facial setting involving pure prickly pear seed oil. It supports the service-consumption category premise, not continuing procurement, oil quantities or a service-fee-to-oil conversion.
32. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The brand offers its standalone oil in a xx.xx-mL roll-on and xx.xx- and xx.xx-mL formats. These establish commercial presentation examples, not sales weights or future adoption.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Comptoir des Huiles identifies Opuntia Stricta Seed Oil as the standalone oil's sole ingredient and offers consumer presentations. This supports a standalone purchasing route; the model's packaged-volume percentage remains assumed.

33. Prickly Pear Seed Oil Wholesale 34oz - KENZA International Beauty
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The xx.xx-oz ingredient offering is advertised for brands, formulators and spas at USD xx.xx corroborating professional ingredient supply and heterogeneous commercial quotations without measuring global Bulk sales.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The professional and formulation purchasing contexts qualify any automatic buyer-to-format mapping. The source does not disclose the proportion sold as completed standalone professional units.
34. COSMOS-standard Technical Guide, Version 4.2 - September 1, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The September 2025 guide distinguishes ingredient-distributor repacking and replacement-label situations from unchanged material retaining the manufacturer's label. This supports conditional commercial handling commitments, not a numerical sales penalty.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Certification consequences qualify assumptions about frictionless presentation changes. The guide supplies no adoption rate, repacking cost or forecast category share.
35. Legislation - Cosmetics | European Commission
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The Commission identifies responsible-person and pre-market safety-report requirements for finished cosmetics. These corroborate a distinct commercial market-placement commitment, not a measured Consumer Packaging share or conversion rate.
36. Frequently Asked Questions - Wholesale, 2022 Economic Census
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Official definitions distinguish affiliated manufacturer selling operations and own-brand marketers from independent merchants; these support the model's direct-principal attribution, not a measured oil share.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Merchant wholesalers act on their own account, whereas agents and electronic facilitators may earn commissions or fees. The allocation excludes duplicated facilitator revenue.

37. Consumer behavior and sustainability: Exploring Italy's green cosmetics market with prickly pear seed oil
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Herbalist shops attracted xx.xx% of reported channel preferences in a xx.xx-person survey, supporting substantial retail participation but not a global spending percentage.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The geographically concentrated consumer evidence constrains the retail-led packaged scenario; the global bridge and unchanged within-cohort forecast incidence remain assumptions.
38. COSMOS certification - Organic and natural
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS defines its organic-content raw-material certification separately from nonorganic approval, supporting the certified numerator boundary rather than a sales quantity.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: COSMOS approval of nonorganic material is not organic certification; approval alone does not establish whether another applicable organic certificate exists.
39. COSMOS CERTIFIED - Certified raw materials database
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The inspected database contains certified seed-oil entries for AOT and Statfold with named certifying bodies. It corroborates commercial certification eligibility, not their sales or the modeled forecast.
40. Cosmetics, Body Care, and Personal Care Products | Agricultural Marketing Service
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: USDA describes certification across relevant agricultural ingredient, handling and final-product operations. This supports attribution at the terminal oil sale rather than relying solely on upstream organic positioning.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Upstream ingredient status alone is insufficient for the specified certification-dependent final-product proposition, supporting the model's allowance for certification discontinuity.
41. Soil Association Certification - O&3 Trading Schedule, issued April 9, 2025
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The Soil Association trading schedule for O&xx.xx lists Prickly Pear Oil as Organic. Issued April xx.xx 2025 and valid until January xx.xx 2026, it establishes dated eligibility, not fulfilled sales or later certification.

42. Renala - Natural Ingredient Catalog
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Renala's natural-ingredient catalog identifies Opuntia stricta seed oil and advertises annual oil capacity of xx.xx tonnes. This anchors a comparable commercial capacity unit, not realized sales or the final modeled share.
43. Huile végétale de Figues de Barbarie - PhileoL
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's stricta oil page identifies Madagascar provenance, commercial bulk presentations and an indicative density of xx.xx. Density supplies the traded-mass-to-volume bridge; presentations do not measure annual shipments.
44. Prickly Pear Omega-6 Seed Oil - South Atlas | SAHARÔME
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: SAHARÔME advertises Moroccan seed oil using dillenii and stricta var. dillenii terminology, with xx.xx-kg and xx.xx-kg commercial presentations. Combined with Kew normalization, this supports tuna-category attribution and an ingredient route, not observed 2025 sales or the assumed xx.xx-L activity.
45. Opuntia tuna (L.) Mill. | Plants of the World Online | Kew Science
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: Kew accepts Opuntia tuna and lists Opuntia dillenii and Opuntia stricta var. dillenii as synonyms, supporting non-overlapping normalization of the advertised dillenii offering.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The synonym mapping prevents the same dillenii-described oil from also being counted in the stricta numerator merely because its advertised synonym contains stricta.
46. PhileoL - Huile de pépins de Figue de Barbarie
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: PhileoL's current commercial page lists both ficus-indica and stricta ingredient names, qualifying any exclusive assignment of Madagascar-origin oil to stricta. The species sales split is not disclosed.
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: The dual botanical declaration constrains the stricta attribution model and prevents treating country of origin as a measured species share.

47. The European market potential for prickly pear seed oil for cosmetics | CBI
    - Evidence informing base-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.
    - Evidence informing forecast-year allocation inputs; displayed values and growth are calculated: CBI's commercial classification identifies OPUNTIA FICUS-INDICA SEED OIL. This corroborates the established ingredient identity but does not disclose a global botanical sales mix.

17. Competitive Landscape

17.1. Market Share Analysis, 2025

[redacted] The relevant account-access distinction is whether the seller accepts the required oil identity, documentation, territory, and delivery obligations. A visible consumer brand is not automatically an alternative to an ingredient contract, and a wholesale listing does not establish consumer distribution.

Origin enterprises compete with intermediaries through different contributions. [redacted] Direct origin engagement can improve counterparty visibility while leaving destination services and document coordination to agreement.

[redacted] These are origin-counterparty leads; exact offers and continuing commitments determine their purchasing role.

Moroccan private-label alternatives should be compared by the responsibility they accept. ZINEGLOB advertises brand support and has a buyer-published sourcing connection to PUREZA. [redacted]

For Coopérative Yacout, Coopérative Mogador Organic, Coopérative féminine Aachab Naama, Coopérative agricole al aaz, Coopérative Agricole FLORA, Coopérative féminine Aknari, Coopérative Mabio Cosmétique, Coopérative RIHAM, Coopérative SAHARA CACTUS,

Coopérative TAFYOUCHT, OLI-ARGANA, SANTIS, CACTUS COMMODITIES, Coopérative AFOULKI AIT BAAMRANE, and Coopérative Essaouira Bio, current oil-specific selling commitments and cooperative or operator attribution remain qualification conditions. ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ These identities can broaden supplier outreach without being presumed equivalent to a qualified incumbent or excluded because their current terms are unresolved.

Madagascar-linked alternatives also differ in evidentiary scope. Aromeya advertises a wholesale seed-oil offer; Comptoir des Huiles provides a separately declared branded product. ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪

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▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ The buyer's choice is consequently between different sellers and obligations, not simply between Mexican labels. A shared origin does not establish common ownership, equivalence, or access to the same terms.

North American ingredient competition includes specific wholesale or specialist presentations from Bella Terra Oils, HBNO, Wholesale Botanics, Nature In Bottle, and Lotus Garden Botanicals, LLC. Gardenia Naturals Laboratories Canada Inc. explicitly positions Tuna Oil as a cosmetic raw material. ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪

▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪ ▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ Their commercial catalogs support ingredient-supply investigation rather than an inference of adoption in every studied application. An entrant competing with these routes needs a specific advantage in accepted documentation, origin visibility, delivery responsibility, or buyer service; a broader catalog alone does not establish a reason to switch.

[illegible] These are marketed supplier propositions, not independent proof of Indian agricultural origin or ownership of production. A buyer seeking a local counterparty can investigate the route while separately qualifying the source, declaration, certification requirements, and destination obligations.

Regional consumer access is not confined to origin-export businesses. [illegible] These distinctions support regional channel comparison without establishing local agricultural production, pharmaceutical permission, or fulfilled supply for every destination.

Australia- and New Zealand-facing ingredient routes include New Directions Australia Pty Ltd., The SkinScience Company, Phytoverse, Go Native New Zealand Ltd, and PureNature. Their local selling interfaces should be compared with the import work a buyer would otherwise undertake, not treated as evidence of local oil origin. [illegible]

Figure 28. Global Prickly Pear Seed Oil Market Share, by Key Player, 2025

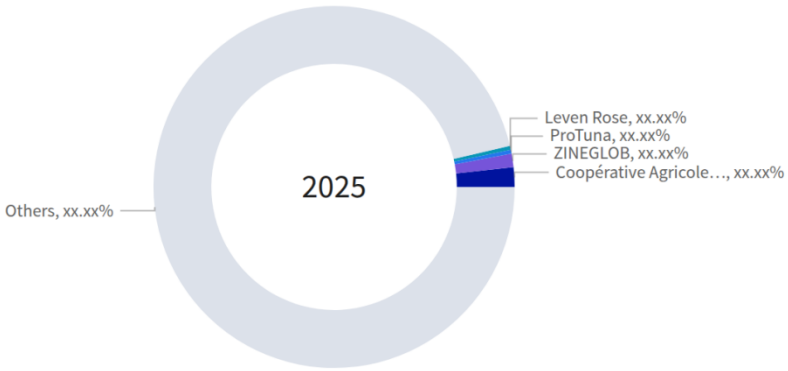

Table 382. Global Prickly Pear Seed Oil Market Share, by Key Player, 2025

Key Player	Share (%)
Biovalley	xx.xx
Coopérative Agricole NADA	xx.xx
Leven Rose	xx.xx
ProTuna	xx.xx
ZINEGLOB	xx.xx
Others	xx.xx

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   - Leven Rose markets an Unrefined standalone seed oil for external use.
   - Evidence informing base-year company-share estimates: Offers the one-ounce standalone oil at USD xx.xx and displays xx.xx product-feedback events dated in 2025 and marked Verified.
   - Evidence informing base-year company-share estimates: Those events anchor the assumption-led purchasing model; the source does not disclose response probability, annual units or revenue.
   - Evidence informing base-year company-share estimates: The direct storefront excludes international shipping; that restriction is not generalized to every selling route.
2. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa
   - PRÍ PEAR solicits South African ingredient business and offers commercial documentation on request.
3. Prickly pear seed oil | SOPHIM
   - SOPHIM declares a Virgin Organic cosmetic ingredient and provides documentation, sample, and account-contact routes; listed applications do not establish adoption. ([sophim.com](https://www.sophim.com/en/product/prickly-pear-seed-oil/))
4. Entering the European market for prickly pear seed oil for cosmetics | CBI
   - CBI's December 2023 guidance names Bionaturehouse, King of Cactus, and Maki Oil among sourcing alternatives; that dated guidance does not establish current contracts.
5. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
   - Comptoir des Huiles declares Unrefined Opuntia stricta Seed Oil as its sole ingredient and identifies Madagascar sourcing.
6. Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
   - New Directions Australia lists conventional Opuntia Ficus-Indica Seed Oil under OV100PRICPEAR and expressly excludes food-grade raw materials.
7. Women-led enterprise transforming Tunisia's beauty industry | UNIDO
   - UNIDO describes Biovalley's origin-linked business, organic certification, export orders, and business-wide exports alongside finished cosmetics. ([unido.org](https://www.unido.org/stories/women-led-enterprise-transforming-tunisias-beauty-industry))
   - Evidence informing base-year company-share estimates: UNIDO's February xx.xx 2026 account describes export development and a finished-cosmetics unit opened in July 2024.
   - Evidence informing base-year company-share estimates: Supports excluding broader finished-product business from the modeled standalone-oil numerator.
8. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   - ZINEGLOB advertises a seed-derived oil and private-label and distributor support from Morocco.
   - Evidence informing base-year company-share estimates: Establishes the advertised standalone prickly pear oil and commercial inquiry route.
   - Evidence informing base-year company-share estimates: Supports distinguishing oil supply from broader formulated-cosmetic activity without measuring annual sell-through.

9. Prickly Pear Seed Oil Canada - Organic Moroccan Face Oil | PUREZA
   - PUREZA markets standalone oil and explicitly identifies ZINEGLOB SARL as its source.
   - Evidence informing base-year company-share estimates: PUREZA identifies ZINEGLOB SARL as its oil source.
   - Evidence informing base-year company-share estimates: Supports excluding a separately branded downstream sale from ZINEGLOB's terminal numerator; no annual purchase quantity is disclosed.
10. Prickly Pear Seed Oil, Cold Pressed - O&3
    - O&xx.xx lists a named seed-oil ingredient with business enquiry and documentation routes.
11. Prickly Pear Seed Oil - Virgin Organic | Jedwards International
    - Jedwards advertises Virgin Organic Prickly Pear Seed Oil through a wholesale purchasing interface.
12. Boterra Materials - Certified African Botanicals
    - Boterra Materials advertises a UK B2B coordination route for South African Opuntia ficus-indica seed oil.
13. Aceite Orgánico de Semillas de Tuna - SEMYAS BIO
    - SEMYAS BIO separately markets seed oil, explicitly declares Opuntia Ficus Indica, and names its Mexican producer.
14. Bulk Organic Virgin Prickly Pear Seed Oil | Praan Naturals
    - Praan Naturals lists Organic Virgin Prickly Pear Seed Oil from Mexico, refers to an unnamed manufacturing partner, and offers document and quotation routes.
15. Organic prickly pear seeds oil - Nopal Tunisie
    - Nopal Tunisie describes a Tunisian family-owned business producing and exporting organic seed oil for cosmetic markets; its unsupported leadership language is not adopted.
16. Setragal | Supplier of prickly pear seed oil bio - About us
    - SETRAGAL describes a Moroccan specialist seed-oil business and cooperative partner relationships; the page does not establish current transaction-specific certification.
17. Annuaire des opérateurs de la filière figue de barbarie en Tunisie
    - The PAMPAT directory records oil activity for the named Tunisian enterprises; these are business leads, not delivery commitments. ([pampat.tn](https://pampat.tn/wp-content/uploads/2019/xx.xx/Guide-Ope.FdeB-xx.xx-Web.pdf))
18. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Coopérative Agricole NADA advertises Moroccan bulk and private-label seed-oil supply; the page does not establish cooperative governance or executed export contracts.
    - Evidence informing base-year company-share estimates: The company advertises approximately xx.xx L/month of oil capacity and bulk/private-label purchasing routes. Capacity anchors the working model but is not realized annual revenue.
19. Bulk Prickly Pear Seed Oil - Lotus Lab
    - Lotus Lab advertises bulk Moroccan prickly pear seed oil and private-label services.
20. Ingrédients - Botanicalex
    - Botanicalex identifies prickly pear seed oil within its ingredients proposition.
21. Figue de barbarie de Madagascar - Aromeya
    - Aromeya advertises wholesale Madagascar prickly pear oil explicitly identified as seed-derived.
22. Balsem Oil
    - Balsem Oil presents a standalone prickly pear seed-oil product and South African origin positioning.
23. Pure Cactus Seed Oil - Cactus Circle Co
    - Cactus Circle Co separately lists pure Opuntia ficus-indica seed oil alongside its skincare products; this does not establish an ingredient contract.
24. Tsutsuy Beauty - Official Storefront
    - Tsutsuy Beauty's storefront separately lists seed oil; a listing does not establish replenishment or completed supply.
25. Productores de Tuna San José del Sitio - ProTuna
    - ProTuna's portfolio includes prickly pear seed oil and Golden Garden Cosmetics.

26. Aceite de Tuna roll on - Yutnüu
    - Yutnüu offers a consumer Aceite de Tuna roll-on advertised as pure oil.
27. Bulk Prickly Pear Seed Oil | Bella Terra Oils
    - Bella Terra Oils maintains a bulk-wholesale prickly pear seed-oil listing for cosmetic use.
28. Organic Prickly Pear Seed Oil - HBNO
    - HBNO maintains a bulk product listing for organic prickly pear seed carrier oil.
29. Prickly Pear Oil - Wholesale Botanics
    - Wholesale Botanics separately markets prickly pear oil identified as Opuntia ficus-indica seed oil.
30. Prickly Pear Seed Oil Organic - Nature In Bottle
    - Nature In Bottle maintains a dedicated prickly pear seed-oil listing with Morocco-origin positioning.
31. Prickly Pear Seed Oil - Lotus Garden Botanicals
    - Lotus Garden Botanicals separately lists seed oil and provides a larger-order enquiry route.
32. Tuna Oil | Cosmetic Raw Material - Gardenia Naturals Laboratories Canada Inc.
    - Gardenia's Tuna Oil page identifies prickly pear seed oil as a cosmetic raw material and declares Opuntia Ficus-Indica Seed Oil.
33. Prickly pear seed oil - Ziani Organic Oils
    - Ziani Organic Oils maintains a B2B prickly pear seed-oil catalog record; its historical page context does not establish a current contract.
34. Vegetable oils and fats for commercial customers - Oleador GmbH
    - Oleador GmbH's commercial vegetable-oil portfolio lists prickly pear seed oil.
35. Olej z opuncji figowej - Natural Poland
    - Natural Poland advertises wholesale seed-oil distribution and identifies STRZELCZYK Sp. z o.o. as its operator.
36. Organic Prickly Pear Oil - B2B Royal Bio
    - Royal Bio advertises organic seed oil for professional cosmetic customers.
37. Catálogo Nutrifoods - Productos
    - Nutrifoods' commercial catalog lists prickly pear seed oil; catalog inclusion does not establish application-specific adoption.
38. Prickly Pear Seed Oil - VedaOils
    - VedaOils separately markets prickly pear cactus seed oil through its India-facing store.
39. Prickly Pear Oil - Avi Naturals
    - Avi Naturals markets a separate prickly pear oil identified as seed-derived.
40. Pure Prickly Pear Seed Oil - Deve Herbes
    - Deve Herbes separately offers Pure Prickly Pear Seed Oil identified as Opuntia ficus-indica.
41. Organic Carrier Oil - Aromaaz International
    - Aromaaz International's supplier catalog includes organic prickly pear seed carrier oil and advertises wholesale and export roles.
42. Carrier Oil - Salvia Cosmeceuticals
    - Salvia Cosmeceuticals' carrier-oil catalog includes a separate prickly pear seed-oil offering; advertised origin does not establish production ownership.
43. Prickly Pear Seed Oil - Purenso Select
    - Purenso Select separately lists Opuntia ficus-indica seed oil for cosmetic customers.
44. Prickly Pear Seed Oil - Essentialoilsofindia
    - Essentialoilsofindia maintains a dedicated prickly pear seed-oil product record.
45. Prickly Pear Seed Oil - Allin Exporters
    - Allin Exporters separately markets seed oil and provides a bulk-enquiry channel.
46. Huile Végétale De Pépins De Figue De Barbarie - EVEXIA PHARMA
    - EVEXIA PHARMA advertises a standalone seed-oil product through an Algeria-facing store; its name does not establish pharmaceutical permission.

47. Huile de pépins de figue de barbarie - Azul Cosmétique DZ
    - Azul Cosmétique DZ separately advertises prickly pear seed oil and Algeria-origin production positioning.
48. Hiam Cosmetics
    - Hiam Cosmetics' catalog identifies an Algerian natural-oils proposition and a seed-oil offering, without resolving every brand-operator relationship.
49. Silk Route
    - Silk Route's Egypt-facing storefront lists prickly pear seed oil; catalog presence does not establish replenishment.
50. Pure Regenerating Prickly Pear Oil - IZIL Beauty
    - IZIL Beauty markets a separately supplied Pure Regenerating Prickly Pear Oil through its UAE-facing product record.
51. Organic Prickly Pear Oil - Aroma Tierra
    - Aroma Tierra separately advertises organic prickly pear seed oil through a UAE-facing purchasing route.
52. Moroccan Prickly Pear Seed Oil UAE - AlZiyana
    - AlZiyana's UAE-facing record separately advertises Moroccan prickly pear seed oil.
53. Moroccan Ingredient Supplier Facts, UAE and GCC | Al Mamlaka
    - Al Mamlaka Natural Ingredients Trading identifies a UAE/GCC requirement-led B2B supply role and includes Moroccan prickly pear seed oil.
54. HER - Official Storefront
    - The HER storefront lists organic seed oil and identifies Ajmal Reem Trading Establishment as its operator; these are company-published identifiers.
55. Prickly Pear Seed Oil - Wholesale | The SkinScience Company
    - The SkinScience Company separately advertises seed oil through an Australian wholesale product route.
56. Vegetable and Liquid Carrier Oils | Phytoverse
    - Phytoverse's carrier-oil catalog lists prickly pear seed oil and offers commercial enquiries.
57. Barbary Fig Seed Oil Organic | Go Native New Zealand Ltd
    - Go Native New Zealand Ltd separately offers barbary fig seed oil, also identified as prickly pear seed oil.
58. Skincare | PureNature NZ
    - PureNature's New Zealand catalog separately lists prickly pear seed oil.
59. Organic Prickly Pear Seed Oil | KALYA
    - KALYA separately markets an organic consumer seed-oil product through its Australia-facing storefront.
60. Organic prickly pear seed oil - VIZU
    - VIZU separately markets organic virgin prickly pear seed oil through its storefront.
61. CACTI - Official Brand Portfolio
    - CACTI separately presents Seed Oil xx.xx rather than only a blended-oil product.
62. SIPPO - Collaborating to Increase Exports in Tunisia
    - Evidence informing base-year company-share estimates: Reports three confirmed Biovalley orders totaling EUR xx.xx from xx.xx potential clients.
    - Evidence informing base-year company-share estimates: Provides the order-cohort scale used in the modeled numerator; it does not establish recognized calendar-2025 seed-oil revenue.
63. Bulk Cosmetics & Wholesale Supplier Morocco - ZINEGLOB
    - Evidence informing base-year company-share estimates: Advertises approximately xx.xx litres per month of prickly pear oil capacity, subject to availability and requirements.
    - Evidence informing base-year company-share estimates: Supports the capacity primitive, not the assumed 2025 availability, xx.xx% commercial realization or terminal-channel fractions.

64. Prickly Pear Seed Oil (En) - Productores de Tuna San José del Sitio
    - Evidence informing base-year company-share estimates: Advertises pure seed oil in xx.xx-mL and xx.xx-L presentations and annual capacity of xx.xx L; supports the commercial-scale input, not realized 2025 sales.
    - Evidence informing base-year company-share estimates: Separately identifies coriander oil and a blended offering, which are excluded from the modeled pure-oil numerator.
65. Refund Policy - Leven Rose
    - Evidence informing base-year company-share estimates: Identifies purchases through official-seller accounts on Amazon, Walmart, Amazon.ca and TikTok Shop, establishing additional principal-selling routes without measuring their oil-specific sales.
    - Evidence informing base-year company-share estimates: Distinguishes official-seller purchases from unauthorized resellers, supporting non-overlapping attribution.
66. Huile de Graines de Figue de Barbarie - NADA
    - Evidence informing base-year company-share estimates: The standalone seed-oil listing offers xx.xx mL and xx.xx mL presentations through a direct purchasing interface. It supports the modeled terminal-selling role, not its assumed sales fraction.
67. Points de vente NADA au Maroc
    - Evidence informing base-year company-share estimates: The company describes more than xx.xx points of sale across xx.xx Moroccan cities. This is business-wide distribution context, not oil-specific annual throughput or proof of controlled retail ownership.

17.2. Market Concentration Analysis, 2025

Control over the selling interface, the upstream oil source, and the consumer brand resides in different relationships. ■■■■■■■■■ ■■■■■ ■■■■■■■■■■ ■■■■ ■■ ■■■■■■■ ■■ ■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■ ■■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■ ■■■ ■■■■■■■ ■■■■ ■■■■■■■■■■ ■■■■■■ ■■■■ ■■ ■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■ ■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■ ■■■■■ ■■■■■■■■■ ■■■■■ ■■■ ■■■■■■ ■■■■■■■■ ■■■■■ ■■■■■■■■■ ■■■■■ ■■■■■■■■■■■■ ■■■ ■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■■ These relationships prevent treating every brand or storefront as independently controlled competition, but they do not establish ownership of each oil's origin producer.

Naissance illustrates the importance of identifying the actual operator rather than matching a similar company name. ■■■ ■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■■ ■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■ ■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■ ■ ■■■■■■■■■■ ■■■■■■■ ■■■■ ■■■■ ■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■ ■■■■ ■■■ ■■■■■■■ ■■■■■ ■■■■■■■■ ■■ ■■■■■ ■■■■■■■■■■■■■■ Buyers assessing concentration of exposure should map the contracting entity and the oil source separately.

ZINEGLOB and PUREZA occupy different positions in a disclosed supply relationship. ■■■■■■ ■■■■■ ■■■■■■■■ ■■■■ ■■ ■■■ ■■■ ■■■■■■■ ■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■ ■ ■■■■■■■■■■ ■■■■■ ■■■■■■■■■ ■■■■ ■ ■■■■■ ■■ ■■■ ■■■■■■■■ ■■■■■■■ ■■■■■ ■■■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■ ■■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■ ■■■■■■■■■■■ ■■ ■■■■■■■■■■■■■ ■■■■■■ A competing brand can investigate ZINEGLOB directly only after agreeing its own packaging, rights, documentation, and delivery responsibilities.

Several protected identities cannot yet support an independence conclusion. New Directions Aromatics and New Directions Australia Pty Ltd. should not be consolidated or presumed unrelated from their names. ■■■ ■■■■ ■■■■■■■ ■■■■■■■ ■■ ■■■■ ■■■■■■■■ ■■■ ■■ ■■■■

[redacted]

Channel proliferation can increase access without diversifying production exposure. VigorLife advertises Leven Rose oil for shipment from the United States and expressly disclaims Brazilian inventory. [redacted]

Intermediary bargaining power depends on an accepted contribution rather than catalog breadth. [redacted] An intermediary is preferable only when its written obligations close that specific gap; the trade-off is another contractual relationship and potentially less direct control.

The practical entry constraint is the buyer's qualified replacement set. A seller can retain leverage where changing counterparty would also change the botanical declaration, certification promise, document-acceptance arrangement, or territorial service. [redacted]

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics | CBI
   - CBI distinguishes intermediary documentation coordination from the supplier's obligations and identifies direct sourcing as an alternative; the comparative recommendation remains conditional.
2. Prickly Pear Seed Oil, Refined | INKY Ingredients
   - INKY identifies O&xx.xx as its parent and directs buyers to O&xx.xx documentation.
3. Vous êtes un professionnel - Comptoir des Huiles
   - Comptoir des Huiles directs professional buyers to Ankorstore and Faire and invites private-label enquiries; the page does not establish exclusive appointments.
4. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   - Advertised private-label services support investigating a supplier-to-brand route without establishing exclusive rights.

5. Prickly Pear Seed Oil Canada - Organic Moroccan Face Oil | PUREZA
   - The buyer-published sourcing disclosure establishes a specific connection, not exclusivity, independent production, or transferable terms. ([pureza.ca](https://pureza.ca/products/pureza-prickly-pear-seed-oil-30ml))
6. Shipping policy - Leven Rose
   - Leven Rose's direct-store shipping policy states that it does not ship internationally.
7. Refund policy - Leven Rose
   - Leven Rose's refund policy distinguishes eligible official-seller purchases and disclaims authenticity and freshness assurances for unauthorized sellers.
8. Boterra Materials - Certified African Botanicals
   - The advertised documentation and coordination role does not name independent upstream producers or establish exclusive sourcing rights.
9. Politique d'expédition - Semyasbio
   - SEMYAS BIO's French shipping policy identifies SAS Mexibio as seller and defines conditional delivery scope rather than universal fulfillment.
10. Bulk Organic Virgin Prickly Pear Seed Oil | Praan Naturals
    - The page identifies Praan Naturals as Natural Sourcing, LLC's bulk/wholesale arm.
11. Annuaire des opérateurs de la filière figue de barbarie en Tunisie
    - Directory domains and shared contacts support the stated identity leads, not completed ownership determinations.
12. Productores de Tuna San José del Sitio - ProTuna
    - The Mexican portfolio relationship does not establish a connection with Tunisian GOLD GARDEN.
13. O&3 LIMITED - Persons with significant control | Companies House
    - Companies House identifies IMCD UK Limited as O&xx.xx Limited's active controlling shareholder. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/xx.xx/persons-with-significant-control))
14. About Us - Eden Botanicals
    - Eden Botanicals states that it joined the Biolandes group; the disclosure does not establish the producer of every offered oil.
15. Terms & Conditions - Mystic Moments UK
    - Mystic Moments' business terms identify Madar Corporation Ltd as the contracting operator.
16. THE NAISSANCE TRADING & INNOVATION COMPANY LTD | Companies House
    - Companies House identifies THE NAISSANCE TRADING & INNOVATION COMPANY LTD under company number xx.xx. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/xx.xx))
17. Organic Prickly Pear Oil | Naissance
    - Naissance's oil page identifies the trading business in its business-contact information.
18. Prickly Pear Cactus Seed Oil - Virgin | Bulk Naturals
    - Bulk Naturals separately lists virgin prickly pear cactus seed oil; the product page does not settle its ownership relationship to My Bulk Naturals.
19. My Bulk Naturals
    - My Bulk Naturals advertises prickly pear cactus seed oil through a separate storefront; storefront distinction does not establish separate ownership.
20. Our Products - Oriental Group
    - Oriental Group's official portfolio lists organic prickly pear seed oil; it does not settle ownership links with similarly named Organica identities.
21. Organic Prickly Pear Seed Oil Wholesale Supplier in Morocco - Organica Group
    - Organica Group's own record advertises Moroccan bulk and private-label seed oil without establishing its relationship to Oriental Group or Tunisian ORGANICA.

22. MED-EXOIL SARL - Ecocert
    - Ecocert identifies MED-EXOIL SARL; the operator entry does not establish another independent business for the protected Med-Exoil and MED EXOIL identities.
23. À propos - Thala Bio Luxe
    - Thala Bio Luxe describes a Tunisian bulk-oil export proposition; the page does not establish legal continuity with BIOTHALA.
24. Óleo de Semente de Figueira-da-Índia Leven Rose - VigorLife
    - VigorLife advertises Leven Rose oil for shipment from the United States and expressly disclaims Brazilian inventory; the listing does not establish brand authorization.
25. Óleo de Sementes de Pera Espinhosa Orgânico - Vitaminer Shop
    - Vitaminer advertises a branded imported prickly pear oil purchasing route; this does not establish an independent origin producer or authorized appointment.

17.3. Recent Developments & Impact Analysis, 2025

[redacted] The record does not identify a replacement operator or establish continuing seed-oil supply. Buyers should confirm the contracting seller and treatment of existing commitments before relying on the brand as a replenishment alternative.

New Directions Aromatics' January xx.xx 2026 announcement described a combination with Aromatic Fragrances International. [redacted] The announcement does not establish oil-specific integration, improved fulfillment, or a relationship with New Directions Australia Pty Ltd.; those conditions should be verified before changing procurement arrangements.

[redacted] An importer can investigate a broader commercial relationship, but should distinguish ingredient supply from finished-cosmetic services and agree the scope of each. Business-wide export experience is relevant counterparty evidence, not an oil-specific destination guarantee.

[redacted] This is a documentation event, not evidence of a first product launch or additional inventory. A certification-led buyer can use it to assess the named proposition, subject to continuing status and transaction coverage, while making later purchasing contingent on renewed evidence.

Tsutsuy Beauty's commercial role is clarified by Brillo De Tuna's business history, which describes a 2024 separation of focus between standalone seed-oil commercialization and the sister brand's formulated skincare. The competitive implication is a clearer distinction between an oil purchasing counterparty and a downstream skincare proposition. ■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■ ■■■ ■■■■■■■■ ■■■■■■■ ■■■■ ■■■■■■■■■■ ■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■ ■ ■■■■■■■■ ■■■ ■■■■■■■■■■

Sources & Evidence

1. Women-led enterprise transforming Tunisia's beauty industry | UNIDO
   · UNIDO's February xx.xx 2026 account reports that a Tunis unit dedicated to finished cosmetics opened in July 2024; reported exports are not attributed exclusively to standalone oil.
2. IONC COSMOS CERTIFIED Certificate - AOT GmbH
   · The certificate states validity from January xx.xx 2026, through January xx.xx 2027; this is a qualification period, not a product-launch or inventory record. ([aot.de](https://www.aot.de/files/content/Zertifikate/cosmos-certified.pdf))
3. AROMANTIC LIMITED - Insolvency | Companies House
   · Companies House records that Aromantic Limited entered administration on September xx.xx 2026; the record does not identify a replacement storefront operator or continuing oil supply. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/SC299277/insolvency))
4. New Directions Aromatics Partners with Aromatic Fragrances International | TruArc Partners
   · The January xx.xx 2026 announcement describes New Directions Aromatics' combination with Aromatic Fragrances International and a broader ingredients platform; oil-specific integration and fulfillment are not established. ([truarcpartners.com](https://truarcpartners.com/news/new-directions-aromatics-partnership-aromatic-fragrances))
5. Nosotros - Brillo De Tuna
   · Brillo De Tuna's business history describes a 2024 separation of focus under which Tsutsuy Beauty concentrated on standalone seed-oil commercialization while the sister brand retained formulated skincare.

17.4. Product Portfolio Analysis, 2025

Portfolio breadth matters only after the purchasing object is matched. ■■■■■■ ■■■ ■■■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■ ■■■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■ ■■■■■ ■■■■■ ■■■■ ■■■ ■■■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■ ■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■ ■■■ ■■■ ■■■■ ■■■■■■■■ ■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■ ■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■ ■■■■ ■■■ ■■■■■■■■■■ ■ ■■■■■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■ Buyers should compare ingredient procurement, professional consumption, branded resale, and private-label supply separately.

Refinement labels do not establish identical declarations. New Directions Aromatics' Unrefined offering declares Opuntia Ficus-Indica Seed Oil, whereas its Canadian Cosmetic Grade - Refined presentation also declares Olus Oil. ■■■ ■■■■■■ ■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■■■■■■■■■■ ■■ ■ ■■■■■■■■■■■■■■■■ ■■■■■■■ ■■■■■ ■■■■■■■■■■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■

[illegible]

Botanical differentiation also changes the proposition. Comptoir des Huiles explicitly offers Unrefined Opuntia stricta seed oil from Madagascar; SEMYAS BIO and Gardenia Naturals Laboratories Canada Inc. identify Opuntia ficus-indica despite using tuna in their product terminology. [illegible]

Organic positioning must be attributed to the offering, not indiscriminately to the supplier. AOT GmbH has oil-specific certification support. [illegible]

North American consumer and ingredient storefronts overlap in product identity but differ in commercial presentation. [illegible] A manufacturer should qualify documentation and continuing delivery independently of whether the same oil is also available in consumer packaging.

Canadian purchasing routes require a further distinction between an oil offer and an ingredient narrative. [illegible] These different records should not be treated as equally evidenced commitments to replenish an ingredient account.

European retail portfolios demonstrate competition for consumers and smaller ingredient buyers without establishing a common upstream source. Naissance, Florihana, Aroma-Zone, and Arganour separately market the oil. [illegible]

ESENT, Sahara B, Eliksir Maroka, and Oleaia provide Polish-language product or wholesale presentations. PureOil, Souqi, Arganian, and Herbs & Seed Oil provide Dutch-language or Netherlands-facing purchasing routes. ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪

Amygdalea and Creta Carob list prickly pear oil within broader commercial portfolios. Opella, Naturkosmos, and Organic Makers provide Swedish-language product or ingredient records; Argania, Chrüterhüsli AG, and Sodina Cosmetics provide Swiss-facing branded offers. ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪

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Asia-Pacific portfolios distinguish local ingredient access from consumer-brand positioning. ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ These differences matter to the buyer's chosen purchasing relationship; they do not demonstrate that an imported botanical has been produced in the storefront's country.

Adjacent finished-product positioning should not be mistaken for standalone oil supply. Bellara describes prickly pear seed oil among its skincare ingredients, and CactuSia BioTherapy markets a face-serum proposition; separate oil-supply obligations remain unresolved. ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   · The product record establishes a consumer-packaged oil proposition, not manufacturer-level ingredient obligations.
2. Prickly pear seed oil | SOPHIM
   · The named ingredient offering is a different purchasing object from a standalone consumer oil.
3. Prickly Pear Seed Oil, Refined | INKY Ingredients
   · The named Refined listing is an affiliated purchasing interface, not proof of independent source or grade equivalence.
4. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
   · The explicit Opuntia stricta declaration establishes a distinct botanical proposition, not automatic equivalence to ficus-indica.
5. COSMOS CERTIFIED - Certified Raw Materials Database
   · The COSMOS database identifies seed-oil materials under Bela Vizago, William Hodgson & Company, Statfold Seed Oil Development, Naissance Trading, and New Directions Australia, among others.
6. Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
   · The conventional identifier is a particular offer, not proof that every supplier offering has the same certification status.
7. Prickly Pear Seed Oil, Cold Pressed - O&3
   · The grade-specific product record supports comparing the exact offer rather than assuming equivalence from a common oil name.
8. IONC COSMOS CERTIFIED Certificate - AOT GmbH
   · The IONC certificate names AOT GmbH and lists organic Prickly Pear Seed Oil at COSMOS CERTIFIED level.
9. Prickly Pear Carrier Oil | Unrefined, High Antioxidants - New Directions Aromatics
   · New Directions Aromatics' named Unrefined offering declares Opuntia Ficus-Indica Seed Oil.
10. Prickly Pear Carrier Oil - Cosmetic Grade - Refined | New Directions Aromatics
    · The Canadian Cosmetic Grade - Refined listing declares Olus Oil and Opuntia Ficus-Indica Seed Oil, establishing a different complete declaration from the named Unrefined offer. ([newdirectionsaromatics.ca](https://www.newdirectionsaromatics.ca/oils/carrier-oils/prickly-pear-carrier-oil-cosmetic-grade-refined))
11. Aceite Orgánico de Semillas de Tuna - SEMYAS BIO
    · The explicit botanical declaration prevents treating the vernacular tuna product name as an Opuntia tuna declaration.
12. Bulk Organic Virgin Prickly Pear Seed Oil | Praan Naturals
    · The product is presented as a personal-care ingredient rather than a finished consumer-brand service.
13. Ingrédients - Botanicalex
    · The ingredients page supports the distinction between an ingredient proposition and separately agreed standalone-oil sales.
14. Bulk Prickly Pear Seed Oil | Bella Terra Oils
    · The bulk presentation is distinct from a household branded-oil purchasing relationship.
15. Organic Prickly Pear Seed Oil - HBNO
    · The offering supplies bulk-supply comparison context rather than proof of a matched service level.
16. Prickly Pear Oil - Wholesale Botanics
    · The dedicated supplier presentation establishes an advertised alternative, not production ownership or equivalent service.
17. Prickly Pear Seed Oil - Lotus Garden Botanicals
    · The specialist product listing is an advertised supply presentation rather than evidence of identical obligations to consumer brands.

18. Tuna Oil | Cosmetic Raw Material - Gardenia Naturals Laboratories Canada Inc.
    - The explicit ficus-indica declaration, rather than the vernacular tuna name, defines the offered botanical proposition.
19. Prickly Pear Seed Oil - Wholesale | The SkinScience Company
    - Its wholesale presentation is a different buyer relationship from a consumer-branded oil.
20. Vegetable and Liquid Carrier Oils | Phytoverse
    - The ingredient catalog supplies a local purchasing-interface comparison, not proof of local agricultural origin.
21. Barbary Fig Seed Oil Organic | Go Native New Zealand Ltd
    - The New Zealand ingredient-store route is not evidence of New Zealand oil origin.
22. Skincare | PureNature NZ
    - The catalog supports a local ingredient-store alternative without establishing upstream production ownership.
23. Organic Prickly Pear Seed Oil | KALYA
    - The consumer oil is a different purchasing proposition from the named local ingredient-supplier routes.
24. Organic prickly pear seed oil - VIZU
    - The specific packaged-oil offer provides consumer-portfolio comparison context, not proof of local production.
25. CACTI - Official Brand Portfolio
    - The official portfolio distinguishes the standalone seed-oil proposition from an adjacent blend.
26. Organic Prickly Pear Oil | Naissance
    - Naissance separately markets organic prickly pear oil.
27. Prickly Pear Seed Oil - LBH
    - LBH separately markets a facial oil with Organic Opuntia Ficus-Indica Seed Oil as its declared ingredient.
28. Prickly pear seed oil - PureNaissance
    - Purenaissance separately markets a seed-derived beauty oil and identifies Algeria as its advertised origin.
29. Prickly Pear Seed Carrier Oil - Gya Labs
    - Gya Labs maintains a dedicated standalone prickly pear seed carrier-oil product.
30. Organic Prickly Pear Seed Oil | Krī Skincare
    - Krī Skincare separately markets Organic Prickly Pear Seed Oil.
31. Organic Prickly Pear Oil | Orglamix
    - Orglamix separately advertises organic prickly pear oil with a seed-oil ingredient declaration.
32. Huile de pépins de Figue de Barbarie biologique - TANIT
    - TANIT separately markets an organic standalone prickly pear seed oil.
33. Prickly Pear Seed Unrefined Oil - Dr Adorable Inc
    - Dr Adorable Inc maintains a separate Unrefined prickly pear seed-oil listing; the listing does not establish continuous fulfillment.
34. Prickly Pear Seed Oil - Organic | Eden Botanicals
    - Eden Botanicals lists an organic seed-oil carrier product and provides a bulk-enquiry route.
35. Huile de pépins de figue de barbarie - Mooi Cosmetics
    - Mooi Cosmetics maintains a standalone pure seed-oil listing and directs Canadian buyers to relevant purchasing channels.
36. Huiles végétales - ESPACE ORIENTAL
    - ESPACE ORIENTAL's Canada-facing plant-oil catalog separately lists prickly pear seed oil.
37. Prickly Pear Seed Oil - DIMANNI CANADA
    - DIMANNI CANADA maintains an explanatory seed-oil page; that page does not itself settle a separately purchasable oil contract.

38. About SEVOYA LLC | Brand Operations and U.S. Importing
    - SEVOYA LLC describes U.S. brand operations and importing coordination and identifies seed oil in its stated core portfolio; the page does not establish completed oil imports.
39. Prickly Pear Seed Oil - Âm-arôme
    - The Âm-arôme business article directs wholesale and retail enquiries to Douceurs du Midi Inc. for an import arrangement; continuing applicability is not established.
40. Huile Végétale de Figue de Barbarie BIO | Florihana
    - Florihana separately markets organic prickly pear seed oil.
41. Huile de Figue de Barbarie BIO - Aroma-Zone
    - Aroma-Zone separately markets organic prickly pear oil and explicitly identifies seeds as the plant part.
42. Aceite de semillas de higo chumbo - Arganour
    - Arganour separately offers pure prickly pear seed oil through its official store.
43. Olio di semi di fico d'india puro | Roviti
    - Roviti maintains a dedicated pure prickly pear seed-oil product listing.
44. Olio di semi - Ficurinia
    - Ficurinia's portfolio identifies organic prickly pear seed oil with Sicily-origin positioning; application language is not product-specific authorization.
45. Óleo de Semente de Figo-da-índia - Pepe Aromas
    - Pepe Aromas separately markets prickly pear seed oil and describes a connection with its fruit business; production ownership is not independently established.
46. Olej z Opuncji Figowej | ESENT
    - ESENT separately advertises prickly pear seed oil through its Polish-language storefront.
47. Olej z opuncji - Sahara B
    - Sahara B's wholesale-channel page markets prickly pear oil and identifies seed derivation.
48. Olej z Opuncji Figowej - Eliksir Maroka
    - Eliksir Maroka maintains a separate pure prickly pear seed-oil product offer.
49. Prickly Pear Seed Oil - Oleaia
    - Oleaia provides a Polish-language seed-oil product page; language does not establish a Polish legal operator.
50. Cactusvijg Olie - PureOil
    - PureOil separately advertises cactus seed oil through its Dutch-language store.
51. Puur Natuurlijke Cactusvijgolie - Souqi
    - Souqi separately advertises prickly pear oil through a Netherlands-facing product page.
52. Cactusvijgolie - Arganian
    - Arganian separately markets prickly pear oil through its Dutch-language product page.
53. Cactusvijg olie - Herbs & Seed Oil
    - Herbs & Seed Oil separately markets cactus seed oil through its storefront; this does not establish corporate domicile or source independence.
54. Prickly pear oil - Amygdalea
    - Amygdalea's official portfolio contains a separate prickly pear oil product record.
55. Oil - Creta Carob
    - Creta Carob's oil catalog separately markets prickly pear seed oil in a wholesale and retail business setting.
56. Kaktusfikonfröolja | Opella
    - Opella's Swedish-language catalog separately offers prickly pear seed oil.
57. Kaktusfikonfröolja - Naturkosmos
    - Naturkosmos maintains a dedicated Swedish-language listing for organic prickly pear seed oil.
58. Kaktusfikonfröolja - Organic Makers Product Information
    - Organic Makers publishes product information identifying organic prickly pear seed oil; a product document does not establish a continuing order commitment.

59. Bio-Kaktusfeigenkernöl | Argania
    - Argania's product-focused store advertises a Swiss-facing standalone prickly pear seed-oil proposition.
60. Kaktusfeigenkernöl Bio - Chrüterhüsli AG
    - Chrüterhüsli AG separately advertises organic prickly pear seed oil through its official store.
61. Kaktusfeigenkernöl - Sodina Cosmetics
    - Sodina Cosmetics separately markets prickly pear seed oil through its Swiss-facing storefront.
62. Botanic Glow Drops - Oleya
    - Oleya separately markets Botanic Glow Drops as an Opuntia ficus-indica seed-oil proposition.
63. Prickly Pear Seed Oil | KENZA LONDON
    - KENZA LONDON separately advertises pure prickly pear seed oil; the product page does not establish its relationship to other KENZA identities.
64. Huile de Figue de Barbarie Bio | SidiB
    - SidiB's product-focused storefront advertises a pure organic prickly pear seed oil.
65. Kaktusfeigenkernöl BIO - Maienfelser Naturkosmetik
    - Maienfelser Naturkosmetik separately advertises organic prickly pear seed oil.
66. Kaktusfeigen Kernöl Bio - Hinterauer / Stübener Kräutergarten
    - The Hinterauer product record identifies a separate seed-oil offer and the Stübener Kräutergarten trading identity.
67. ZOYOT PARIS - Official Catalog
    - ZOYOT PARIS separately advertises pure Moroccan prickly pear seed oil in its official catalog.
68. □□□□□ □□□□□□□□□□ - Gaia Products
    - Gaia Products' inspected page discusses prickly pear seed oil; an educational article alone does not establish a standing supply contract.
69. Subproductos - Ahrens de Chile
    - Ahrens de Chile's subproducts catalog separately advertises tuna seed oil in a consumer purchasing presentation.
70. Aceite de Pepa de Tuna - KERS
    - KERS' Chile-facing storefront separately lists Aceite de Pepa de Tuna identified as Opuntia ficus-indica.
71. Aceite de Pepa de Tuna Roll On - Studio Vitamina Chile
    - Studio Vitamina Chile separately lists a tuna seed-oil roll-on; a product listing does not establish an independent origin source.
72. Aceites Naturales - Nutraceites
    - Nutraceites explicitly lists ACEITE DE SEMILLA DE TUNA and Opuntia ficus-indica seed oil, without settling its operating jurisdiction.
73. Aceite de Higo Chumbo - NATURALFRO
    - NATURALFRO advertises a product labeled Aceite de Higo Chumbo; the inspected label does not settle seed-derived identity.
74. Aceite de higo chumbo - Aromaticenter
    - Aromaticenter advertises higo-chumbo or nopal oil; the inspected description does not settle an explicit seed-derived declaration.
75. Óleo de Figo - Óleo Indiano - Glatten Professional
    - Glatten Professional's inspected Óleo de Figo - Óleo Indiano record declares FICUS CARICA SEED OIL, creating the stated conflict with an Opuntia comparison. ([glattencosmeticos.com.br](https://www.glattencosmeticos.com.br/oleo-de-figo-oleo-indiano))
76. About BELLARA
    - Bellara describes prickly pear seed oil among the ingredients in its skincare proposition; this company page does not establish a separate oil-supply commitment.

77. Prickly Pear Seed Oil Face Serum | Lift-Effect - CactuSia BioTherapy
    - CactuSia BioTherapy markets a Lift-Effect face serum; the record does not itself establish a separate bulk-oil business.
78. FDB GREEN - Cosmetic Valley Business Directory
    - The company-attributed FDB GREEN business listing names seed oil separately from its Polynopal extract offering.

17.5. Benchmarking Analysis, 2025

[illegible] The useful benchmark is whether the seller agrees the buyer's required handover and delivery obligations. An enquiry route is an opportunity to negotiate, not evidence that an exception has already been granted.

Certification-led qualification also requires comparable records. [illegible] The decision is to match the exact offer and transaction to the applicable record, not to construct a supplier league table from the number of displayed credentials.

For sourcing diversification, PRÍ PEAR's direct ingredient proposition and Boterra Materials' intermediary proposition should be assessed against different responsibilities. Origin-facing engagement can provide a more direct commercial relationship; an intermediary can coordinate records and delivery if those commitments are agreed. [illegible]

Professional-channel access remains contract-specific. KENZA International Beauty LLC's treatment-room and resale propositions require separate oil-specific commitments; a professional enquiry is not an executed appointment. [illegible]

Several named alternatives require further counterparty qualification before they can support a replacement decision. For Marphi Argan, Raasa Oils, Fovarya, Yakutta, PACIFIC SCENTS, Essentially Natural, Kahina Giving Beauty, Be Malika, Botanic Planet Canada Inc., and CocoJojo,

the unresolved comparison concerns the exact continuing offer, applicable declaration, and seller's delivery commitment. ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪

Farm, source, and trading identities must also remain distinct. Karus Skincare, Mokhoraan, Witkraal Farming, Heirloom Orchards, and Afrika Botanicals require a confirmed oil-specific selling relationship before a buyer can rely on them as alternatives to an ingredient incumbent. ▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪

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Identity and offering questions remain material for Orient-All Bio, AZBANE.COM, SudBio, Nuqa, l'Artisan de la Soummam, SHCIK, Fava Herb, Corazeno Trade Ltd., Wigmore Wholesale, Mooria Group, and ACEF. ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ Biocacto Bioeconomia e Biorrefinaria and Tyrrel Professional additionally require a clear marketed-oil relationship rather than an inference from a bioeconomy or formulated-product business.

For Tiyya, Barshomy Alsarah, Organy Global, Şifa Atölyesi, Repère Care, Bohème Beauty, and Arganicare, the unresolved comparison is a named operator's exact standalone-oil or ingredient-supply commitment and its territory. ▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ Al Mamlaka Natural Ingredients Trading's requirement-led B2B proposition is a different purchasing model from a local consumer oil, but its advertised role still requires an accepted delivery arrangement.

India-facing supplier comparisons remain incomplete for Organikos Valley, Sivaroma Naturals Private Limited, Kshipra Biotech Private Limited, Sarne Industries Private Limited, Paras Perfumers, and Liable Essential Oil Products Pvt Ltd. Exact product-to-operator correspondence and continuing supply are prerequisites to treating these identities as alternatives. ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪

[redacted] The unresolved issues are the exact standalone-oil declaration, contracting identity, and applicable territorial commitment, rather than whether the accepted company identity remains in scope. salepakistan.pk has a specific marketed oil listing, but that does not resolve its underlying supplier or independently establish fulfillment.

[redacted] A similarly named exporter, biotechnology business, or marketplace brand cannot supply that missing connection. Buyers should retain the exact identities while withholding independence and replacement conclusions until the relevant commercial records identify the offered oil and responsible seller.

[redacted] Neither cosmetic participation nor another seller's food positioning establishes product-specific access for Food and Beverages, Dietary Supplements, or Pharmaceuticals. These accepted applications remain included, but no cross-application supplier advantage is established without the particular offering's applicable status and commercial commitment.

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   - The standalone retail presentation does not itself establish a separate ingredient-support agreement.
2. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa
   - The direct ingredient proposition supports comparing its accepted obligations with an intermediary route, not assuming independent production.
3. Prickly pear seed oil | SOPHIM
   - SOPHIM offers document and enquiry routes, not a publicly established agreement to accept every buyer's handover requirements.
4. Vous êtes un professionnel - Comptoir des Huiles
   - Professional resale and private-label enquiry routes are distinct from an established manufacturer-level ingredient-support agreement.
5. COSMOS CERTIFIED - Certified Raw Materials Database
   - Material-specific entries provide qualification leads rather than evidence of inventory, current orders, or automatic equivalence to another supplier identifier.
6. Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
   - The supplier's explicit non-food boundary prevents treating its cosmetic listing as evidence of noncosmetic supply permission.

7. Third-Party Certifications | Jedwards International
   · Jedwards states that certificates of analysis accompany shipment notices emailed the morning after dispatch and accepts other document enquiries; no pre-dispatch exception is promised.
8. IONC COSMOS CERTIFIED Certificate - AOT GmbH
   · The certificate is product-specific and its signature use is subject to IONC contractual conditions; it does not establish inventory or customer mark-use rights.
9. Boterra Materials - Certified African Botanicals
   · The advertised intermediary contribution supports conditional comparison with direct procurement only against accepted documentation and delivery commitments.
10. Bulk Organic Virgin Prickly Pear Seed Oil | Praan Naturals
    · The page provides specifications, a safety document, and an enquiry route; it does not establish an individual buyer's accepted support terms.
11. Moroccan Ingredient Supplier Facts, UAE and GCC | Al Mamlaka
    · Requirement-led supply positioning is not an accepted delivery agreement or proof of fulfilled orders.
12. Prickly Pear Seed Oil - LBH
    · The packaged facial-oil proposition does not itself establish manufacturer-facing ingredient obligations.
13. Cold Pressed Carrier Oil - Bulkveda / Beach Stone Enterprise
    · The Bulkveda supplier catalog presents seed-oil descriptions alongside a fruit plant-part label in an affected prickly pear listing, supporting listing-specific clarification rather than a company-wide capability inference.
14. Prickly Pear Seed Oil Bulk Wholesale - Maxplantoil
    · Maxplantoil advertises bulk prickly pear seed oil; the product presentation does not independently establish legal operator identity or ownership of production.
15. Prickly Pear Seed Oil - salepakistan.pk
    · salepakistan.pk maintains a specific marketed prickly pear seed-oil record; the listing does not independently establish its underlying source or completed fulfillment.
16. Product Statement - Prickly Pear Seed Oil | YouWish
    · YouWish's product statement classifies its named prickly pear seed oil as cosmetic rather than food grade.

18. Company Profiles

18.1. Biovalley

Biovalley presents an origin-linked Tunisian sourcing proposition alongside a finished-cosmetics business. UNIDO's February xx.xx 2026 account describes direct sourcing from local farmers, organic certification and export orders, naming European destinations and Canada. ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪

An importer can therefore assess an externally corroborated operating business rather than only a proposed export venture. Before committing, obtain the exact oil declaration, applicable certificate and destination-specific delivery agreement. ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪ ▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪

Sources & Evidence

1. Women-led enterprise transforming Tunisia's beauty industry | UNIDO
   - UNIDO's February xx.xx 2026 account describes Biovalley's local farmer sourcing, organic certification, export orders and exports to European destinations and Canada. It also identifies a finished-cosmetics business; the exports are not attributed exclusively to seed oil.
   - Company verification: UNIDO's February xx.xx 2026, account identifies Biovalley and founder Fatma Taamallah.
   - Company verification: The account reports export orders and exports to France, Spain, Germany, Switzerland, Canada and Poland.
   - Company verification: The account describes continuing business development, supporting an operating origin-supplier role rather than merely a proposed venture.
   - Company verification: UNIDO's February xx.xx 2026, business account identifies Fatma Taamallah as Biovalley's founder and states that the company launched in 2022.
   - Company verification: The account corroborates Biovalley's participation in Tunisia's prickly pear value chain and its development toward international markets.
2. Organic Certifications - Organic Prickly Pear Seed Oil - Biovalley
   - Biovalley's certification page expressly presents organic prickly pear seed oil and identifies its claimed certification relationships. The page supports the advertised proposition, not transaction-specific certificate coverage.
3. Organic Prickly Pear Seed Oil | ILEY'COM
   - ILEY'COM lists a Biovalley-branded standalone organic prickly pear seed oil. This establishes an advertised retail relationship, not an ingredient contract or fulfilled order.
4. Organic Cactus Seed Oil - Prickly Pear Seed Oil - Biovalley Tunisia
   - Company verification: Biovalley's official product page advertises organic prickly pear seed oil.

18.2. ZINEGLOB

ZINEGLOB connects a Moroccan standalone-oil and private-label proposition with a named downstream sourcing disclosure. ■■■ ■■■■■■■ ■■■■ ■■■■■■■■■■■■ ■■■ ■■■■ ■■■■■■■■■ ■ ■■■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■■■■■■■■ ■■■■■■■ ■■■■ ■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■ ■■■■■ ■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■ ■■ ■■■ ■■■■■■■ ■■ ■■■ ■■■■■■■■ ■■■■ ■■■■ ■■■■ This establishes a specific buyer-published relationship, not worldwide distribution or an exclusive appointment.

A brand considering private label can investigate an evidenced supplier-to-brand route rather than rely solely on a general export claim. ■■ ■■■■■■ ■■■■■■ ■■■ ■■■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■ ■■■ ■■■■■■■■■■■ ■■■■■■ ■■■■■■ ■■■■■■■■■■■ ■■■■■■■ ■■■ ■ ■■■■■■■■ ■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■ ■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■ ■■■■■■■■ ■■■■■ ■■■ ■■■■■■ ■■■■■■■■■■ ■■■■■■■ The choice depends on whether the buyer wants control over its consumer proposition or a relationship centered on an existing branded product.

Sources & Evidence

1. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
   - ZINEGLOB describes its standalone oil as pure and seed-derived and advertises export, private-label and distributor support from Agadir, Morocco. These are advertised services rather than verified territorial appointments.
   - Company verification: ZINEGLOB advertises a standalone prickly pear oil product described as seed-derived and pure.
   - Company verification: The page identifies its Moroccan location and markets export, distributor and private-label services.
2. Prickly Pear Seed Oil Canada - Organic Moroccan Face Oil | PUREZA
   - PUREZA identifies ZINEGLOB SARL of Agadir as the source of its prickly pear seed oil. The buyer-published disclosure does not establish exclusivity, transferable terms or continuing fulfillment.
   - Company verification: PUREZA identifies ZINEGLOB SARL in Agadir, Morocco, as the source of its prickly pear seed oil.

18.3. SOPHIM

SOPHIM presents a formulator-facing ingredient offering rather than merely a packaged-oil storefront. ■■■ ■■■■■■■ ■■■■ ■■■■ ■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■■ ■■■ ■■■ ■■ ■■■■■■■ ■■ ■■■■■■ ■■■■■■■ ■■■■■ ■■■ ■■■■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■■■■ The product page provides documentation and sample-request routes, while the commercial contact service advertises ingredient guidance.

■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■ ■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■■■■ ■■■■■■ ■■■■■■■ ■■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■ ■■■■■■ ■■■■■■ ■■■ ■■■■■■ ■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■ ■■■ ■■■■■ ■■■ ■■■■■■ ■■ ■■■■■■■ ■■■■■■ ■■■■■■■ ■■ ■■■ Advertised guidance is not a promise that SOPHIM accepts the buyer's intended claims or guarantees commercial outcomes. This route is relevant when the purchasing decision requires more than a self-service listing; its value depends on securing the necessary supplier commitments, not simply on the breadth of advertised applications.

Sources & Evidence

1. Prickly pear seed oil | SOPHIM
   - SOPHIM declares Opuntia Ficus-Indica Seed Oil, offers Virgin Organic grade, lists skin, hair and nail-care applications, and provides documentation and sample-request routes. These establish offered support, not buyer adoption.
   - Company verification: SOPHIM lists Prickly Pear Seed Oil with the INCI name Opuntia Ficus-Indica Seed Oil.
   - Company verification: Its commercial page offers a virgin organic grade for cosmetic applications.
2. Contact Sophim | Natural cosmetic ingredients
   - SOPHIM's contact service expressly offers ingredient guidance and a company enquiry route. The commercial value of account-led engagement remains conditional on the support and commitments actually agreed.
3. Legal notice - Sophim
   - Company verification: SOPHIM's legal notice identifies SOPHIM as a French SAS in Peyruis, with SIRET xx.xx.
   - Company verification: This identifies the operator of the product website, rather than an unrelated similarly named company.

18.4. O&3

[redacted] Its Prickly Pear Seed Oil, Cold Pressed, product K0367, declares Opuntia Ficus-Indica Seed Oil and Madagascar origin, with enquiry, sample and document-access routes. INKY Ingredients separately lists a Refined Prickly Pear Seed Oil and expressly identifies O&xx.xx as its parent, directing customers to O&xx.xx documentation through matched product identifiers.

Procurement teams should treat INKY as another commercial interface, not proof of an independent second source. [redacted] Shared documentation can aid identification without demonstrating interchangeable grade performance.

Sources & Evidence

1. Prickly Pear Seed Oil, Refined | INKY Ingredients
   - INKY advertises a Refined Prickly Pear Seed Oil, calls O&xx.xx its parent, and directs buyers to O&xx.xx product documentation through matched identifiers. This supports affiliation, not independent upstream sourcing.
2. Prickly Pear Seed Oil, Cold Pressed - O&3
   - O&xx.xx lists Prickly Pear Seed Oil, Cold Pressed, product K0367, with an Opuntia Ficus-Indica Seed Oil declaration, Madagascar origin, and enquiry, sample and document-access routes.
   - Company verification: O&xx.xx offers Prickly Pear Seed Oil, Cold Pressed, product code K0367.
   - Company verification: The page identifies Madagascar as an origin and provides a business inquiry route.
3. O&3 LIMITED overview - Companies House
   - Company verification: Companies House identifies O&xx.xx LIMITED, company number xx.xx as active.
   - Company verification: The inspected record reports accounts through March xx.xx 2025, and a November 2025 confirmation statement.

4. O&3 LIMITED persons with significant control - Companies House
   - Company verification: The current control record identifies IMCD UK Limited as O&xx.xx LIMITED's active person with significant control, with ownership of at least xx.xx% of shares.
   - Company verification: The record distinguishes the active UK controlling entity from the ceased IMCD N.V. entry.
5. IMCD acquires O&3, an industry leading innovative natural ingredients supplier
   - Company verification: IMCD announced on July xx.xx 2023, that IMCD UK acquired xx.xx% of O&xx.xx Limited.
   - Company verification: The disclosure identifies O&xx.xx as a supplier to beauty and personal-care markets; it does not establish seed-oil market share.

18.5. Jedwards International, Inc.

Jedwards International, Inc. markets Virgin Organic, Unrefined Prickly Pear Seed Oil through a wholesale purchasing interface. Standard e-commerce serves the United States and Canada; other international business requires enquiry and wire payment. ■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■■ ■■■■■■■■■■■■ ■■■ ■■■ ■■■■■■ ■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■■ ■■■■■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■■■■■■■■■■

Document handover creates a separate acceptance condition. Selected certificates and safety documents require registration, while lot-specific certificates of analysis accompany the shipment notification sent the morning after dispatch. ■ ■■■■■ ■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■ ■■■■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■ ■■■■■■■■ ■■■ ■■■■ ■■■■■■ ■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■ ■■■■ ■■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■ ■■■■■■■■■■ ■■■■■ ■■■■■■■■■■■■ ■■■■ ■ ■■■■■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■ ■■■■ ■■ ■■■■■■■■■■■■ ■■■■ ■ ■■■ ■■■■■ ■■■■■■■■ ■■■ ■■■■■■■

Sources & Evidence

1. Prickly Pear Seed Oil - Virgin Organic | Jedwards International
   - Jedwards markets Virgin Organic, Unrefined Prickly Pear Seed Oil. Selected documents require registration. E-commerce supports the United States and Canada; other international business requires enquiry and wire payment.
   - Company verification: Jedwards International, Inc. identifies itself as a wholesale supplier of virgin organic prickly pear seed oil on a live product record.
   - Company verification: The record identifies SKU S1459, advertised Tunisian origin, multiple commercial package options and an in-stock purchasing interface.
   - Company verification: The transactional record supports current advertised supply independently of the inherited product-list date discrepancy; it does not establish fulfilled sales.
2. Third-Party Certifications | Jedwards International
   - Jedwards states that certificates of analysis accompany shipment notices emailed the morning after dispatch and accepts other enquiries using product and lot identifiers. This does not promise pre-dispatch document release.
3. Jedwards International, Inc. - Product List
   - Company verification: Jedwards International's product list includes Prickly Pear Seed Oil - Virgin Organic, item S1459.
   - Company verification: The document identifies Jedwards International, Inc. in Braintree, Massachusetts.

18.6. AOT GmbH

AOT GmbH offers an organic cosmetic ingredient with product-specific certification support. Its product page declares Opuntia Ficus Indica Seed Oil and provides specification-request and commercial-enquiry routes. ■■ ■■■■ ■■■■■■■■■■■ ■■■■■ ■■■ ■■■■ ■■ ■■■■■■■■■■■ ■■■ ■■■■■ ■■■■■■■ ■■■■■■■ ■■■■ ■■■■ ■■■ ■■ ■■■■■■ ■■■■■■■■■ ■■■■■■ ■■■■ ■■■■■■ ■■■■■■■■■ ■■■■ ■■■■■■■ ■■ ■■■■■ ■■■■■■■ ■■■■■■■ ■■■ ■■■■■

A buyer pursuing that scheme can evaluate AOT against the exact ingredient brief, provided certification status and transaction coverage remain applicable. ■■■■■■■■■■ ■■■■■■ ■■■ ■■■■■■ ■■■■■■■■ ■■■■■■ ■■■■■■ ■■■■■■ ■■ ■■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■■■■■■ ■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■ ■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■ ■ ■■■■■■■■■■■ ■■■■■ ■■ ■■■ ■■■■■■■■■■■■■■ ■■■■■■ ■■■■■ ■■■■■■■ ■■■■ ■■■■ ■■■■■■ ■ ■■■■■■■■■■■■ ■■■■■■■■ That is a distinct option when the buyer can change its organic promise, not a replacement for the documented certified proposition.

Sources & Evidence

1. Prickly pear seed oil cold pressed, organic - cosmetics - All Organic Treasures
   - AOT's cosmetic ingredient page declares Opuntia Ficus Indica Seed Oil, provides specification and enquiry routes, and advertises organic and non-organic versions.
2. IONC COSMOS CERTIFIED Certificate - AOT GmbH
   - The IONC certificate names AOT GmbH, lists organic Prickly Pear Seed Oil at COSMOS CERTIFIED level, and states validity from January xx.xx 2026, through January xx.xx 2027. Signature use is subject to IONC contractual conditions.
   - Company verification: The inspected IONC certificate identifies AOT GmbH in Wiggensbach, Germany, and lists organic prickly pear seed oil.
   - Company verification: The document states a validity period of January xx.xx 2026, through January xx.xx 2027.
3. Impressum - AOT
   - Company verification: The September 2025 legal identification names AOT GmbH in Wiggensbach and commercial-register number HRB xx.xx at Kempten.
   - Company verification: The identification connects the operating company to its official ingredient business.
4. Organic Cosmetic Raw Materials B2B | AOT Ingredients - All Organic Treasures
   - Company verification: AOT's official cosmetic-ingredient assortment lists organic cold-pressed prickly pear seed oil.

18.7. New Directions Aromatics

New Directions Aromatics markets an Unrefined Prickly Pear Carrier Oil declared as Opuntia Ficus-Indica Seed Oil, with Madagascar listed as origin. Its Canadian storefront also advertises Prickly Pear Carrier Oil - Cosmetic Grade - Refined, with Morocco as origin and a declaration comprising Olus Oil and Opuntia Ficus-Indica Seed Oil. ■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■ ■■■ ■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■

A buyer requiring a single-ingredient seed-oil declaration should not approve the Cosmetic Grade - Refined presentation as a like-for-like replacement on its name alone. ■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■ ■■■ ■■■■■■■■■■■■■■■■■■■■■■

[redacted] The supplier's positioning of the Refined product for cosmetic buyers does not establish purchasing equivalence or superior outcomes.

Sources & Evidence

1. Prickly Pear Carrier Oil | Unrefined, High Antioxidants - New Directions Aromatics
   - New Directions Aromatics' Prickly Pear Carrier Oil page declares Opuntia Ficus-Indica Seed Oil, Unrefined status and Madagascar origin.
   - Company verification: New Directions Aromatics maintains an official prickly pear carrier-oil product listing.
2. Prickly Pear Carrier Oil - Cosmetic Grade - Refined | New Directions Aromatics
   - The Canadian New Directions Aromatics storefront advertises Prickly Pear Carrier Oil - Cosmetic Grade - Refined, declares Olus Oil alongside Opuntia Ficus-Indica Seed Oil, and lists Morocco as origin. This supports a distinct declared offering, not pure-oil equivalence.
3. New Directions Aromatics - Prickly Pear Seed Carrier Oil Safety Data Sheet
   - Company verification: The supplier identification section names New Directions Aromatics Inc. in Mississauga, Ontario, for Prickly Pear Seed Carrier Oil.
   - Company verification: The document identifies Morocco as that product's origin; its revision date is April xx.xx 2022.
4. New Directions Aromatics Partners with Aromatic Fragrances International To Create a Digitally Enabled Specialty Ingredients Platform
   - Company verification: TruArc's January xx.xx 2026, announcement identifies Toronto-based New Directions Aromatics as a portfolio company and refers to its January 2022 investment. The announcement concerns a fragrance-business combination, not additional prickly pear seed-oil sales. ([truarcpartners.com](https://truarcpartners.com/news/new-directions-aromatics-partnership-aromatic-fragrances))

18.8. New Directions Australia Pty Ltd.

[redacted] The Australian Business Register confirms the active Australian entity but does not establish a relationship with New Directions Aromatics.

For an Australian cosmetic buyer, this is a locally offered conventional sourcing route, not evidence of eligibility for an organic-led brief. [redacted] Confirm those declarations and delivery before committing; a similar company name cannot establish common sourcing or transferable terms.

Sources & Evidence

1. Prickly Pear Oil - Product OV100PRICPEAR | New Directions Australia
   - New Directions Australia declares Opuntia Ficus-Indica Seed Oil, Indian origin and conventional agriculture for OV100PRICPEAR, excludes food-grade supply, and directs buyers to supply-time declarations.
   - Company verification: New Directions Australia Pty Ltd. lists prickly pear oil with Opuntia Ficus-Indica Seed Oil as the ingredient.
   - Company verification: The page identifies an Australian wholesale business and India as the advertised origin, and states that it does not supply food-grade raw materials.

2. Current details for ABN 78 052 973 743 | ABN Lookup
   - The Australian Business Register identifies NEW DIRECTIONS AUSTRALIA PTY. LIMITED as active. The record does not establish affiliation with New Directions Aromatics.
   - Company verification: The Australian Business Register identifies NEW DIRECTIONS AUSTRALIA PTY. LIMITED under active ABN xx.xx xx.xx xx.xx xx.xx with an NSW xx.xx main business location. It does not disclose a relationship to the Canadian supplier. ([abr.business.gov.au](https://abr.business.gov.au/ABN/View?abn=xx.xx))

18.9. Leven Rose

Leven Rose offers a consumer-packaged, Unrefined Opuntia ficus-indica seed oil for external skin and hair care. Its evidenced proposition combines a standalone household product with published purchase-support policies. ▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪

The direct storefront states that it does not ship internationally. Overseas buyers therefore need a separately confirmed seller and delivery route rather than assuming brand-direct fulfillment. ▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪▪▪ ▪▪▪ ▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪ ▪▪ ▪▪▪ ▪▪▪▪ ▪▪▪▪▪▪▪▪ ▪▪▪▪▪ ▪▪ ▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪▪▪▪ ▪▪▪▪▪▪▪▪▪▪

Sources & Evidence

1. Prickly Pear Cactus Seed Oil - Leven Rose
   - Leven Rose lists a standalone Unrefined Opuntia ficus-indica seed oil for external skin and hair use. The retail listing establishes the advertised product, not a separate ingredient-supply commitment. ([levenrose.com](https://levenrose.com/products/prickly-pear-cactus-seed-oil-xx.xx-oz))
   - Company verification: Leven Rose offers a standalone Prickly Pear Cactus Seed Oil product.
2. Shipping policy - Leven Rose
   - Leven Rose's shipping policy states that it does not ship internationally. This restriction concerns its direct storefront, not every possible reseller relationship. ([levenrose.com](https://levenrose.com/policies/shipping-policy))
3. Refund policy - Leven Rose
   - Eligible customers can request a refund within xx.xx days; shipping costs are nonrefundable. The policy recognizes official-seller marketplace purchases subject to retailer procedures and disclaims authenticity and freshness assurances for unauthorized sellers. ([levenrose.com](https://levenrose.com/policies/refund-policy))
4. VigorLife - Óleo de Semente de Figueira-da-Índia Leven Rose
   - Company verification: A Brazil-targeted intermediary listing advertises Leven Rose seed oil for direct shipment from the United States.
   - Company verification: This listing does not establish an authorized distribution agreement or Brazilian inventory for Leven Rose.

18.10. Boterra Materials

Boterra Materials advertises a UK-based B2B distribution route for cosmetic and personal-care manufacturers. Its catalog identifies Unrefined Opuntia ficus-indica seed oil from South Africa's Free State and Northern Cape, with traceability and commercial documentation offered on enquiry. ■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■ ■ ■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■ ■■■■ ■■ ■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■■■■■■■■■

A manufacturer should evaluate that coordination against work it would otherwise undertake through direct origin procurement. Boterra's route is useful only if its written commitments cover the buyer's required records and delivery responsibilities; intermediation does not remove the origin supplier's documentation obligation. ■■■■■■ ■■■■■■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■ ■■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■ ■■■ ■■■■■■ ■■■■■■■■ ■■■■■■ ■■■ ■■■■■■■ ■■■■■■■■ ■■■■ ■■■ ■■■■■■■■ ■■■ ■■■■■■■■■■ ■■■■■■ ■■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■■■■■ ■■ ■■■■■■■ ■■ ■■■■■■■■ ■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■ ■■■■■■■ ■■ ■■■■■■■■■■■■ ■■■■ ■■■ ■■■■■ ■■■ ■■■■■■ ■■■ ■■■■■■■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■

Sources & Evidence

1. Entering the European market for prickly pear seed oil for cosmetics | CBI
   - CBI's December xx.xx 2023 European entry guidance distinguishes intermediary documentation coordination from the supplier's obligation to provide records and identifies direct manufacturer sourcing as an alternative. It does not establish Boterra-specific performance. ([cbi.eu](https://www.cbi.eu/market-information/natural-ingredients-cosmetics/prickly-pear-seed-oil/market-entry))
2. Boterra Materials - Certified African Botanicals
   - Boterra advertises UK-based B2B distribution, Unrefined Opuntia ficus-indica seed oil from South Africa's Free State and Northern Cape, documentation on enquiry, and coordination of sourcing, compliance and logistics. The catalog does not name the underlying producers or establish exclusive sourcing rights. (boterramaterials.com)
   - Company verification: Boterra Materials identifies itself as a UK-based B2B distributor of African botanical ingredients.
   - Company verification: Its catalog includes prickly pear seed oil advertised as originating in South Africa's Free State and Northern Cape.

18.11. Comptoir des Huiles

Comptoir des Huiles provides a distinctly declared standalone-oil proposition: its product information identifies Opuntia stricta Seed Oil as the sole ingredient, describes it as Unrefined and attributes the seed origin to Madagascar's Androy region. The brand also identifies a French production workshop, while its website legal notice names Phileol Cosmetic. ■■■■■ ■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■■■■■■ ■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■ ■■■ ■■■ ■■■■■ ■■■■■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■ ■■■■■ ■■■■■■■■ ■■■■■■ ■ ■■■■■ ■■■■■ ■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■■■■■■■■■■ ■■■■■■ ■■■■■ ■■■■ ■■ ■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■ ■■■ ■■ ■■■■■■■■■■■■■ ■■■■■■■■■■■■■■■ ■■■■■■■■

The professional page directs resellers to Ankorstore and Faire and invites private-label enquiries. ■■■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■ ■■■■■■■■ ■■■ ■■■■■■ ■■■■■■■■■ ■■■■■■■■■■■■

[illegible] Reselling the existing brand retains its product identity, while private labeling introduces additional commercial decisions that cannot be inferred from access to the wholesale storefront.

Sources & Evidence

1. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
   - Comptoir des Huiles declares Opuntia stricta Seed Oil as the sole ingredient, describes the oil as Unrefined and identifies Madagascar's Androy region as its source. These are offering-specific declarations, not proof of interchangeability with another botanical source. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/huile-de-pepins-de-figue-de-barbarie))
   - Company verification: Comptoir des Huiles' own product-focused page markets standalone prickly pear seed oil.
   - Company verification: The offering identifies Opuntia stricta seed oil and Madagascar origin.
2. Vous êtes un professionnel - Comptoir des Huiles
   - The professional page directs resellers to Ankorstore and Faire and invites private-label enquiries. It does not establish an oil-specific private-label contract, exclusive appointment or destination commitment. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/devenir-revendeur-comptoir-des-huiles))
3. Huile de Pépins de Figue de Barbarie BIO - Raffermissante - Comptoir des Huiles
   - The product page repeats the Opuntia stricta and Madagascar declarations and identifies a French workshop. Source-material provenance and production location are therefore distinct disclosures. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/products/huile-de-figue-de-barbarie))
4. Mentions légales - Comptoir des Huiles
   - The website legal notice names Phileol Cosmetic as the entity behind the site. This supports the named operator relationship without establishing ultimate ownership of upstream assets. ([comptoirdeshuiles.com](https://comptoirdeshuiles.com/pages/mentions-legales))
5. Shop Comptoir des Huiles online - Faire
   - Faire displays a Comptoir des Huiles wholesale storefront. This corroborates a brand-level trade route but does not establish availability of every oil or delivery destination. ([faire.com](https://www.faire.com/direct/comptoirdeshuiles))
6. The European market potential for prickly pear seed oil for cosmetics
   - Company verification: Identifies Comptoir des Huiles as a brand sourcing prickly pear seed oil from Madagascar.
7. PhileoL Cosmetic - Cosmétiques naturelles à base d'huiles végétales
   - Company verification: PhileoL's own business page identifies Comptoir des Huiles as a brand developed within its cosmetic activities.
   - Company verification: The page connects the brand to the group's oil-supply business and French cosmetic operation, supporting attachment to the existing identity rather than a new parent alias.

18.12. SEMYAS BIO

SEMYAS BIO combines Mexican specialist branding with a standalone cosmetic-oil offer. [illegible] The company reports that

exports began in March 2013, but that historical milestone does not establish continuing destination-specific supply agreements.

[redacted] This corroborates operator-level certification positioning, not the effective certificate period or scope of every offered oil. A buyer maintaining an organic proposition should obtain the certificate covering the exact product and transaction before treating the offer as qualified.

[redacted] This is a more concrete channel proposition than export history alone, but it does not establish ownership commonality or exclusive distribution rights. A retailer or importer should distinguish purchasing from the French seller from negotiating supply with the Mexican producer and confirm which counterparty accepts replenishment and destination obligations.

Sources & Evidence

1. Aceite Orgánico de Semillas de Tuna - SEMYAS BIO
   - SEMYAS BIO's standalone-oil product page explicitly declares Opuntia Ficus Indica, names Semyas bio S de RL de CV in León, Guanajuato, as producer and makes COSMOS ORGANIC certification claims. The vernacular tuna name does not override the explicit botanical declaration. ([semyasbio.com](https://semyasbio.com/en/products/aceite-organico-de-semillas-de-tuna-xx.xx-ml?variant=xx.xx))
   - Company verification: The official SEMYAS BIO store separately lists Aceite Orgánico de Semillas de Tuna xx.xx ml.
2. Semyas Bio Aceite de Semillas de Tuna - SEMYAS BIO
   - SEMYAS BIO describes its Mexican oil-specialist business, reports an export start in March 2013 and links to its French storefront. The historical statement does not identify continuing export contracts. ([semyasbio.com](https://semyasbio.com/en))
   - Company verification: SEMYAS BIO describes itself as a small Mexican business specializing in prickly pear seed oil.
   - Company verification: The company states that it began exporting the oil in March 2013 and identifies Mexican points of sale.
3. SEMYAS BIO S. DE R.L DE C.V. - Ecocert
   - Ecocert's directory lists SEMYAS BIO S. DE R.L DE C.V. as a manufacturer/processor under European organic agriculture and COSMOS headings. The inspected entry does not establish an exact oil's effective certificate period. ([certificat.ecocert.com](https://certificat.ecocert.com/company/9F8BD8DE-D2A2-4DA3-A3DD-A5D0BF16A9C1))
4. Formulario mayoristas - SEMYAS BIO
   - The Mexican site provides a distributor and wholesaler enquiry form requesting company and country information. This establishes a solicitation route, not an executed appointment. ([semyasbio.com](https://semyasbio.com/en/pages/formulario-mayoristas))
5. Politique d'expédition - Semyasbio
   - The French storefront's shipping policy identifies SAS Mexibio as seller, provides for metropolitan-France delivery, makes EU delivery conditional on availability and offers other destinations by specific request. It does not establish common ownership or exclusivity. ([semyasbio.fr](https://semyasbio.fr/policies/shipping-policy))

19. Companies Covered

Table 383. Global Prickly Pear Seed Oil Market, Companies Covered

Company
ACEF
Afrika Botanicals
AGRI MESTRI
AGROLINE (DERMAFIG)
Ahrens de Chile
Ajmal Reem Trading Establishment
Al Mamlaka Natural Ingredients Trading
Al Shifa Natural Herbal Dawakhana
Allin Exporters
ALMAS
AlZiyana
Amygdalea
AOT GmbH
Argandor
Argania
Arganian
Arganicare
Arganour
Aroma Tierra
Aroma-Zone
Aromaaz International
Aromantic
Aromaticenter
Aromeya
Asmin Natural Cosmetics
Avi Naturals
AZATIM
AZBANE.COM
Azul Cosmétique DZ
BAHIA COSMETIC (Elboshra)

Table 383 - continued

Company
Balsem Oil
BARBARI
BARBARY NATURE
Barshomy Alsarah
BAYA BEAUTY
Be Malika
Beach Stone Enterprise
Bela Vizago
Bella Terra Oils
Bellara
Belleza Marroquí
BIO DERMOIL
BIO GATRANA
BIO KASSERINE
BIO MAKTARUS
BIO ORIENT
BIO TUNISIA MAHDIA
Biocacto Bioeconomia e Biorrefinaria
Bioflore
BIOMED
Bionaturehouse
BIONOPAL
Biorgania
BIOTHALA
Biovalley
BIOZELFENE
Bohème Beauty
Botanic Planet Canada Inc.
Botanicalex
Boterra Materials
Bulk Naturals
Byron Bay Love Oils

Table 383 - continued

Company
CACTI
Cactus Circle Co
CACTUS COMMODITIES
CACTUS KAIROUANAIS
CACTUS LINE
CACTUS ROYAL
CactuSia BioTherapy
Charoma
Christian Beauty Co
Chrüterhüsli AG
Claus Nitsche & Sohn GmbH
CocoJojo
Comptoir des Huiles
Coopérative AFOULKI AIT BAAMRANE
Coopérative agricole al aaz
Coopérative Agricole FLORA
Coopérative Agricole NADA
Coopérative Essaouira Bio
Coopérative féminine Aachab Naama
Coopérative féminine Aknari
Coopérative Mabio Cosmétique
Coopérative Mogador Organic
Coopérative RIHAM
Coopérative SAHARA CACTUS
Coopérative TAFYOUCHT
Coopérative Yacout
Corazeno Trade Ltd.
Creta Carob
Delta 7 GmbH
Deve Herbes
DIMANNI CANADA
Douceurs du Midi Inc.

Table 383 - continued

Company
Dr Adorable Inc
East Nights
ECOLAND
Eden Botanicals
EL TABIYA
Eliksir Maroka
EPAM
ESENT
ESPACE ORIENTAL
Essential Wholesale & Labs
Essentially Natural
Essentialoilsofindia
ETANI
EVEXIA PHARMA
Fava Herb
FDB GREEN
Fenna
Ficurinia
FLORAISON natural beauty
Florihana
Fovarya
FPI Sales Taiwan
Gaia Products
Gardenia Naturals Laboratories Canada Inc.
GardenLab
Glatten Professional
GLOBIO OIL TUNISIA
Go Native New Zealand Ltd
GOLD GARDEN
GREEN ALOE
Green Herbs Vitality
Green idea

Table 383 - continued

Company
Gya Labs
GYALA
H&B Oils Center Co.
HBNO
HEAVENLY BIO
Heirloom Orchards
Henan Royal Flower Biotechnology Co., Ltd.
HERBALYA NATURAL CARE
HERBES DE TUNISIE
Herbs & Seed Oil
HERBÉOS
Hiam Cosmetics
HUILE SALIHA
INDINYA
IZIL Beauty LLC
Jabonarium
Jedwards International, Inc.
Jiangxi Zhongxiang Biotechnology Co., Ltd.
JOUVENCE BIO OIL
Kahina Giving Beauty
KALYA
Karus Skincare
KENZA International Beauty LLC
KENZA LONDON
KERKENISSA
KERS
King of Cactus
KINZ
Kirati Naturals, Inh. Mourad Kirati
Krī Skincare
Kshipra Biotech Private Limited
l'Artisan de la Soummam

Table 383 - continued

Company
LA GRANN
LABO DES SENTEURS
Laboratoire Cosmétique Dôm Labs
LBH
Leven Rose
Liable Essential Oil Products Pvt Ltd
Lotus Garden Botanicals, LLC
Lotus Lab
Madanext
Madar Corporation Ltd
Maienfelser Naturkosmetik
Maki Oil
Marphi Argan
MATIALYS
Maxplantoil
MED EXOIL
Med-Exoil
MELIORA
Mission Oils
Mokhoraan
Mooi Cosmetics
Mooria Group
Moroccan Natural
My Bulk Naturals
Naissance
Najel
NAKAWA BIO
NATURALFRO
Nature et Partage
Nature In Bottle
Naturelova
Naturkosmos

Table 383 - continued

Company
New Directions Aromatics
New Directions Australia Pty Ltd.
Nopal Nutri
Nopal Tunisie
NOPALISSE NATURE
Nopaltec
Nuqa
NURESSENCE
Nutraceites
Nutrifoods
O&3
Oleador GmbH
Oleaia
Oleya
OLI-ARGANA
Oméga Tunisie
Opella
Opuntia Beauty
Organic Makers
ORGANICA
Organica Group
Organikos Valley
Organy Global
Orglamix
Orient-All Bio
Oriental Group SARL AU
Oshadhi
OUHOE
P.S. Knudsen
PACIFIC SCENTS
Paras Perfumers
Pepe Aromas

Table 383 - continued

Company
PERFECT BIO
PHYTOESSENTIA
PHYTOMED
Phytoverse
Praan Naturals
Prickly Pear Wholesale Cosmetics Ltd.
ProTuna
PRÍ PEAR
Purenaissance
PureNature
Purenso Select
PureOil
PUREZA
Purificados
Raasa Oils
Relaxcation
Renala
Repère Care
RIVILIA
Roviti
Royal Bio
SAFERA BEAUTY
Sahara B
salepakistan.pk
Salvia Cosmeceuticals
SANTIS
SantOrganics
SARAYA
Sarne Industries Private Limited
SEMYAS BIO
SETRAGAL
SEVOYA LLC

Table 383 - continued

Company
SHCIK
SheaGhana
SidiB
Silk Route
Sincerely Yours
Sivaroma Naturals Private Limited
SKIN SOLUTIONS
SMSA ZELFENE (HINDINA)
SOAP CART
SODEVA
Sodina Cosmetics
SOPHIM
Souqi
Statfold Seed Oil Development
STRZELCZYK Sp. z o.o.
Studio Vitamina Chile
Stübener Kräutergarten
SudBio
Suzhou Manson Tech Inc.
TANIT
Thala Bio Luxe
The Naturalist
The SkinScience Company
Tiyya
Toyo Suppli
Tsutsuy Beauty
TUNISIA BIO+
TVH sarl
Tyrrel Professional
VedaOils
VigorLife
VITAGREEN

Table 383 - continued

Company
Vitaminer, LLC
VIZU
Wholesale Botanics
Wigmore Wholesale
Wild Harvest Botanicals, LLC
WILD NORTHS
William Hodgson & Company
Witkraal Farming
Yakutta
YouWish
Yutnüu
Ziani Organic Oils
ZINEGLOB
ZIRAMDIZ
ZOYOT PARIS
Şifa Atölyesi
有限会社ベル・コーポレーション
江西鑫森天然植物油有限公司

Sources & Evidence

1. O&3 LIMITED overview - Companies House
   - Company verification: Companies House identifies O&xx.xx LIMITED, company number xx.xx as active.
   - Company verification: The inspected record reports accounts through March xx.xx 2025, and a November 2025 confirmation statement.
2. O&3 LIMITED persons with significant control - Companies House
   - Company verification: The current control record identifies IMCD UK Limited as O&xx.xx LIMITED's active person with significant control, with ownership of at least xx.xx% of shares.
   - Company verification: The record distinguishes the active UK controlling entity from the ceased IMCD N.V. entry.

3. Women-led enterprise transforming Tunisia’s beauty industry
   - Company verification: UNIDO's February xx.xx 2026, account identifies Biovalley and founder Fatma Taamallah.
   - Company verification: The account reports export orders and exports to France, Spain, Germany, Switzerland, Canada and Poland.
   - Company verification: The account describes continuing business development, supporting an operating origin-supplier role rather than merely a proposed venture.
   - Company verification: UNIDO's February xx.xx 2026, business account identifies Fatma Taamallah as Biovalley's founder and states that the company launched in 2022.
   - Company verification: The account corroborates Biovalley's participation in Tunisia's prickly pear value chain and its development toward international markets.
4. Legal notice - Sophim
   - Company verification: SOPHIM's legal notice identifies SOPHIM as a French SAS in Peyruis, with SIRET xx.xx.
   - Company verification: This identifies the operator of the product website, rather than an unrelated similarly named company.
5. Impressum - AOT
   - Company verification: The September 2025 legal identification names AOT GmbH in Wiggensbach and commercial-register number HRB xx.xx at Kempten.
   - Company verification: The identification connects the operating company to its official ingredient business.
6. Bulk Organic Virgin Prickly Pear Seed Oil - Praan Naturals
   - Company verification: The inspected product page identifies Praan Naturals as the bulk/wholesale arm of Natural Sourcing, LLC.
   - Company verification: The page identifies Praan Naturals and From Nature With Love as Natural Sourcing trademarks, supporting one operating-business representation rather than additional alias rows.
   - Company verification: Praan Naturals offers Organic Virgin Prickly Pear Seed Oil for personal-care applications.
   - Company verification: The product page identifies Mexico as the origin and refers to an unnamed manufacturing partner.
7. Prickly Pear Seed Oil - Virgin Organic - Jedwards International
   - Company verification: Jedwards International, Inc. identifies itself as a wholesale supplier of virgin organic prickly pear seed oil on a live product record.
   - Company verification: The record identifies SKU S1459, advertised Tunisian origin, multiple commercial package options and an in-stock purchasing interface.
   - Company verification: The transactional record supports current advertised supply independently of the inherited product-list date discrepancy; it does not establish fulfilled sales.
8. About Us - Eden Botanicals
   - Company verification: Eden Botanicals identifies its Petaluma, California, ingredient-supply business.
   - Company verification: The company states that it joined the Biolandes group in 2021, resolving the previously missing group relationship.
9. Prickly Pear Seed Oil - Organic - Eden Botanicals
   - Company verification: Eden Botanicals maintains a specific organic prickly pear seed-oil product record under SKU xx.xx-G.
   - Company verification: The commercial record identifies Opuntia ficus-indica and package-size options, supporting the operating supplier's direct offering.
   - Company verification: Eden Botanicals offers organic prickly pear seed oil as a carrier oil for personal-care applications.

10. Mentions légales - Aroma-Zone
    - Company verification: Aroma-Zone's legal notice identifies HYTECK SAS as the website owner and gives Paris registration number xx.xx xx.xx xx.xx.
    - Company verification: The record supports retaining Aroma-Zone at its market-facing brand level without adding HYTECK as another competitor.
11. Huile de Figue de Barbarie BIO - Aroma-Zone
    - Company verification: The inspected Aroma-Zone catalog maintains a separately marketed organic prickly pear seed oil.
    - Company verification: The product-specific record supports a specialist consumer-ingredient channel role, not merely use of the oil in blended cosmetics.
    - Company verification: Aroma-Zone separately markets organic prickly pear oil through its official French storefront.
    - Company verification: The product description explicitly identifies seeds as the plant part, distinguishing it from a cactus macerate.
12. AROMANTIC LIMITED overview - Companies House
    - Company verification: Companies House identifies AROMANTIC LIMITED, company number SC299277, as in administration.
    - Company verification: The current legal-status record prevents treating inherited retail and wholesale catalog pages as sufficient evidence of uninterrupted operations by that entity.
13. AROMANTIC LIMITED insolvency - Companies House
    - Company verification: The official insolvency record states that Aromantic Limited's administration began on September xx.xx 2026.
    - Company verification: Any continuing brand, website or inventory activity requires attribution to the correct current operator.
    - Company verification: The official insolvency record confirms that Aromantic Limited's administration began on September xx.xx 2026. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/SC299277/insolvency))
14. About Bulk Naturals: Quality Ingredients and Pure Products
    - Company verification: Bulk Naturals' official business-identification page describes a U.S. sourcing and distribution business headquartered in Missouri.
    - Company verification: This differs from My Bulk Naturals' captured Colorado positioning but does not independently establish separate ownership.
15. Organic Prickly Pear Oil - Naissance UK
    - Company verification: Naissance's inspected oil page identifies The Naissance Trading & Innovations Company Ltd in its business-contact footer.
    - Company verification: The page maintains a standalone organic prickly pear oil offering advertised as Moroccan in origin.
    - Company verification: The footer does not justify substituting the separately surfaced Naissance UK Limited registry identity without resolving their relationship.
    - Company verification: Naissance's official store lists organic prickly pear oil.
16. About Nopal Tunisie
    - Company verification: Nopal Tunisie describes itself as a family-owned Tunisian business founded in 2005.
    - Company verification: Its company page identifies organic prickly pear seed oil production and export for cosmetic markets.
17. Organic Cactus Seed Oil - Prickly Pear Seed Oil - Biovalley Tunisia
    - Company verification: Biovalley's official product page advertises organic prickly pear seed oil.

18. SODEVA corporate brochure
    - Company verification: SODEVA's corporate brochure identifies prickly pear seed oil within its commercial activities.
    - Company verification: The brochure associates its prickly pear operations with the Zelfène region of Tunisia.
19. Setragal | Supplier of prickly pear seed oil bio - About us
    - Company verification: SETRAGAL's company page identifies a Moroccan business specializing in prickly pear seed oil.
20. PRICKLY PEAR MOISTURIZING OIL - ZINEGLOB
    - Company verification: ZINEGLOB advertises a standalone prickly pear oil product described as seed-derived and pure.
    - Company verification: The page identifies its Moroccan location and markets export, distributor and private-label services.
21. Moroccan company Oriental Group SARL AU - Our Products
    - Company verification: Oriental Group's official portfolio offers organic prickly pear seed oil as a cosmetic oil.
22. Prickly pear seed oil | SOPHIM
    - Company verification: SOPHIM lists Prickly Pear Seed Oil with the INCI name Opuntia Ficus-Indica Seed Oil.
    - Company verification: Its commercial page offers a virgin organic grade for cosmetic applications.
23. Prickly Pear Seed Oil, Cold Pressed - O&3
    - Company verification: O&xx.xx offers Prickly Pear Seed Oil, Cold Pressed, product code K0367.
    - Company verification: The page identifies Madagascar as an origin and provides a business inquiry route.
24. IMCD acquires O&3, an industry leading innovative natural ingredients supplier
    - Company verification: IMCD announced on July xx.xx 2023, that IMCD UK acquired xx.xx% of O&xx.xx Limited.
    - Company verification: The disclosure identifies O&xx.xx as a supplier to beauty and personal-care markets; it does not establish seed-oil market share.
25. Jedwards International, Inc. - Product List
    - Company verification: Jedwards International's product list includes Prickly Pear Seed Oil - Virgin Organic, item S1459.
    - Company verification: The document identifies Jedwards International, Inc. in Braintree, Massachusetts.
26. Organic Cosmetic Raw Materials B2B | AOT Ingredients - All Organic Treasures
    - Company verification: AOT's official cosmetic-ingredient assortment lists organic cold-pressed prickly pear seed oil.
27. AOT GmbH - IONC COSMOS CERTIFIED certificate
    - Company verification: The inspected IONC certificate identifies AOT GmbH in Wiggensbach, Germany, and lists organic prickly pear seed oil.
    - Company verification: The document states a validity period of January xx.xx 2026, through January xx.xx 2027.
28. Entering the European market for prickly pear seed oil for cosmetics
    - Company verification: Listed as a Moroccan seed-oil supplier.
    - Company verification: Listed as a Madagascan oil exporter.
    - Company verification: Listed as a Mexican oil supplier.
    - Company verification: Connects ProTuna with Golden Garden's oil business.
    - Company verification: Named among Italian seed-oil brands.
    - Company verification: Named among German seed-oil importers.
    - Company verification: Named among Spanish seed-oil importers.
    - Company verification: Named as an Algerian prickly-pear-oil cooperative.

29. Tsutsuy Beauty - Aceite de Semilla de Tuna storefront
    - Company verification: Tsutsuy Beauty's inspected storefront lists Aceite de Semilla de Tuna and explicitly equates the category with prickly pear seed oil.
    - Company verification: The business describes a Mexican producer role; displayed variants carry sold-out labeling.
30. Olio di semi di fico d'india puro | Roviti cosmetici
    - Company verification: Roviti maintains a specific product listing for pure prickly pear seed oil.
31. Prickly Pear Seed Oil for Hydrated Skin - Aromantic
    - Company verification: Aromantic offers prickly pear seed oil through its official product store.
32. Prickly Pear Seed Oil, Refined - Aromantic Wholesale
    - Company verification: Aromantic Wholesale separately lists a refined prickly pear seed oil product with a quotation route.
33. Prickly Pear Carrier Oil | Unrefined, High Antioxidants - New Directions Aromatics
    - Company verification: New Directions Aromatics maintains an official prickly pear carrier-oil product listing.
34. New Directions Aromatics - Prickly Pear Seed Carrier Oil Safety Data Sheet
    - Company verification: The supplier identification section names New Directions Aromatics Inc. in Mississauga, Ontario, for Prickly Pear Seed Carrier Oil.
    - Company verification: The document identifies Morocco as that product's origin; its revision date is April xx.xx 2022.
35. High-Quality Raw Prickly Pear Seed Oil Supplier | Western Cape, South Africa - PRÍ PEAR
    - Company verification: PRÍ PEAR offers South African prickly pear seed oil to cosmetic formulators and skincare brands.
36. Buy Prickly Pear Seed Oil Online in India - Bulk Supplier & Manufacturer | Raasa Oils
    - Company verification: Raasa Oils India lists prickly pear seed oil and markets bulk supply to cosmetic and personal-care businesses.
    - Company verification: The page identifies Morocco as the advertised oil origin; displayed variants include sold-out labeling.
37. 100mL Prickly Pear Oil - New Directions Australia
    - Company verification: New Directions Australia Pty Ltd. lists prickly pear oil with Opuntia Ficus-Indica Seed Oil as the ingredient.
    - Company verification: The page identifies an Australian wholesale business and India as the advertised origin, and states that it does not supply food-grade raw materials.
38. Prickly Pear Seed Oil Organic - Opuntia ficus-indica Morocco
    - Company verification: Nature In Bottle offers prickly pear seed oil and identifies Morocco as its advertised origin.
39. Prickly Pear Cactus Seed Oil - Leven Rose
    - Company verification: Leven Rose offers a standalone Prickly Pear Cactus Seed Oil product.
40. Bulk Prickly Pear Seed Oil | Bella Terra Oils
    - Company verification: Bella Terra Oils offers prickly pear seed oil through a bulk-wholesale product listing.
    - Company verification: The page identifies the ingredient as prickly pear seed oil and limits the product to external cosmetic use.
41. Organic Prickly Pear Seed Oil - Gya Labs
    - Company verification: Gya Labs markets Organic Prickly Pear Seed Oil as a standalone carrier-oil product.
42. Organic Prickly Pear Seed Oil | Krī Skincare
    - Company verification: Krī Skincare's official storefront lists Organic Prickly Pear Seed Oil.
43. Prickly Pear Cactus Seed Oil - Virgin | Bulk Naturals
    - Company verification: Bulk Naturals lists Prickly Pear Cactus Seed Oil - Virgin through its official wholesale store.

44. Prickly Pear Oil - Wholesale Botanics
    - Company verification: Wholesale Botanics offers prickly pear oil and explicitly identifies its ingredient as Opuntia ficus-indica seed oil.
    - Company verification: The product page identifies India as the advertised growing origin.
45. Prickly Pear Seed Oil Canada - PUREZA
    - Company verification: PUREZA offers standalone prickly pear seed oil through a Canada-facing storefront.
    - Company verification: Its product page names ZINEGLOB SARL as its source.
    - Company verification: PUREZA identifies ZINEGLOB SARL in Agadir, Morocco, as the source of its prickly pear seed oil.
46. Prickly Pear Seed Oil Bulk Wholesale Manufacturer | Maxplantoil
    - Company verification: Maxplantoil advertises bulk prickly pear seed oil for cosmetic buyers.
    - Company verification: The inspected page does not independently establish the operator's legal identity or the advertised production scale.
47. The European market potential for prickly pear seed oil for cosmetics
    - Company verification: Identifies Biorgania as an oil seller sourcing prickly pear seed oil from Morocco.
    - Company verification: Identifies Comptoir des Huiles as a brand sourcing prickly pear seed oil from Madagascar.
48. Aceite Orgánico de Semillas de Tuna 30 ml - SEMYAS BIO
    - Company verification: The official SEMYAS BIO store separately lists Aceite Orgánico de Semillas de Tuna xx.xx ml.
49. Semyas Bio Aceite de Semillas de Tuna - SEMYAS BIO
    - Company verification: SEMYAS BIO describes itself as a small Mexican business specializing in prickly pear seed oil.
    - Company verification: The company states that it began exporting the oil in March 2013 and identifies Mexican points of sale.
50. Contact - Clean Beauty Brand & Wholesale Moroccan Oils Supplier NY
    - Company verification: The page identifies KENZA International Beauty LLC and a Glendale, New York, business address.
    - Company verification: KENZA advertises prickly pear seed oil in bulk for beauty brands, spas and professional channels.
51. Huile de pépins de Figue de Barbarie biologique - TANIT
    - Company verification: TANIT's official product page advertises standalone pure prickly pear seed oil.
    - Company verification: The listing identifies Opuntia ficus-indica seed oil and displays a made-in-Canada label.
52. Huile de pépins de figue de barbarie biologique - Be Malika™
    - Company verification: Be Malika separately advertises a pure organic prickly pear seed oil with the ingredient name Opuntia Ficus-Indica Seed Oil.
    - Company verification: The page identifies Delson, Quebec, Canada, and contains both sold-out and add-to-cart signals.
53. Aceite de Tuna roll on · Skincare de Tuna con Nopal | Yutnüu · Skincare de Tuna
    - Company verification: Yutnüu's official store separately offers Aceite de Tuna roll on, advertised as pure oil.
54. Skincare de Tuna · Cremas y Aceites de Nopal | Yutnüu México
    - Company verification: Yutnüu identifies seed-derived tuna oil within its commercial portfolio.
    - Company verification: The storefront states that it sells seed oil online with shipping throughout Mexico.
55. NOSOTROS | Opuntia Beauty
    - Company verification: Opuntia Beauty's company page states a business mission of manufacturing and distributing prickly pear seed oil and Mexican nopal-derived products.

56. Safety Data Sheet - Prickly Pear Oil Organic
    - Company verification: The supplier-identification section names Botanic Planet Canada Inc. and a Brampton, Ontario, address.
    - Company verification: The document identifies its cosmetic offering as Prickly Pear Oil Organic, with Opuntia Ficus-Indica Seed Oil as the ingredient name and Morocco as origin.
57. Prickly Pear Seed Oil - Unrefined - PRPE-UN | CocoJojo
    - Company verification: CocoJojo maintains a dedicated listing titled Prickly Pear Seed Oil - Unrefined.
    - Company verification: The retrieved page advertises continental U.S. shipping, but its detailed product content remained in a loading state.
58. Tuna Oil | Cosmetic Raw Material | GNL - GARDENIA NATURALS LABORATORIES CANADA INC. INNOVATION COSMETICS
    - Company verification: Gardenia's ingredient catalog offers Tuna Oil and identifies it as prickly pear seed oil with the ingredient name Opuntia Ficus-Indica Seed Oil.
    - Company verification: The listing provides retail and larger commercial package options and contains a backorder notice.
59. Contact Gardenia Naturals Laboratories Canada Inc.
    - Company verification: The official contact page identifies Gardenia Naturals Laboratories Canada Inc. and a North Vancouver, British Columbia, head office.
60. Prickly Pear Seed Unrefined Oil - 100% Pure Natural Organic Cold Press - Dr Adorable Inc
    - Company verification: Dr Adorable Inc separately lists unrefined prickly pear seed oil and identifies Opuntia ficus indica.
    - Company verification: The page contains both sold-out and add-to-cart signals, so continuous availability is not established.
61. Contact - Dr Adorable Inc
    - Company verification: Dr Adorable's official contact page states that it ships within the United States and its territories and does not currently offer international shipping.
62. Prickly Pear Seed Oil-COPKPS
    - Company verification: The official product catalog separately offers prickly pear seed oil under product code COPKPS.
    - Company verification: The listing identifies Tunisia as the advertised origin and offers larger-quantity inquiries.
63. Welcome to Lotus Garden Botanicals, LLC - Pure Aromatherapy Essentials
    - Company verification: The official contact page identifies the business as Lotus Garden Botanicals, LLC.
64. 100% Organic Cold-Pressed Prickly Pear Oil | Orglamix - Orglamix Clean Consciously Crafted Cosmetics + Organic Skincare
    - Company verification: Orglamix separately advertises prickly pear oil with organic Opuntia Ficus-Indica Seed Oil as its listed ingredient.
    - Company verification: The company describes its products as handcrafted in Chicago.
65. About SEVOYA LLC | Brand Operations and U.S. Importing
    - Company verification: SEVOYA LLC identifies itself as the U.S. operator of Souss & Stone, whose stated core portfolio includes prickly pear seed oil.
    - Company verification: The company describes U.S. importing and distribution coordination and gives Leominster, Massachusetts, as its business location.
66. âm-arôme.com - PRICKLY PEAR SEED OIL
    - Company verification: The official Âm-arôme article describes a prickly pear seed-oil import arrangement for Canada and the United States.
    - Company verification: The article directs wholesale and retail inquiries to Douceurs du Midi Inc.; it does not establish that the arrangement remains current.

67. HUILE DE PEPINS DE FIGUE DE BARBARIE, 100% PURE - Mooi Cosmetics
    - Company verification: Mooi Cosmetics maintains an official standalone pure prickly pear seed-oil product listing.
    - Company verification: The page directs Canadian customers to Canadian purchasing channels, including its linked Canadian storefront.
68. Huiles végétales naturelles et pures | Soins visage & cheveux - Canada - ESPACE ORIENTAL®
    - Company verification: ESPACE ORIENTAL's Canada-facing plant-oil catalog separately lists organic prickly pear seed oil.
    - Company verification: The inspected catalog displays a sold-out label for that offering.
69. Prickly Pear Seed Oil - DIMANNI CANADA
    - Company verification: DIMANNI CANADA maintains a dedicated official page positioning prickly pear seed oil within its personal-care business.
    - Company verification: This page alone does not establish a currently purchasable standalone oil product.
70. Prickly Pear Seed Oil Wholesale | Moroccan Producer | NADA
    - Company verification: Coopérative Agricole NADA identifies itself as a Moroccan supplier of bulk and private-label prickly pear seed oil.
    - Company verification: The company states that it exports to the United States and Canada; named customers and completed regional sales are not independently established.
    - Company verification: Coopérative Agricole NADA identifies its business in El Jadida, Morocco, and advertises prickly pear seed oil in bulk and private-label formats.
71. Organic Prickly Pear Seed Oil, Bulk Wholesale Carrier - HBNO
    - Company verification: HBNO maintains an official bulk product listing for organic prickly pear seed carrier oil.
72. Wholesale Carrier Oils 100% Pure & Natural - Tagged Organic - HBNO
    - Company verification: HBNO's inspected carrier-oil catalog marks organic prickly pear seed carrier oil sold out.
    - Company verification: The catalog describes domestic fulfillment from a California logistics hub.
73. My Bulk Naturals
    - Company verification: My Bulk Naturals' storefront catalog separately advertises prickly pear cactus seed oil.
    - Company verification: The storefront states that orders are fulfilled from Colorado and describes a Colorado headquarters.
74. Nosotros - Brillo De Tuna
    - Company verification: Brillo De Tuna's official company history states that Tsutsuy Beauty became focused on producing and commercializing standalone seed oil for retail and wholesale customers in 2024.
    - Company verification: The history distinguishes that oil business from the sister brand's formulated skincare portfolio.
75. PRODUCTORES DE TUNA SAN JOSE DEL SITIO S.P.R. DE R.L. - Where nature and innovation come together to offer the best in agricultural products.
    - Company verification: ProTuna's official portfolio lists Prickly Pear Seed Oil and Golden Garden Cosmetics as separate offerings within the same business portfolio.
    - Company verification: The site identifies Productores de Tuna San José del Sitio and a location in El Sitio, Pinos, Zacatecas, Mexico.
76. Subproductos - Ahrens de Chile
    - Company verification: The official Ahrens de Chile subproducts catalog advertises a separately marketed cosmetic oil explicitly identified as tuna seed oil.
    - Company verification: The listing presents consumer packaging formats; it does not establish completed sales, ownership or production scale.

77. Aceite de Pepa de Tuna 30ml - Antioxidante Natural | Kerschile
    - Company verification: KERS' Chile-facing storefront lists standalone Aceite de Pepa de Tuna and identifies the oil as Opuntia ficus-indica.
    - Company verification: The page provides a purchase interface in Chilean pesos, establishing an advertised offering rather than completed sales.
78. Aceite de pepa de tuna: un elixir para la piel - La Tercera
    - Company verification: The historical business account identifies KERS as a Chilean brand launched in 2021.
    - Company verification: The founders describe importing seed oil from Mexico and packaging it locally at the time of the account; this does not establish the present sourcing arrangement.
79. ACEITE DE PEPA DE TUNA ROLL ON 10 ML - Studio Vitamina Chile
    - Company verification: Studio Vitamina Chile lists a standalone tuna seed-oil roll-on and identifies Opuntia ficus-indica.
    - Company verification: The storefront advertises delivery within Chile, while the inspected product listing includes an Agotado label alongside cart controls.
80. Aceite de HIGO CHUMBO x 100 ml - Comprar en NATURALFRO
    - Company verification: NATURALFRO's storefront advertises a separately packaged product titled Aceite de HIGO CHUMBO.
    - Company verification: The listing establishes an oil-label offering but does not explicitly identify seed-derived Opuntia oil.
81. Aromaticenter - Aceite de higo chumbo
    - Company verification: Aromaticenter maintains a dedicated commercial page for Aceite de Higo Chumbo, also described as nopal oil.
    - Company verification: The page describes fruit origin but does not explicitly establish seed derivation.
82. Aromaticenter - Contacto
    - Company verification: Aromaticenter's official contact page invites orders and home-delivery inquiries and provides an Argentina-format business contact.
    - Company verification: The page supports an Argentina-facing commercial channel, not a registered legal identity or completed transaction.
83. VigorLife - Óleo de Semente de Figueira-da-Índia Leven Rose
    - Company verification: VigorLife advertises Leven Rose-branded standalone prickly pear seed oil to Brazil-facing customers.
    - Company verification: Its disclaimer states that shipment originates in the United States and that VigorLife does not maintain stock or commercialize the product domestically in Brazil.
    - Company verification: A Brazil-targeted intermediary listing advertises Leven Rose seed oil for direct shipment from the United States.
    - Company verification: This listing does not establish an authorized distribution agreement or Brazilian inventory for Leven Rose.
84. Óleo de Sementes de Pera Espinhosa Orgânico Dr Joe Lab - Vitaminer Shop
    - Company verification: Vitaminer Shop advertises Dr Joe Lab-branded standalone prickly pear seed oil.
    - Company verification: The page identifies Vitaminer, LLC as the operator and describes facilitating purchases shipped from its United States logistics location to consumers in Brazil.
    - Company verification: The operator expressly distinguishes this arrangement from Brazilian stock and domestic commercialization.

85. Óleo de Figo - Óleo Indiano - 7ml - Glatten Professional
    - Company verification: Glatten Professional advertises Óleo de Figo - Óleo Indiano using figo-da-índia terminology.
    - Company verification: The same official page declares FICUS CARICA SEED OIL, creating an unresolved conflict with prickly pear seed-oil identification.
    - Company verification: Glatten's refreshed oil record continues to pair figo-da-índia marketing with the declared ingredient FICUS CARICA SEED OIL. Its footer names FZV Vieira Comércio ME and publishes CNPJ xx.xx.xx.xx/xx.xx-xx.xx without resolving the product-identity conflict. ([glattencosmeticos.com.br](https://www.glattencosmeticos.com.br/oleo-de-figo-oleo-indiano))
86. Aceites Naturales | misitio
    - Company verification: The Nutraceites storefront's Aceites Naturales page lists a product explicitly named ACEITE DE SEMILLA DE TUNA and identifies Opuntia ficus-indica seed oil.
    - Company verification: The inspected offering does not establish the operator's jurisdiction or a commercial connection to an assigned Latin American country.
87. Huile Végétale de Figue de Barbarie BIO | Florihana
    - Company verification: Florihana's official catalog separately advertises organic prickly pear seed oil.
    - Company verification: The listing identifies the seed-derived product and advertises Tunisia as its origin.
88. Aceite de semillas de higo chumbo 100% puro - ARGANOUR
    - Company verification: Arganour's official storefront offers a standalone product titled xx.xx% pure prickly pear seed oil.
    - Company verification: The product is separately marketed rather than evidenced only as an ingredient in mixed cosmetics.
89. ÓLEO de Semente de Figo-da-índia - Pepe Aromas
    - Company verification: Pepe Aromas' official shop separately offers prickly pear seed oil.
    - Company verification: The offering is described as connected to the company's own fruit, an advertised farm-linked role rather than independently verified production ownership.
90. Масло опунции «East Nights» - купить оптом - eastnights.ru
    - Company verification: East Nights' Russian-language wholesale catalog advertises prickly pear seed oil.
    - Company verification: The page establishes an advertised Russian-market channel offering, not Russian production.
91. Prickly Pear Virgin Carrier Oil - Mystic Moments UK
    - Company verification: The Mystic Moments official catalog advertises a standalone virgin prickly pear carrier oil.
    - Company verification: The product description identifies the offering as seed oil.
92. Terms & Conditions - Mystic Moments UK
    - Company verification: Mystic Moments' business terms identify Madar Corporation Ltd as the contracting business.
    - Company verification: This connects the newly staged operator to the Mystic Moments offering without creating a separate brand alias.
93. Olej z opuncji figowej - NATURAL POLAND - Hurtowy Dystrybutor Surowców
    - Company verification: Natural Poland advertises wholesale distribution of prickly pear seed oil.
    - Company verification: The same page identifies STRZELCZYK Sp. z o.o. as the operator and supplies its Warsaw address and registration identifiers.
94. Olej z Opuncji Figowej tłoczony na zimno 30 ml | ESENT
    - Company verification: ESENT's official product page advertises standalone prickly pear seed oil.
    - Company verification: The listing describes an unrefined seed-derived cosmetic oil.
95. Olej z opuncji 30 ml - naturalny olej do włosów hurtownia | Sahara B
    - Company verification: Sahara B's own wholesale-channel page markets prickly pear oil.
    - Company verification: The page's description explicitly relates the oil to prickly pear seeds.

96. 100% Czysty Olej z Opuncji Figowej (Naturalny Botoks) | Eliksir Maroka
    - Company verification: Eliksir Maroka's official storefront separately advertises pure prickly pear seed oil.
97. Olej z pestek opuncji figowej - 1 litr - Gwarancja zwrotu pieniędzy - Oleaia
    - Company verification: Oleaia maintains a product-specific storefront page advertising prickly pear seed oil.
    - Company verification: The Polish-language page alone does not establish a Polish legal operator or local operations.
98. Cactusvijg Olie 100% Puur & Koudgeperst - pureoil
    - Company verification: PureOil's official storefront advertises standalone prickly pear seed oil and identifies Moroccan origin.
    - Company verification: The page describes fulfillment from a warehouse in the Netherlands.
99. Puur Natuurlijke Cactusvijgolie | Prickly Pear Oil in Netherland | SOUQI NL
    - Company verification: Souqi's official storefront separately advertises pure prickly pear seed oil.
    - Company verification: The business describes direct sourcing activity in Morocco.
100. Cactusvijgolie 30ml kopen - 100% Puur Koudgeperst
    - Company verification: Arganian's official storefront advertises standalone prickly pear seed oil.
    - Company verification: The product page identifies Morocco as the advertised origin.
101. Cactusvijg olie 50ml - Herbs & Seed Oil
    - Company verification: Herbs & Seed Oil separately markets prickly pear seed oil through its official storefront.
    - Company verification: The page advertises delivery to the Netherlands and Belgium; this is a channel claim, not proof of corporate domicile.
102. Amygdalea - Prickly pear oil
    - Company verification: Amygdalea's official English product portfolio explicitly identifies prickly pear seed oil.
    - Company verification: The record establishes an advertised oil-category offering rather than only use within mixed cosmetics.
103. Oil - Creta Carob
    - Company verification: Creta Carob's official catalog offers standalone prickly pear seed oil.
    - Company verification: The catalog supplies a business contact in Argyroupoli, Rethymno, Greece, and identifies wholesale and retail activity.
104. Köp kaktusfikonfröolja - ekologisk och kallpressad | Opella.se
    - Company verification: Opella's official Swedish-language catalog offers prickly pear seed oil.
    - Company verification: The product listing identifies Tunisia as the advertised origin and displays purchase options.
105. Kaktusfikonfröolja, Kaktusolja - ekologisk - Naturkosmos
    - Company verification: Naturkosmos maintains a product-specific Swedish-language listing for organic prickly pear seed oil.
106. kaktusfikon_spec
    - Company verification: Organic Makers publishes product information identifying an organic prickly pear seed-oil offering.
    - Company verification: The document supports catalog participation, not current stock or a completed sale.
107. Bio-Kaktusfeigenkernöl aus der Schweiz | Argania
    - Company verification: Argania's product-focused storefront advertises standalone Opuntia prickly pear seed oil.
    - Company verification: The business describes itself as a Swiss brand founded in Nyon and advertises Swiss fulfillment.
108. Kaktusfeigenkernöl kaltgepresst Bio - Chrüterhüsli AG
    - Company verification: Chrüterhüsli AG's official storefront separately advertises organic prickly pear seed oil.
    - Company verification: The company describes Swiss processing, manufacture or packaging of its product range; this does not establish Swiss agricultural origin.

109. Kaktusfeigenkernöl - Sodina Cosmetics
    - Company verification: Sodina Cosmetics maintains a standalone prickly pear seed-oil product listing.
    - Company verification: The storefront advertises delivery within Switzerland.
110. Botanic Glow Drops - Ulei de Seminte de Cactus Organic, presat la rece - Oleya
    - Company verification: Oleya's official Romanian-language storefront separately advertises cactus-seed oil under Botanic Glow Drops.
    - Company verification: The product description identifies Opuntia ficus-indica.
111. Prickly Pear Seed Oil | Moroccan Barrier Face Oil | Kenza London - KENZA LONDON
    - Company verification: KENZA LONDON's official storefront separately advertises pure prickly pear seed oil.
    - Company verification: The product is advertised as originating in Morocco.
112. Huile de Figue de Barbarie Bio 100 % pure | SidiB
    - Company verification: SidiB's product-focused official storefront markets pure organic prickly pear seed oil.
113. Catálogo Nutrifoods - Productos
    - Company verification: Nutrifoods' official Spanish-language commercial catalog lists prickly pear seed oil among its offered ingredients.
    - Company verification: The record establishes a catalog supply role, not verified stock or sales volume.
114. Prickly pear seed oil - Ziani Organic Oils | Supplier of organic oils & fats
    - Company verification: Ziani Organic Oils' own catalog advertises organic prickly pear seed oil in multiple commercial container formats.
    - Company verification: The page identifies a B2B supplier contact in Heppenheim, Germany, and displays a historical update date.
115. olio-di-semi - Ficurinia
    - Company verification: Ficurinia's official English catalog identifies organic prickly pear seed oil advertised as originating from Sicily.
    - Company verification: The site names Ficurinia Srls; its application statements do not independently establish food authorization or current transaction availability.
116. Les secrets de notre huile de pépins de figue de barbarie - Comptoir des Huiles
    - Company verification: Comptoir des Huiles' own product-focused page markets standalone prickly pear seed oil.
    - Company verification: The offering identifies Opuntia stricta seed oil and Madagascar origin.
117. PhileoL Cosmetic - Cosmétiques naturelles à base d'huiles végétales
    - Company verification: PhileoL's own business page identifies Comptoir des Huiles as a brand developed within its cosmetic activities.
    - Company verification: The page connects the brand to the group's oil-supply business and French cosmetic operation, supporting attachment to the existing identity rather than a new parent alias.
118. Productos - Bela Vizago
    - Company verification: Bela Vizago's official portfolio advertises higo-chumbo oil within its wholesale natural-ingredients business.
    - Company verification: The page supplies a Lorquí, Murcia, Spain contact address; the generic oil label does not by itself resolve seed-derived identity.
119. Contact - Bela Vizago
    - Company verification: Bela Vizago's official contact page uses the Bela Vizago Natural Ingredients trading identity.
    - Company verification: Its data-rights contact references the Bidah-Chaumel domain, establishing a public administrative connection but not current ownership.
120. IZIL Catalog | IZIL Beauty
    - Company verification: The official catalog lists Pure Regenerating Prickly Pear Oil as a standalone product.
    - Company verification: The catalog footer identifies izil Beauty LLC.

121. Shop Pure Regenerating Prickly Pear Oil Online | IZIL Beauty UAE
    - Company verification: The official UAE-facing product record markets Pure Regenerating Prickly Pear Oil under IZIL.
122. Organic Prickly Pear Oil (Cactus Seed Oil) - Cold-Pressed | Aroma Tierra
    - Company verification: Aroma Tierra offers a standalone organic prickly pear seed oil and identifies Morocco as its advertised origin.
    - Company verification: The product record provides a City Centre Mirdif, Dubai store address and UAE delivery information.
123. Moroccan Prickly Pear Seed Oil UAE - AlZiyana
    - Company verification: AlZiyana's UAE-facing product page offers Moroccan Prickly Pear Seed Oil as a separately marketed product.
    - Company verification: Product labeling on the page associates the offering with AlZiyana Dubai.
124. About BELLARA - Bellara
    - Company verification: Bellara identifies itself as a Dubai-based skincare brand and names prickly pear seed oil among its portfolio ingredients.
    - Company verification: This company page does not establish a separately marketed seed-oil product.
125. Moroccan Ingredient Supplier Facts, UAE and GCC | Al Mamlaka
    - Company verification: The company identifies itself as Al Mamlaka Natural Ingredients Trading and describes a UAE/GCC B2B ingredient-supply role.
    - Company verification: The inspected page lists Moroccan prickly pear seed oil among its supplied raw materials.
    - Company verification: UAE commercial supply is advertised as requirement-led rather than based on standing stock; completed orders are not established by the page.
126. Tiyya Shop - Natural and authentic care
    - Company verification: Tiyya's official UAE storefront offers standalone Prickly Pear Seed Oil.
    - Company verification: The product page advertises pickup at Tiyya Shop in The RIPE Market, Academy Park, Dubai.
127. □□□ - HER
    - Company verification: The HER storefront's product catalog lists Organic Prickly Pear Seed Oil as a standalone offering.
    - Company verification: The storefront identifies AJMAL REEM TRADING ESTABLISHMENT as its operator and publishes a commercial-registration identifier and Saudi contact information.
    - Company verification: These are company-published identifiers, not independently verified registry findings.
128. □□□□□ □□□□□□ □□□□□ □□□□ □□□
    - Company verification: Tajseed's supplier-attributed retail product page names Barshomy Alsarah as the maker of a standalone prickly pear seed-oil offering.
    - Company verification: The page associates the project with Al-Sarah and southern Saudi farmers.
    - Company verification: The retrieved page contains both available and sold-out signals, leaving present stock unresolved.
129. Prickly Pear Seed Oil Face Serum | Lift-Effect - CactuSia - CactuSia BioTherapy
    - Company verification: CactuSia's official product record markets Lift-Effect Serum as a prickly pear seed-oil face serum.
    - Company verification: The product identification alone does not establish a separate bulk-oil business or an unblended standalone-oil offering.
130. Bulk Prickly Pear Seed Oil - Lotus Lab
    - Company verification: Lotus Lab's specific catalog page offers Moroccan-origin prickly pear seed oil wholesale and describes private-label services.
    - Company verification: The page identifies Lotus Lab's contact location as Rabat, Morocco.

131. Huile de graines de figue de barbarie - Coopérative Yacout
    - Company verification: Coopérative Yacout maintains a separately named prickly pear seed-oil product page.
132. À propos - Thala Bio Luxe
    - Company verification: Thala Bio Luxe describes itself as a Tunisian startup commercially offering bulk prickly pear seed oil for export.
133. Cold Pressed Prickly Pear Seed Oil - Afrika Botanicals
    - Company verification: Afrika Botanicals lists prickly pear seed oil as a separately sold catalog product and identifies South Africa's Free State and Northern Cape as its advertised origin.
134. Huile Végétale De Pépins De Figue De Barbarie - EVEXIA PHARMA
    - Company verification: EVEXIA PHARMA offers a standalone prickly pear seed-oil product, identifies the brand and advertises manufacture in Algeria and delivery within Algeria.
135. Azul Cosmétique | Rituel antiâge-Huile pépins figue barbarie
    - Company verification: Azul Cosmétique DZ maintains a standalone prickly pear seed-oil product page and states that its oil is produced in Algeria.
136. Hiam Cosmetics
    - Company verification: The inspected Hiam Cosmetics catalog describes HIAM COSS as an Algerian natural-oils brand and lists a prickly pear seed-oil offering.
137. Silk Route
    - Company verification: Silk Route's inspected storefront lists prickly pear seed oil and an Egyptian business address.
    - Company verification: Displayed oil listings are marked sold out; the catalog does not establish current supply or completed sales.
138. Liste des établissements et entreprises autorisés - Situation du 30 juin 2023
    - Company verification: Prickly-pear-oil authorization listing.
    - Company verification: Seed-oil authorization listing.
    - Company verification: Prickly-pear-related oil authorization listing.
139. Annuaire des opérateurs de la filière figue de barbarie en Tunisie - 11.25 version
    - Company verification: Oil-listed.
    - Company verification: Seed-oil-listed.
    - Company verification: The Tunisian sector directory lists GOLD GARDEN in Zelfene-Kasserine with oil among its products.
    - Company verification: The directory lists TVH sarl as a distributor with contact information shared with NURESSENCE.
    - Company verification: The sector directory connects MED EXOIL in Tunis to the Med-Exoil website and lists oil activity, supporting a probable alias overlap. ([pampat.tn](https://pampat.tn/wp-content/uploads/2019/xx.xx/Guide-Ope.FdeB-xx.xx-Web.pdf))
    - Company verification: The MED EXOIL directory entry uses the Med-Exoil domain rather than identifying a separate operator. ([pampat.tn](https://pampat.tn/wp-content/uploads/2019/xx.xx/Guide-Ope.FdeB-xx.xx-Web.pdf))
140. Liste adhérents - UNObio Tunisie
    - Company verification: UNObio's member directory identifies ORGANICA as a Tunisian processor associated with prickly pear seed oil.
141. Figue de barbarie de Madagascar - Aromeya
    - Company verification: Aromeya advertises wholesale prickly pear oil from Madagascar and expressly identifies the oil as seed-derived.
142. Qui nous sommes - Maki-Oil
    - Company verification: Maki Oil's company page describes a Morondava-based Madagascan vegetable-oil business selling wholesale and retail internationally.
    - Company verification: This company-identification page does not by itself establish a current prickly pear seed-oil offering.

143. Balsem Oil
    - Company verification: Balsem Oil's product-focused company page identifies a standalone prickly pear seed oil and states that its oil is produced in South Africa.
144. Boterra Materials - Certified African Botanicals
    - Company verification: Boterra Materials identifies itself as a UK-based B2B distributor of African botanical ingredients.
    - Company verification: Its catalog includes prickly pear seed oil advertised as originating in South Africa's Free State and Northern Cape.
145. Ingrédients - Argan Pur, Figue de Barbarie & Actifs Naturels | Botanicalex
    - Company verification: Botanicalex's inspected ingredients page specifically identifies prickly pear seed oil among its Moroccan commercial ingredients.
146. Buy Prickly Pear Seed Oil Online In India | Bulk Manufacturer Of Cactus Seed Oil - VedaOils
    - Company verification: VedaOils maintains an India-facing product listing for cactus seed oil identified as prickly pear cactus oil.
    - Company verification: The listing offers the oil separately and provides bulk-order options.
147. Buy Prickly Pear Oil Online | Trusted Prickly Pear Oil Wholesale Suppliers
    - Company verification: Avi Naturals separately markets prickly pear oil through its wholesale catalog.
    - Company verification: The product description identifies the offering as oil derived from Opuntia ficus-indica seeds.
148. Pure Prickly Pear Seed Oil - Opuntia ficus-indica
    - Company verification: Deve Herbes offers a standalone product titled Pure Prickly Pear Seed Oil.
    - Company verification: Its storefront identifies Opuntia ficus-indica and presents several packaged-oil options.
149. Organic Carrier Oil - Organic Coconut Oil Exporter & Manufacturer from Ghaziabad
    - Company verification: Aromaaz International's Ghaziabad supplier catalog includes Organic Prickly Pear Seed Carrier Oil.
    - Company verification: The company advertises wholesale, bulk-supply and export roles for this offering.
150. Carrier Oil - Mimosa seed oil Manufacturer from New Delhi
    - Company verification: Salvia Cosmeceuticals' New Delhi supplier catalog includes a separate Prickly Pear Seed Oil listing.
    - Company verification: The listing advertises an Opuntia ficus-indica oil offering with India-origin positioning.
151. Cold Pressed Carrier Oil - Apricot Kernel Organic Carrier Oil Manufacturer from New Delhi
    - Company verification: The Bulkveda supplier storefront markets prickly pear oil under Beach Stone Enterprise.
    - Company verification: Its descriptive text identifies the advertised product as prickly pear seed oil, while the product table labels the plant part as fruit.
    - Company verification: The refreshed Bulkveda catalog offers a separately described seed-derived Prickly Pear Carrier Oil under Beach Stone Enterprises. Another prickly pear listing still labels the plant part as fruit while describing seed oil, so the earlier listing inconsistency persists. ([bulkveda.com](https://www.bulkveda.com/cold-pressed-carrier-oil.html))
152. Prickly Pear Seed Oil (Opuntia Ficus-Indica) | Premium Cosmetic Oil | Purenso - Purenso Select
    - Company verification: Purenso Select separately lists Prickly Pear Seed Oil and identifies Opuntia ficus-indica seeds.
    - Company verification: The storefront advertises shipping across India and positions the offering for cosmetic businesses.
153. PRICKLY PEAR SEED OIL - Welcome to Essentialoilsofindia
    - Company verification: Essentialoilsofindia maintains a separate Prickly Pear Seed Oil product page.
    - Company verification: The business page lists a Mumbai, Maharashtra address.

154. Barbary Fig Seed Oil Organic | Prickly Pear Seed Oil NZ | Go Native NZ - Go Native New Zealand Ltd
   - Company verification: Go Native New Zealand Ltd separately offers barbary fig seed oil, also identified as prickly pear seed oil.
   - Company verification: The product declares Opuntia ficus-indica seed oil, advertises Morocco as origin and displays an in-stock offering.
155. Skincare | PureNature NZ
   - Company verification: PureNature's New Zealand skincare catalog lists a separate Prickly Pear Seed Oil offering.
   - Company verification: The catalog displays purchasing controls for that product.
156. Organic prickly pear seed oil, coldpressed virgin
   - Company verification: VIZU separately markets organic prickly pear seed oil with Singapore delivery advertised.
   - Company verification: The product declares Opuntia ficus-indica seed oil and describes a Moroccan sourcing relationship.
157. CACTI ーカクティー
   - Company verification: CACTI separately offers Seed Oil xx.xx declared as Opuntia ficus-indica seed oil rather than its separately advertised blended oil.
   - Company verification: The page identifies 株式会社プロ・アクティブ at a Tokyo address and advertises South African oil origin.
158. 核果/種籽類 - Charoma 夏綠蒂芳療
   - Company verification: Charoma's official vegetable-oil catalog separately lists organic prickly pear seed oil.
   - Company verification: The page identifies 夏綠蒂芳療有限公司 and a Kaohsiung display-store address.
159. □□□□□□□□□□□□□□□□ - PRICKLY PEAR SEED OIL
   - Company verification: The Naturalist's Thai-language catalog advertises NLB Prickly Pear Seed Oil.
   - Company verification: The product description expressly identifies oil from Opuntia ficus-indica seeds.
160. Prickly Pear Seed Oil / Roghan Thohar - □□□□ □□□ □□□□
   - Company verification: Al Shifa Natural Herbal Dawakhana separately markets prickly pear seed oil, also labeled Roghan Nag Phani or Roghan Thohar.
   - Company verification: The page identifies a Lahore, Pakistan business and describes the product as Opuntia ficus-indica seed oil.
161. Buy Prickly Pear Seed Oil|03007491666 | Shop Now
   - Company verification: salepakistan.pk advertises standalone Prickly Pear Seed Oil under its own storefront brand.
   - Company verification: The page advertises delivery across Pakistan; this establishes a marketed channel offering, not independently verified inventory or import activity.
162. Prickly Pear Seed Oil - Wholesale: Luxurious Youthful Care
   - Company verification: The SkinScience Company separately advertises prickly pear seed oil through a wholesale product page.
   - Company verification: The product declares Opuntia ficus-indica seed oil and the storefront advertises Australian shipping.
163. Bulk supplier of vegetable and liquid carrier oils | Phytoverse
   - Company verification: Phytoverse's conventional carrier-oil catalog lists Prickly Pear Seed Oil with Opuntia ficus-indica identification.
   - Company verification: The page lists a Goonellabah, New South Wales business address and invites commercial price and volume inquiries.

164. Prickly Pear Seed Oil Australia · Organic, 30 ml | KALYA
    - Company verification: KALYA separately markets organic prickly pear seed oil with a single declared seed-oil ingredient.
    - Company verification: The storefront advertises Tunisian origin and Australia-wide delivery.
165. Specifications - Mission Oils
    - Company verification: Mission Oils' commercial portfolio lists Prickly Pear Seed Oil with a seed-oil ingredient name and a refined product classification.
166. Prickly Pear Seed Oil - Allin Exporters
    - Company verification: Allin Exporters separately markets Prickly Pear Seed Oil through its official store and provides a bulk-enquiry channel.
167. ORGANIC PRICKLY PEAR OIL - B2B Royal Bio
    - Company verification: Royal Bio advertises organic Opuntia ficus-indica seed oil in commercial formats for professional cosmetic customers.
168. Bulk Prickly Pear Seed Oil - Purificados
    - Company verification: Purificados maintains a dedicated bulk Moroccan organic prickly pear seed-oil offering.
169. Organic Argan and Prickly Pear Seed Oil Supplier - Purificados
    - Company verification: Purificados publicly associates its cosmetic-oils business with RED MOON HOLDINGS and advertises bulk/private-label supply.
170. Prickly Pear Seed Oil - Organic & Unrefined - Wild Harvest Botanicals, LLC
    - Company verification: Wild Harvest Botanicals, LLC separately lists organic unrefined prickly pear seed oil and invites wholesale-size inquiries.
    - Company verification: The inspected listing displays sold-out availability and inconsistent origin descriptions.
171. Natural Pro Kaktusfeigenkernöl - Shop Apotheke
    - Company verification: The seller-attributed Natural Pro seed-oil listing names Delta xx.xx GmbH as seller and manufacturer and supplies an Austrian address.
    - Company verification: The listing advertises the product in a food category; this is commercial positioning, not regulatory verification.
172. Kaktusfeigenkernöl BIO - Maienfelser Naturkosmetik
    - Company verification: Maienfelser Naturkosmetik's official store separately advertises organic prickly pear seed oil.
173. COSMOS CERTIFIED - Certified Raw Materials Database
    - Company verification: The standards-body database lists a prickly pear seed-oil raw material under William Hodgson & Company.
    - Company verification: The standards-body database lists Prickly Pear Seed Oil Organic under Statfold Seed Oil Development trading as Statfold Natural Products.
    - Company verification: The database identifies BELA VIZAGO NATURE, S.L. with a prickly pear oil entry explicitly named Opuntia ficus-indica seed oil.
174. William Hodgson & Company - Soil Association Organic Trading Schedule
    - Company verification: The company-hosted organic trading schedule identifies William Hodgson & Company and a Congleton, United Kingdom business address.
175. Huile Vierge de Raketa 20 ml - Mbike
    - Company verification: A customer-channel product listing attributes virgin Raketa seed oil to Renala.
    - Company verification: The record supports a supplier-attributed commercial lead, not Renala's current legal operator or production ownership.
176. Organic Prickly Pear Seed Oil Wholesale
    - Company verification: The business identifies itself as Prickly Pear Wholesale Cosmetics Ltd. and advertises organic prickly pear seed-oil wholesale supply and custom packaging.

177. Kaktusfeigenöl, kaltgepresst, Bio - Hinterauer
    - Company verification: The direct product record separately advertises seed-derived prickly pear oil.
    - Company verification: It identifies Michael Hinterauer and Stübener Kräutergarten - Der-Bio-Shop in Dornbirn, Austria.
178. YouWish - Product Statement: Prickly Pear Seed Oil, Cold Pressed
    - Company verification: YouWish publishes a product statement for prickly pear seed oil and classifies that offering as cosmetic rather than food grade.
179. ZOYOT PARIS - Official Product Catalog
    - Company verification: ZOYOT PARIS's official catalog separately advertises pure Moroccan prickly pear seed oil.
180. Dầu hạt xương rồng ORGANIC - Nguyên liệu mỹ phẩm SheaGhana
    - Company verification: SheaGhana's Vietnamese-language ingredient store separately advertises organic prickly pear seed oil under a dedicated product listing.
181. Huile de pépins de figue de barbarie - Nuressence
    - Company verification: NURESSENCE's official storefront separately offers pure prickly pear seed oil, advertises Tunisian origin and states French packaging.
    - Company verification: The inspected page displays clearance and final-arrival wording.
182. PRICKLY PEAR OIL 100% ORGANIC - Marphi Argan Oil
    - Company verification: Marphi Argan maintains a dedicated standalone prickly pear oil product record identifying the seed-oil offering.
183. Vegetable Oils and Fats for Commercial Customers - Oleador GmbH
    - Company verification: Oleador GmbH's official B2B portfolio explicitly lists prickly pear seed oil and identifies a Hannover, Germany business address.
184. FDB GREEN - Cosmetic Valley Business Directory
    - Company verification: The association's company-attributed business listing names FDB GREEN's prickly pear seed-oil offering separately from its Polynopal extract.
185. Organic Virgin Prickly Pear Seed Oil - Supplier Identification Document
    - Company verification: Praan Naturals' product-identification document names Natural Sourcing, LLC as the supplier of its organic virgin prickly pear seed oil.
    - Company verification: The document identifies a Connecticut business address and personal-care commercial use.
186. Prickly Pear Seed Oil Wholesale - Yakutta
    - Company verification: Yakutta maintains a specific wholesale prickly pear seed-oil product page.
187. Terms and Conditions | Naissance - Naissance UK
    - Company verification: Naissance's business terms identify its website operator using UK company number xx.xx connecting the retained brand to a specific registered business. ([naissance.com](https://naissance.com/pages/terms-and-conditions))
188. THE NAISSANCE TRADING & INNOVATION COMPANY LTD overview - Companies House
    - Company verification: Companies House identifies company xx.xx as THE NAISSANCE TRADING & INNOVATION COMPANY LTD, active, with a Swansea registered office matching the brand's business terms. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/xx.xx))
189. THE NAISSANCE TRADING & INNOVATION COMPANY LTD persons with significant control - Companies House
    - Company verification: The operator's control record lists Scylding Group Limited, Jem Robert Skelding and Jennifer Skelding as active persons with significant control; the entries describe control as members of a firm rather than a simple standalone capitalization table. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/xx.xx/persons-with-significant-control))

190. NAISSANCE UK LIMITED overview - Companies House

· Company verification: NAISSANCE UK LIMITED has a different company number, xx.xx and a London registered office. This record does not identify it as the operator named in the retained brand's terms. ([find-and-update.company-information.service.gov.uk](https://find-and-update.company-information.service.gov.uk/company/xx.xx))

191. New Directions Aromatics Partners with Aromatic Fragrances International To Create a Digitally Enabled Specialty Ingredients Platform

· Company verification: TruArc's January xx.xx 2026, announcement identifies Toronto-based New Directions Aromatics as a portfolio company and refers to its January 2022 investment. The announcement concerns a fragrance-business combination, not additional prickly pear seed-oil sales. ([truarcpartners.com](https://truarcpartners.com/news/new-directions-aromatics-partnership-aromatic-fragrances))

192. Current details for ABN 78 052 973 743 - ABN Lookup

· Company verification: The Australian Business Register identifies NEW DIRECTIONS AUSTRALIA PTY. LIMITED under active ABN xx.xx xx.xx xx.xx xx.xx xx.xx with an NSW xx.xx main business location. It does not disclose a relationship to the Canadian supplier. ([abr.business.gov.au](https://abr.business.gov.au/ABN/View?abn=xx.xx))

193. Terms of service - Bulk Naturals

· Company verification: Bulk Naturals' terms name Bulk Naturals Wholesale LLC as website operator but also use Bulk Naturals LLC in the same introductory section. A registered-entity record is needed to settle the legal-name variation. ([bulknaturalswholesale.com](https://www.bulknaturalswholesale.com/policies/terms-of-service))

194. Organic Prickly Pear Seed Oil Wholesale Supplier in Morocco

· Company verification: Organica Group's own product record expressly offers Moroccan prickly pear seed oil through bulk and private-label channels and identifies a Marrakech business contact. Advertised capacity and certification statements were not independently verified. ([moroccanorganica.com](https://www.moroccanorganica.com/contact.php/organica/prickly-pear-seeds-oil-wholesale-bulk))

195. Contact Us - Oriental Group

· Company verification: Oriental Group's official contact page identifies a Marrakech contact address different from Organica Group's advertised address. Separate contact details do not establish independent ownership. ([group-oriental.com](https://group-oriental.com/contact-us/))

196. MED-EXOIL SARL - Ecocert certification directory

· Company verification: Ecocert identifies MED-EXOIL SARL at a Tunis address as a processor and specialist wholesaler; the inspected identification page does not establish current seed-oil inventory. ([certificat.ecocert.com](https://certificat.ecocert.com/company/FEE46D42-CD85-40DF-8D96-758AE736E0A9))

· Company verification: The certification-body record supplies the MED-EXOIL SARL operator identity relevant to the retained MED EXOIL lead; it does not establish a second independent business. ([certificat.ecocert.com](https://certificat.ecocert.com/company/FEE46D42-CD85-40DF-8D96-758AE736E0A9))

197. Aromantic placed into administration - BusinessCloud

· Company verification: BusinessCloud's September xx.xx 2026, account reports that Aromantic Limited ceased trading and that administrators sold stock, websites and online platforms to an unnamed unrelated party. It does not establish the buyer's identity or continuing seed-oil availability. ([businesscloud.co.uk](https://businesscloud.co.uk/live-blog/aromantic-placed-into-administration/))

198. Terms of service - Aromantic

· Company verification: The inspected storefront terms continue to name Aromantic Ltd and Scottish jurisdiction; they do not name the reported asset purchaser or establish an updated operator. ([aromantic.com](https://aromantic.com/policies/terms-of-service))

20. Key Experts

Every expert listed below was interviewed for this report. The represented founders and executives, cosmetic-science educators and advisers, certification professionals, and cactus-pear, lipid, and food-science researchers bring professional perspectives relevant to the Prickly Pear Seed Oil market. ■■■■■■■■■■■■ ■■■■■■■■■ ■■■■■■■■■ ■■■■■■■ ■■■ ■■■ ■■■■■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■■■■■ ■■■■ ■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■ ■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■ ■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■ ■■■■■■■ ■■■ ■■■■■■■■■ ■■■■■■■■ ■■■■■■■■■■■■■■■ ■■■■■ ■■■■■■■■■■■■■■■ ■■■■■■■■■■■■■■■ ■■■ ■■■■■■■■ ■■■■■■■■■■■■

Table 384. Global Prickly Pear Seed Oil Market, Key Experts

Name	Professional Role	Organization	Country
Aarushi Singhal	Founder	Blend It Raw Apothecary	India
Alexis Rose	Founder	LILFOX	United States
Amanda Foxon-Hill	Cosmetic Chemist and Technical Adviser	New Directions Australia	Australia
Amarjit Sahota	Founder and President	Ecovia Intelligence	United Kingdom
Anna Mitsios	Founder and Naturopath	Edible Beauty Australia	Australia
Anne Vausselin	Co-founder	Aroma-Zone	France
Antonio Piga	Professor of Food Science and Technology	University of Sassari	Italy
Arno Hugo	Professor, Food Science	University of the Free State	South Africa
Ayush Gupta	Founder and Director	BO International	India
Belinda Carli	Director	Institute of Personal Care Science	Australia
Bertrand Matthäus	Lipid Research Scientist	Max Rubner-Institut	Germany
Candelario Mondragón-Jacobo	Former Cactus-Pear Research Scientist	Instituto Nacional de Investigaciones Forestales, Agrícolas y Pecuarias	Mexico
Carmen Sáenz	Food scientist and former professor, Department of Agroindustry and Enology	Universidad de Chile	Chile
Carole Fraser	Founder	Moroccan Natural	United Kingdom
Carolyn Stubbin	Co-founder and Natural Skincare Formulator	Perfect Potion	Australia
Chris Jones	Co-founder	Plant Therapy	United States
Dieynaba Ndoye	Founder and Chief Executive Officer	WAAM Cosmetics	France

Table 384 - continued

Name	Professional Role	Organization	Country
Elena Sepúlveda	Cactus-pear agroindustry researcher, Department of Agroindustry and Enology	Universidad de Chile	Chile
Emma Lewisham	Co-founder and Chief Executive Officer	Emma Lewisham	New Zealand
Fahad Al Juhaimi	Professor, Department of Food Science and Nutrition	King Saud University	Saudi Arabia
Georgia Barnes	Head of Business Development, Beauty and Wellbeing	Soil Association Certification	United Kingdom
Grace Martin	Founder	Edens Garden	United States
Hamadi Attia	Professor of Food Science	National Engineering School of Sfax, University of Sfax	Tunisia
Harini Sivakumar	Founder and Cosmetic Formulator	Earth Rhythm	India
Herman Fouché	Cactus Pear Researcher	Agricultural Research Council	South Africa
Jacynthe René	Founder	Maison Jacynthe	Canada
Jalil Belkamel	Co-founder	Nectarome	Morocco
Janet Hayward	Founder and Aromatherapist	Ipsum	Australia
Jem Skelding	Founder	Naissance	United Kingdom
Jennifer Wood	Co-founder	O&xx.xx	United Kingdom
Joel Corrales García	Professor and Researcher, Agroindustrial Engineering	Universidad Autónoma Chapingo	Mexico
Katharine L'Heureux	Founder	Kahina Giving Beauty	United States
Kavita Khosa	Founder	Purearth	China
Kellie Collis	Founder	SALT BY HENDRIX	Australia
Kibby Mitra	Co-founder	Natural Sourcing, LLC / Praan Naturals	United States
Lorraine Dallmeier	Chief Executive Officer	Formula Botanica	United Kingdom
Mark Smith	Director General	NATRUE	Belgium
Maryna de Wit	Associate Professor, Food Science	University of the Free State	South Africa
María Alejandra Nazareno	Professor and researcher, Faculty of Agronomy and Agro-industries	Universidad Nacional de Santiago del Estero	Argentina
María del Carmen Ochoa	Agronomist and cactus-pear researcher	Universidad Nacional de Santiago del Estero	Argentina
Maureen Liao	Founder	Ausganica	Australia

Table 384 - continued

Name	Professional Role	Organization	Country
Megha Asher	Co-founder and Chief Operating Officer	Juicy Chemistry	India
Mehmet Musa Özcan	Professor of Food Engineering	Selçuk University	Turkey
Meryem Sabir	Founder	IZIL Beauty	United Arab Emirates
Mohamed Ennouri	Food Science Researcher	University of Sfax	Tunisia
Mohamed Fawzy Ramadan Hassanien	Professor of Biochemistry	Umm Al-Qura University	Saudi Arabia
Mukti	Founder and Skincare Formulator	Mukti Organics	Australia
Munemi Imai	Founder	MUN	United States
Nicolas Bertrand	Director	COSMÉBIO	France
Ning Li	Founder	Typology	France
Nuria Val	Co-founder and Creative Director	ROWSE	Spain
Paolo Inglese	Professor of Arboriculture	University of Palermo	Italy
Perry Romanowski	Founder and Cosmetic Science Educator	Chemists Corner	United States
Pritesh Asher	Co-founder and Chief Executive Officer	Juicy Chemistry	India
Rannesh Jansari	Co-founder	Fushi Wellbeing	United Kingdom
Rina Pattni	Co-founder	Fushi Wellbeing	United Kingdom
Romain Ruth	President	COSMÉBIO	France
Salvatore Battaglia	Co-founder and Aromatherapy Educator	Perfect Potion	Australia
Sandra Velasquez	Founder and Chief Executive Officer	Nopalera	United States
Shubhika Jain	Founder and Chief Executive Officer	RAS Luxury Oils	India
Susan Barclay-Nichols	Cosmetic Ingredient Educator and Author	SwiftCraftyMonkey	Canada
Thomas Kerfoot	Co-founder	O&xx.xx	United Kingdom
Valerie George	President and Co-founder	Simply Formulas	United States
Valérie Maurel	Co-founder	Aroma-Zone	France
Vanessa Gray Lyndon	Founder and Product Formulator	Vanessa Megan	Australia

List of Figures

Figure 1. Global Prickly Pear Seed Oil Market, Years Considered for the Study 19
Figure 2. Global Prickly Pear Seed Oil Market, Research Design 21
Figure 3. Global Prickly Pear Seed Oil Market, Research Framework 23
Figure 4. Global Prickly Pear Seed Oil Market, Data Triangulation 25
Figure 5. Global Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million, Growth %) 32
Figure 6. Global Prickly Pear Seed Oil Market, Key Growth Contribution, by Region, 2025-2032 (USD Million) 35
Figure 7. Global Prickly Pear Seed Oil Market, Key Growth Contribution, by Country, 2025-2032 (CAGR %) 35
Figure 8. Global Prickly Pear Seed Oil Market Size, by Refinement Status, 2025 (%) 78
Figure 9. Global Prickly Pear Seed Oil Market, by Refinement Status, 2032 (USD Million) 79
Figure 10. Global Prickly Pear Seed Oil Market Size, by Application, 2025 (%) 101
Figure 11. Global Prickly Pear Seed Oil Market, by Application, 2032 (USD Million) 101
Figure 12. Global Prickly Pear Seed Oil Market Size, by End User, 2025 (%) 176
Figure 13. Global Prickly Pear Seed Oil Market, by End User, 2032 (USD Million) 177
Figure 14. Global Prickly Pear Seed Oil Market Size, by Supply Format, 2025 (%) 205
Figure 15. Global Prickly Pear Seed Oil Market, by Supply Format, 2032 (USD Million) 206
Figure 16. Global Prickly Pear Seed Oil Market Size, by Sales Channel, 2025 (%) 228
Figure 17. Global Prickly Pear Seed Oil Market, by Sales Channel, 2032 (USD Million) 229
Figure 18. Global Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2025 (%) 264
Figure 19. Global Prickly Pear Seed Oil Market, by Organic Certification Status, 2032 (USD Million) 265
Figure 20. Global Prickly Pear Seed Oil Market Size, by Botanical Source, 2025 (%) 285
Figure 21. Global Prickly Pear Seed Oil Market, by Botanical Source, 2032 (USD Million) 286
Figure 22. Global Prickly Pear Seed Oil Market, by Region: Market share evolution, 2025-2032 314
Figure 23. Global Prickly Pear Seed Oil Market, by Region: Market size by category, 2025 314
Figure 24. Global Prickly Pear Seed Oil Market, Regional growth by Refinement Status, 2025-2032 (CAGR %) 315
Figure 25. Global Prickly Pear Seed Oil Market Size, by Group, 2025 vs 2026 vs 2032 436
Figure 26. Global Prickly Pear Seed Oil Market Size, by Country, 2025 vs 2032 (%) 562
Figure 27. Global Prickly Pear Seed Oil Market Size, by Country, 2025 vs 2026 vs 2032 563
Figure 28. Global Prickly Pear Seed Oil Market Share, by Key Player, 2025 841

List of Tables

Table 1. Global Prickly Pear Seed Oil Market Segmentation & Coverage 8
Table 2. Global Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million, Growth %) 32
Table 3. Global Prickly Pear Seed Oil Market, Key Growth Contribution, 2025-2032 36
Table 4. Global Prickly Pear Seed Oil Market, by Refinement Status growth contribution, 2025-2032 79
Table 5. Global Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 79
Table 6. Global Prickly Pear Seed Oil Market Size, by Unrefined, by Region, 2017-2040 (USD Million) 83
Table 7. Global Prickly Pear Seed Oil Market Size, by Unrefined, by Group, 2017-2040 (USD Million) 83
Table 8. Global Prickly Pear Seed Oil Market Size, by Unrefined, by Country, 2017-2040 (USD Million) 84
Table 9. Global Prickly Pear Seed Oil Market Size, by Refined, by Region, 2017-2040 (USD Million) 91
Table 10. Global Prickly Pear Seed Oil Market Size, by Refined, by Group, 2017-2040 (USD Million) 91
Table 11. Global Prickly Pear Seed Oil Market Size, by Refined, by Country, 2017-2040 (USD Million) 92
Table 12. Global Prickly Pear Seed Oil Market, by Application growth contribution, 2025-2032 101
Table 13. Global Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 102
Table 14. Global Prickly Pear Seed Oil Market, by Cosmetics and Personal Care growth contribution, 2025-2032 107
Table 15. Global Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, by Region, 2017-2040 (USD Million) 107
Table 16. Global Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, by Group, 2017-2040 (USD Million) 108
Table 17. Global Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, by Country, 2017-2040 (USD Million) 108
Table 18. Global Prickly Pear Seed Oil Market Size, by Skin Care, by Region, 2017-2040 (USD Million) 118
Table 19. Global Prickly Pear Seed Oil Market Size, by Skin Care, by Group, 2017-2040 (USD Million) 119
Table 20. Global Prickly Pear Seed Oil Market Size, by Skin Care, by Country, 2017-2040 (USD Million) 119
Table 21. Global Prickly Pear Seed Oil Market Size, by Hair Care, by Region, 2017-2040 (USD Million) 126
Table 22. Global Prickly Pear Seed Oil Market Size, by Hair Care, by Group, 2017-2040 (USD Million) 126
Table 23. Global Prickly Pear Seed Oil Market Size, by Hair Care, by Country, 2017-2040 (USD Million) 127

Table 24. Global Prickly Pear Seed Oil Market Size, by Color Cosmetics, by Region, 2017-2040 (USD Million) 134
Table 25. Global Prickly Pear Seed Oil Market Size, by Color Cosmetics, by Group, 2017-2040 (USD Million) 134
Table 26. Global Prickly Pear Seed Oil Market Size, by Color Cosmetics, by Country, 2017-2040 (USD Million) 135
Table 27. Global Prickly Pear Seed Oil Market Size, by Personal Cleansing, by Region, 2017-2040 (USD Million) 140
Table 28. Global Prickly Pear Seed Oil Market Size, by Personal Cleansing, by Group, 2017-2040 (USD Million) 141
Table 29. Global Prickly Pear Seed Oil Market Size, by Personal Cleansing, by Country, 2017-2040 (USD Million) 141
Table 30. Global Prickly Pear Seed Oil Market Size, by Nail Care, by Region, 2017-2040 (USD Million) 147
Table 31. Global Prickly Pear Seed Oil Market Size, by Nail Care, by Group, 2017-2040 (USD Million) 147
Table 32. Global Prickly Pear Seed Oil Market Size, by Nail Care, by Country, 2017-2040 (USD Million) 148
Table 33. Global Prickly Pear Seed Oil Market Size, by Pharmaceuticals, by Region, 2017-2040 (USD Million) 154
Table 34. Global Prickly Pear Seed Oil Market Size, by Pharmaceuticals, by Group, 2017-2040 (USD Million) 154
Table 35. Global Prickly Pear Seed Oil Market Size, by Pharmaceuticals, by Country, 2017-2040 (USD Million) 155
Table 36. Global Prickly Pear Seed Oil Market Size, by Food and Beverages, by Region, 2017-2040 (USD Million) 161
Table 37. Global Prickly Pear Seed Oil Market Size, by Food and Beverages, by Group, 2017-2040 (USD Million) 162
Table 38. Global Prickly Pear Seed Oil Market Size, by Food and Beverages, by Country, 2017-2040 (USD Million) 162
Table 39. Global Prickly Pear Seed Oil Market Size, by Dietary Supplements, by Region, 2017-2040 (USD Million) 168
Table 40. Global Prickly Pear Seed Oil Market Size, by Dietary Supplements, by Group, 2017-2040 (USD Million) 169
Table 41. Global Prickly Pear Seed Oil Market Size, by Dietary Supplements, by Country, 2017-2040 (USD Million) 169
Table 42. Global Prickly Pear Seed Oil Market, by End User growth contribution, 2025-2032 177
Table 43. Global Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 177
Table 44. Global Prickly Pear Seed Oil Market Size, by Individuals and Households, by Region, 2017-2040 (USD Million) 182
Table 45. Global Prickly Pear Seed Oil Market Size, by Individuals and Households, by Group, 2017-2040 (USD Million) 182
Table 46. Global Prickly Pear Seed Oil Market Size, by Individuals and Households, by Country, 2017-2040 (USD Million) 183

Table 47. Global Prickly Pear Seed Oil Market Size, by Manufacturers and Formulators, by Region, 2017-2040 (USD Million) 189
Table 48. Global Prickly Pear Seed Oil Market Size, by Manufacturers and Formulators, by Group, 2017-2040 (USD Million) 190
Table 49. Global Prickly Pear Seed Oil Market Size, by Manufacturers and Formulators, by Country, 2017-2040 (USD Million) 190
Table 50. Global Prickly Pear Seed Oil Market Size, by Professional Service Providers, by Region, 2017-2040 (USD Million) 197
Table 51. Global Prickly Pear Seed Oil Market Size, by Professional Service Providers, by Group, 2017-2040 (USD Million) 197
Table 52. Global Prickly Pear Seed Oil Market Size, by Professional Service Providers, by Country, 2017-2040 (USD Million) 198
Table 53. Global Prickly Pear Seed Oil Market, by Supply Format growth contribution, 2025-2032 206
Table 54. Global Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 206
Table 55. Global Prickly Pear Seed Oil Market Size, by Consumer Packaging, by Region, 2017-2040 (USD Million) 211
Table 56. Global Prickly Pear Seed Oil Market Size, by Consumer Packaging, by Group, 2017-2040 (USD Million) 211
Table 57. Global Prickly Pear Seed Oil Market Size, by Consumer Packaging, by Country, 2017-2040 (USD Million) 212
Table 58. Global Prickly Pear Seed Oil Market Size, by Bulk Packaging, by Region, 2017-2040 (USD Million) 220
Table 59. Global Prickly Pear Seed Oil Market Size, by Bulk Packaging, by Group, 2017-2040 (USD Million) 220
Table 60. Global Prickly Pear Seed Oil Market Size, by Bulk Packaging, by Country, 2017-2040 (USD Million) 221
Table 61. Global Prickly Pear Seed Oil Market, by Sales Channel growth contribution, 2025-2032 229
Table 62. Global Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 229
Table 63. Global Prickly Pear Seed Oil Market, by Intermediated Sales growth contribution, 2025-2032 233
Table 64. Global Prickly Pear Seed Oil Market Size, by Intermediated Sales, by Region, 2017-2040 (USD Million) 233
Table 65. Global Prickly Pear Seed Oil Market Size, by Intermediated Sales, by Group, 2017-2040 (USD Million) 233
Table 66. Global Prickly Pear Seed Oil Market Size, by Intermediated Sales, by Country, 2017-2040 (USD Million) 234
Table 67. Global Prickly Pear Seed Oil Market Size, by Retailers, by Region, 2017-2040 (USD Million) 242
Table 68. Global Prickly Pear Seed Oil Market Size, by Retailers, by Group, 2017-2040 (USD Million) 242
Table 69. Global Prickly Pear Seed Oil Market Size, by Retailers, by Country, 2017-2040 (USD Million) 243

Table 70. Global Prickly Pear Seed Oil Market Size, by Ingredient Distributors and Wholesalers, by Region, 2017-2040 (USD Million) 249
Table 71. Global Prickly Pear Seed Oil Market Size, by Ingredient Distributors and Wholesalers, by Group, 2017-2040 (USD Million) 249
Table 72. Global Prickly Pear Seed Oil Market Size, by Ingredient Distributors and Wholesalers, by Country, 2017-2040 (USD Million) 250
Table 73. Global Prickly Pear Seed Oil Market Size, by Direct Sales, by Region, 2017-2040 (USD Million) 256
Table 74. Global Prickly Pear Seed Oil Market Size, by Direct Sales, by Group, 2017-2040 (USD Million) 257
Table 75. Global Prickly Pear Seed Oil Market Size, by Direct Sales, by Country, 2017-2040 (USD Million) 257
Table 76. Global Prickly Pear Seed Oil Market, by Organic Certification Status growth contribution, 2025-2032 265
Table 77. Global Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 265
Table 78. Global Prickly Pear Seed Oil Market Size, by Certified Organic, by Region, 2017-2040 (USD Million) 269
Table 79. Global Prickly Pear Seed Oil Market Size, by Certified Organic, by Group, 2017-2040 (USD Million) 270
Table 80. Global Prickly Pear Seed Oil Market Size, by Certified Organic, by Country, 2017-2040 (USD Million) 270
Table 81. Global Prickly Pear Seed Oil Market Size, by Not Certified Organic, by Region, 2017-2040 (USD Million) 277
Table 82. Global Prickly Pear Seed Oil Market Size, by Not Certified Organic, by Group, 2017-2040 (USD Million) 277
Table 83. Global Prickly Pear Seed Oil Market Size, by Not Certified Organic, by Country, 2017-2040 (USD Million) 278
Table 84. Global Prickly Pear Seed Oil Market, by Botanical Source growth contribution, 2025-2032 286
Table 85. Global Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 286
Table 86. Global Prickly Pear Seed Oil Market Size, by Opuntia ficus-indica, by Region, 2017-2040 (USD Million) 290
Table 87. Global Prickly Pear Seed Oil Market Size, by Opuntia ficus-indica, by Group, 2017-2040 (USD Million) 291
Table 88. Global Prickly Pear Seed Oil Market Size, by Opuntia ficus-indica, by Country, 2017-2040 (USD Million) 291
Table 89. Global Prickly Pear Seed Oil Market Size, by Opuntia stricta, by Region, 2017-2040 (USD Million) 298
Table 90. Global Prickly Pear Seed Oil Market Size, by Opuntia stricta, by Group, 2017-2040 (USD Million) 298
Table 91. Global Prickly Pear Seed Oil Market Size, by Opuntia stricta, by Country, 2017-2040 (USD Million) 299

Table 92. Global Prickly Pear Seed Oil Market Size, by Opuntia tuna, by Region, 2017-2040 (USD Million) 305
Table 93. Global Prickly Pear Seed Oil Market Size, by Opuntia tuna, by Group, 2017-2040 (USD Million) 305
Table 94. Global Prickly Pear Seed Oil Market Size, by Opuntia tuna, by Country, 2017-2040 (USD Million) 306
Table 95. Global Prickly Pear Seed Oil Market, by Region growth contribution, 2025-2032 315
Table 96. Global Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million) 315
Table 97. Europe Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 320
Table 98. Europe Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million) 321
Table 99. Europe Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 321
Table 100. Europe Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 322
Table 101. Europe Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 322
Table 102. Europe Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 322
Table 103. Europe Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 322
Table 104. Europe Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 323
Table 105. Europe Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 323
Table 106. Europe Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 323
Table 107. Europe Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 323
Table 108. North America Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 340
Table 109. North America Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million) 340
Table 110. North America Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 340
Table 111. North America Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 341
Table 112. North America Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 341
Table 113. North America Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 341
Table 114. North America Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 341
Table 115. North America Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 342
Table 116. North America Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 342

Table 117. North America Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 342
Table 118. North America Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 342
Table 119. Asia-Pacific Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 358
Table 120. Asia-Pacific Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million) 359
Table 121. Asia-Pacific Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 359
Table 122. Asia-Pacific Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 359
Table 123. Asia-Pacific Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 360
Table 124. Asia-Pacific Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 360
Table 125. Asia-Pacific Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 360
Table 126. Asia-Pacific Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 360
Table 127. Asia-Pacific Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 361
Table 128. Asia-Pacific Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 361
Table 129. Asia-Pacific Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 361
Table 130. Middle East Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 378
Table 131. Middle East Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million) 378
Table 132. Middle East Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 378
Table 133. Middle East Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 379
Table 134. Middle East Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 379
Table 135. Middle East Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 379
Table 136. Middle East Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 379
Table 137. Middle East Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 380
Table 138. Middle East Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 380
Table 139. Middle East Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 380

Table 140. Middle East Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 380
Table 141. Latin America Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 397
Table 142. Latin America Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million) 397
Table 143. Latin America Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 397
Table 144. Latin America Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 398
Table 145. Latin America Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 398
Table 146. Latin America Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 398
Table 147. Latin America Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 398
Table 148. Latin America Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 399
Table 149. Latin America Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 399
Table 150. Latin America Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 399
Table 151. Latin America Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 399
Table 152. Africa Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 415
Table 153. Africa Prickly Pear Seed Oil Market Size, by Region, 2017-2040 (USD Million) 415
Table 154. Africa Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 415
Table 155. Africa Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 416
Table 156. Africa Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 416
Table 157. Africa Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 416
Table 158. Africa Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 416
Table 159. Africa Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 417
Table 160. Africa Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 417
Table 161. Africa Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 417
Table 162. Africa Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 417
Table 163. Global Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million) 436
Table 164. NATO Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 440
Table 165. NATO Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million) 441

Table 166. NATO Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 442
Table 167. NATO Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 442
Table 168. NATO Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 442
Table 169. NATO Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 443
Table 170. NATO Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 443
Table 171. NATO Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 443
Table 172. NATO Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 443
Table 173. NATO Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 444
Table 174. NATO Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 444
Table 175. G7 Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 461
Table 176. G7 Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million) 461
Table 177. G7 Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 461
Table 178. G7 Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 462
Table 179. G7 Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 462
Table 180. G7 Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 462
Table 181. G7 Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 462
Table 182. G7 Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 463
Table 183. G7 Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 463
Table 184. G7 Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 463
Table 185. G7 Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 463
Table 186. European Union Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 481
Table 187. European Union Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million) 482
Table 188. European Union Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 483
Table 189. European Union Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 483
Table 190. European Union Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 483
Table 191. European Union Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 483
Table 192. European Union Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 484

Table 193. European Union Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 484
Table 194. European Union Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 484
Table 195. European Union Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 484
Table 196. European Union Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 484
Table 197. BRICS Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 501
Table 198. BRICS Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million) 501
Table 199. BRICS Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 501
Table 200. BRICS Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 502
Table 201. BRICS Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 502
Table 202. BRICS Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 502
Table 203. BRICS Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 502
Table 204. BRICS Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 503
Table 205. BRICS Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 503
Table 206. BRICS Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 503
Table 207. BRICS Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 503
Table 208. GCC Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 520
Table 209. GCC Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million) 520
Table 210. GCC Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 520
Table 211. GCC Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 521
Table 212. GCC Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 521
Table 213. GCC Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 521
Table 214. GCC Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 521
Table 215. GCC Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 522
Table 216. GCC Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 522
Table 217. GCC Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 522
Table 218. GCC Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 522
Table 219. ASEAN Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 539
Table 220. ASEAN Prickly Pear Seed Oil Market Size, by Group, 2017-2040 (USD Million) 540

Table 221. ASEAN Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 540
Table 222. ASEAN Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 540
Table 223. ASEAN Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 541
Table 224. ASEAN Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 541
Table 225. ASEAN Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 541
Table 226. ASEAN Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 541
Table 227. ASEAN Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 542
Table 228. ASEAN Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 542
Table 229. ASEAN Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 542
Table 230. Global Prickly Pear Seed Oil Market, by Country growth contribution, 2025-2032 564
Table 231. Global Prickly Pear Seed Oil Market Size, by Country, 2017-2040 (USD Million) 565
Table 232. United States Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 568
Table 233. United States Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 569
Table 234. United States Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 569
Table 235. United States Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 569
Table 236. United States Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 569
Table 237. United States Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 570
Table 238. United States Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 570
Table 239. United States Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 570
Table 240. United States Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 570
Table 241. United States Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 570
Table 242. France Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 586
Table 243. France Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 586
Table 244. France Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 586
Table 245. France Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 586
Table 246. France Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 587

Table 247. France Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 587
Table 248. France Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 587
Table 249. France Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 587
Table 250. France Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 587
Table 251. France Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 588
Table 252. Germany Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 604
Table 253. Germany Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 604
Table 254. Germany Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 604
Table 255. Germany Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 604
Table 256. Germany Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 605
Table 257. Germany Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 605
Table 258. Germany Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 605
Table 259. Germany Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 605
Table 260. Germany Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 605
Table 261. Germany Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 606
Table 262. China Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 622
Table 263. China Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 622
Table 264. China Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 622
Table 265. China Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 622
Table 266. China Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 623
Table 267. China Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 623
Table 268. China Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 623
Table 269. China Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 623
Table 270. China Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 623
Table 271. China Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 624

Table 272. United Kingdom Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 640
Table 273. United Kingdom Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 640
Table 274. United Kingdom Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 640
Table 275. United Kingdom Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 641
Table 276. United Kingdom Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 641
Table 277. United Kingdom Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 641
Table 278. United Kingdom Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 641
Table 279. United Kingdom Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 642
Table 280. United Kingdom Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 642
Table 281. United Kingdom Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 642
Table 282. Italy Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 658
Table 283. Italy Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 658
Table 284. Italy Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 658
Table 285. Italy Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 658
Table 286. Italy Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 659
Table 287. Italy Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 659
Table 288. Italy Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 659
Table 289. Italy Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 659
Table 290. Italy Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 659
Table 291. Italy Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 660
Table 292. Japan Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 676
Table 293. Japan Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 676
Table 294. Japan Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 676
Table 295. Japan Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 676
Table 296. Japan Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 677
Table 297. Japan Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 677
Table 298. Japan Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 677

Table 299. Japan Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 677
Table 300. Japan Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 677
Table 301. Japan Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 678
Table 302. South Korea Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 694
Table 303. South Korea Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 694
Table 304. South Korea Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 694
Table 305. South Korea Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 694
Table 306. South Korea Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 695
Table 307. South Korea Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 695
Table 308. South Korea Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 695
Table 309. South Korea Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 695
Table 310. South Korea Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 695
Table 311. South Korea Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 696
Table 312. Spain Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 712
Table 313. Spain Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 712
Table 314. Spain Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 712
Table 315. Spain Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 712
Table 316. Spain Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 713
Table 317. Spain Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 713
Table 318. Spain Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 713
Table 319. Spain Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 713
Table 320. Spain Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 713
Table 321. Spain Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 714
Table 322. Brazil Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 730
Table 323. Brazil Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 730
Table 324. Brazil Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 730

Table 325. Brazil Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 730
Table 326. Brazil Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 731
Table 327. Brazil Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 731
Table 328. Brazil Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 731
Table 329. Brazil Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 731
Table 330. Brazil Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 731
Table 331. Brazil Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 732
Table 332. Australia Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 748
Table 333. Australia Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 748
Table 334. Australia Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 748
Table 335. Australia Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 748
Table 336. Australia Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 749
Table 337. Australia Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 749
Table 338. Australia Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 749
Table 339. Australia Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 749
Table 340. Australia Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 749
Table 341. Australia Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 750
Table 342. Canada Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 766
Table 343. Canada Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 766
Table 344. Canada Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 766
Table 345. Canada Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 766
Table 346. Canada Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 767
Table 347. Canada Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 767
Table 348. Canada Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 767
Table 349. Canada Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 767

Table 350. Canada Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 767
Table 351. Canada Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 768
Table 352. Mexico Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 784
Table 353. Mexico Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 784
Table 354. Mexico Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 784
Table 355. Mexico Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 784
Table 356. Mexico Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 785
Table 357. Mexico Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 785
Table 358. Mexico Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 785
Table 359. Mexico Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 785
Table 360. Mexico Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 785
Table 361. Mexico Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 786
Table 362. India Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 802
Table 363. India Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 802
Table 364. India Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 802
Table 365. India Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 802
Table 366. India Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 803
Table 367. India Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 803
Table 368. India Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 803
Table 369. India Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 803
Table 370. India Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 803
Table 371. India Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 804
Table 372. Russia Prickly Pear Seed Oil Market Size, 2017-2040 (USD Million) 820
Table 373. Russia Prickly Pear Seed Oil Market Size, by Refinement Status, 2017-2040 (USD Million) 820
Table 374. Russia Prickly Pear Seed Oil Market Size, by Application, 2017-2040 (USD Million) 820
Table 375. Russia Prickly Pear Seed Oil Market Size, by Cosmetics and Personal Care, 2017-2040 (USD Million) 820
Table 376. Russia Prickly Pear Seed Oil Market Size, by End User, 2017-2040 (USD Million) 821

Table 377. Russia Prickly Pear Seed Oil Market Size, by Supply Format, 2017-2040 (USD Million) 821
Table 378. Russia Prickly Pear Seed Oil Market Size, by Sales Channel, 2017-2040 (USD Million) 821
Table 379. Russia Prickly Pear Seed Oil Market Size, by Intermediated Sales, 2017-2040 (USD Million) 821
Table 380. Russia Prickly Pear Seed Oil Market Size, by Organic Certification Status, 2017-2040 (USD Million) 821
Table 381. Russia Prickly Pear Seed Oil Market Size, by Botanical Source, 2017-2040 (USD Million) 822
Table 382. Global Prickly Pear Seed Oil Market Share, by Key Player, 2025 842
Table 383. Global Prickly Pear Seed Oil Market, Companies Covered 871
Table 384. Global Prickly Pear Seed Oil Market, Key Experts 899

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