

Complete Global Certification Guide for Glabridin from HiSiaddi

Target Users: Overseas Distributors, European & American Offline Beauty Retailers, Amazon/Shopify Brand Sellers, Clean Beauty Organic Labels, Middle East & Southeast Asian Bulk Purchasers, Customs Freight Forwarders

INCI: Glabridin | CAS: 59870-68-7

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PDF 1 ISO 22716 Cosmetic GMP Full Compliance Specification

1.1 Applicable Scenarios for Certification

1. Mandatory supplier audit requirement for offline beauty chains (Sephora, European pharmacies, US retail collections)
2. Required documentation for Amazon, Shopify brand onboarding
3. Pre-requisite for EU CPNP & UK SCPN raw material notifications
4. Primary entry threshold for OEM/ODM raw material suppliers serving overseas brands

1.2 Mandatory ISO 22716 Compliance Requirements for Glabridin

Manufacturers

1.2.1 Factory Hardware & Cleanroom Standards

1. Zoned Separation: Raw material warehousing, crude extraction, purification & recrystallization cleanroom, finished product filling, testing laboratory and storage zones are fully segregated for separate personnel & material flow to avoid cross-contamination
2. Purification cleanroom meets Class 10,000 cleanliness grade; constant temperature & humidity maintained at 18–25°C, relative humidity 40–60%; independent light-proof cold storage rooms dedicated to Glabridin to prevent oxidation-induced discoloration
3. Epoxy flooring & mold-proof waterproof wall surfaces; standardized cleaning & disinfection SOPs; complete pest control systems
4. Light-proof sealed raw material storage; independent 2–8°C cold storage area exclusively for high-purity Glabridin powder

1.2.2 Full Document System Required for Buyer Audits

(1) Enterprise Basic Qualifications

1. Bilingual English & Chinese ISO 22716 Certificate (Valid certificates issued by SGS, Intertek, BV and other international third-party bodies accepted)
 2. Business License with plant extract production business scope, factory layout drawing, cleanroom pressure differential monitoring annual records
 3. Organizational chart, quality director & laboratory analyst qualification certificates, minimum 2 internal auditor credentials
 4. Annual staff physical examination files, full GMP training archives (retained for minimum 3 years)
- (2) Full GMP Controlled Document Library
1. Quality Manual covering end-to-end risk control for Glabridin: pesticide residues, heavy metals, oxidative degradation, microbial limits
 2. Standard Operating Procedures (SOPs): supplier assessment, raw material incoming inspection, production process control, equipment calibration, OOS/OOT deviation handling, non-conforming product management, customer complaint resolution, product recall protocols
 3. Glabridin Exclusive SOPs
 - Glycyrrhiza glabra Raw Material Incoming Inspection SOP (Pesticide Pre-Screening)
 - Low-Temperature Ethanol Extraction, Macroporous Resin Separation & Multiple Recrystallization Operation Guidelines
 - Light-Proof Feeding, Low-Temperature Filling & Vacuum Aluminum Sealing SOP
 - HPLC Purity, ICP-MS Heavy Metal & GC-MS Pesticide Residue Test Standard Operating Procedures
 - Finished Product Light-Proof Storage & Retention Sample Stability Testing Specifications
 4. Full Equipment Documentation: List of extraction reactors, chromatography columns, vacuum dryers, HPLC & ICP-MS instruments + annual calibration certificates
- (3) Traceable Batch Production Records Supplied With Every Shipment
1. Glycyrrhiza glabra purchase orders, organic base traceability certificates, incoming batch inspection logs

2. Batch Manufacturing Records (BMR): full record of feeding quantities, extraction temperature & duration, purification parameters, filtration & drying metrics
3. Intermediate & finished product full-test original data (purity, moisture, heavy metals, microbial limits, solvent residues)
4. Finished product outbound logs & retention sample archives (samples retained for full 24-month shelf life)

1.2.3 Specialized GMP Control Points for Glabridin (Key Factory Audit Focus Areas)

1. Raw Material Segregation: Dedicated production line exclusively for *Glycyrrhiza glabra*; shared equipment with *Glycyrrhiza uralensis* prohibited to prevent active ingredient dilution
2. Full Light-Proof Production: All extraction, concentration, crystallization and filling equipment manufactured from opaque stainless steel; transparent reaction vessels banned
3. Anti-Oxidation Controls: Approved stabilizers added during purification; finished products nitrogen-filled vacuum sealed
4. Closed-Loop Solvent Recovery: Complete ethanol recovery logs; methanol residue strictly controlled within regulatory limits

1.3 English Document Package Delivered to Overseas Buyers for Filing

1. Scanned English ISO 2271 Certificate
2. Condensed English GMP Quality Manual Summary
3. Abbreviated English SOP for Glabridin Production
4. Annual Cleanroom Environmental Monitoring Reports
5. Full collection of laboratory instrument calibration certificates
6. OOS deviation handling cases from the past 12 months (to demonstrate stable quality control)

1.4 Business Risks Without ISO 22716 Certification

Eliminated from supplier lists by European & American offline retailers and Amazon brands; EU CPNP notifications rejected; customs cargo detention & disposal upon sampling non-compliance

PDF 2 ECOCERT COSMOS Organic Raw Material Certification Guide

2.1 Eligible Sales Channels

EU natural & organic skincare brands, French pharmacies, German organic supermarket chains, UK Clean Beauty independent labels, high-end natural whitening lines with organic marketing claims

2.2 Mandatory ECOCERT COSMOS Standards for Glabridin

2.2.1 Cultivation Source Requirements

1. Glycyrrhiza glabra cultivation base with valid organic certification, minimum 3-year conversion period; chemical fertilizers, herbicides, pesticides and genetically modified seedlings fully prohibited
2. Land parcel distribution maps, annual agricultural activity logs, third-party full non-detect pesticide residue test reports provided
3. Wild licorice raw materials require official wild harvesting permits issued by local agricultural/forestry bureaus to prove sustainable harvesting without overexploitation

2.2 Forbidden Extraction Processing Techniques Under COSMOS Rules

1. Dichloromethane, acetone and other Class II toxic organic solvents prohibited; only ethanol, 1,3-butanediol and purified water permitted as extraction solvents
2. Synthetic decolorizing agents & artificial antioxidants banned; natural tocopherol and plant polyphenols the only approved stabilizers
3. Full animal testing prohibition; official No Animal Testing declaration required
4. Dilution with dextrin, glucose or synthetic carriers to inflate batch weight prohibited for high-purity powder

2.3 Organic Grade Classification Determining Marketing Claim Rights

1. COSMOS ORGANIC: Minimum 95% agricultural organic composition within raw material; finished products authorized to display "Organic" text & official ECOCERT organic logo
2. COSMOS NATURAL: Minimum 20% organic composition; only "Natural" text permitted, organic logo usage forbidden

2.4 Complete Documentation Required for Certification Application

1. Original English ECOCERT COSMOS Certificate (12-month validity, annual recertification audit required)
2. Organic farm certification documents, land agricultural records, soil testing reports
3. Full English process flowchart detailing extraction, resin separation & recrystallization with full solvent inventory
4. Official ECOCERT F306 Non-Aqueous Extract Ingredient Disclosure Form
5. Third-party full 55-pesticide ND test reports

6. Formal No Animal Testing Declaration

7. Recyclable aluminum packaging & plastic-free packaging certification documents

2.5 Commercial Benefits for Certified Raw Materials

Finished products formulated with COSMOS-certified Glabridin may legally market "Organic Plant Whitening" claims across the EU without supplementary safety validation; exclusive eligibility for organic retail counters and natural beauty offline channels

2.6 Common Certification Pitfalls to Avoid

Factory GMP certification alone does not qualify as COSMOS organic certification; 40% low-purity crude licorice flavonoids fail COSMOS audits, only $\geq 95\%$ high-purity Glabridin powder eligible for organic certification application

PDF 3 USDA Organic / Halal / Kosher Triple Certification Manual

Module A USDA Organic Certification (Mandatory for North American Market)

A.1 Core NOP Regulatory Mandates

1. 100% organic licorice agricultural raw materials; water & inorganic salts excluded from organic composition calculations
2. Processing aids restricted to approved substances on the NOP positive list; synthetic decolorants & artificial preservatives forbidden

A.2 Organic Grade Classification

1. 100% Organic: All plant-derived components organic; full USDA organic logo printing permitted
2. Organic ($\geq 95\%$ organic components): Standard grade for premium whitening raw materials

A.3 Glabridin Specific Restrictions

Pork-derived activated carbon, animal oil processing aids prohibited; all filtration media must be plant or mineral-based

A.4 Supporting Documentation for Buyers

USDA Organic Certificate, organic farm qualification documents, NOP compliant auxiliary material list, third-party pesticide residue test reports
Module B Halal Certification (Middle East, Malaysia, Indonesia & Muslim-Majority Southeast Asia)

B.1 Mandatory Halal Compliance Rules for Glabridin

1. Zero pork or non-halal animal-derived auxiliary materials (no pork gelatin, pork-based activated carbon, animal oil additives)

2. Only plant fermented ethanol permitted for extraction; distilled alcoholic spirits banned; finished free ethanol residual limit $\leq 0.5\%$
3. Dedicated exclusive production lines; no co-processing of haram prohibited raw materials; formal Sertu halal cleaning logs retained for equipment
4. No placenta, animal cell or human-derived additives; full halal COA supporting documents required for all auxiliary materials

B.2 Buyer Filing Documents

Internationally recognized Halal certificate (AHF, MUI etc.), dedicated production line segregation statement, solvent plant source certification, halal auxiliary material test reports

Module C Kosher Certification (North American Jewish Brands, European Premium Pharmacies)

C.1 Kosher Compliance Rules

1. Shellfish & non-ruminant animal-derived processing aids forbidden; filtration media limited to mineral or plant sources
2. Dedicated production equipment; full hot water sanitization with Rabbi inspection required for cross-product manufacturing
3. Fermented ethanol compliant with Kosher standards; wine-derived solvents prohibited
4. Annual unannounced audits by Kosher authorities of full production logs

C.2 Supporting Documentation

Annual Kosher certificate, Rabbi factory inspection report, kosher-compliant auxiliary material certifications

3.1 Channel Value of All Three Certifications

1. USDA Organic mandatory for Whole Foods and North American organic retail chains
2. Halal certification required for customs clearance in Middle Eastern countries; shipments detained without valid certificates
3. Kosher certification exclusive entry requirement for Jewish consumer skincare segments in Europe & North America

PDF 4 Heavy Metal & Pesticide Residue Third-Party Testing Standard Handbook

4.1 Dual Standard Heavy Metal Limit Comparison Table (EU vs South Korea KFDA Customs Inspection Benchmark)

表格

Test Item	EU (EC) No 1223/2009 Limit	South Korea KFDA Functional Whitening Raw Material Limit	Testing Instrument
Lead (Pb)	≤10 ppm	≤5 ppm	ICP-MS
Arsenic (As)	≤3 ppm	≤1 ppm	ICP-MS
Mercury (Hg)	≤1 ppm	≤0.5 ppm	ICP-MS
Cadmium (Cd)	≤5 ppm	≤3 ppm	ICP-MS
Total Heavy Metals	≤10 ppm	≤8 ppm	Colorimetric Assay

Control Notes

South Korean standards are stricter than EU specifications; raw materials exported to South Korea must meet KFDA limits with dual-standard COA labeling; any heavy metal exceeding thresholds results in full batch seizure & destruction upon customs inspection

4.2 Uniform Pesticide Residue Testing Standard

1. Regulated Substance List: 55 organophosphates, organochlorines and pyrethroid pesticides
2. Compliance Red Line: All pesticides Not Detected (ND); any detectable residues render raw materials ineligible for functional whitening product use
3. Testing Standards: EU EC 834/2007, South Korea MFDS Plant Extract Pesticide Announcement
4. Supporting Documentation: GC-MS full 55-pesticide screening report provided with every batch COA

4.3 Additional Mandatory Import Impurity Testing (EU & South Korea Shared Requirements)

1. Hydroquinone (Forbidden Whitening Agent): ND, trace limit ≤1ppm; EU implements strict crackdown on artificial hydroquinone adulteration
2. Organic Solvent Residues: Methanol ≤0.2%, dichloromethane ND; ethanol unrestricted
3. Glabrol Impurity: ≤1.0% (hard threshold for South Korean & Japanese functional whitening raw materials)
4. Microbial Limits
 - Total Aerobic Microbes: ≤100 CFU/g

- Mold & Yeast: ≤ 10 CFU/g
- E. coli, Staphylococcus aureus, Pseudomonas aeruginosa, Salmonella: Not Detected

4.4 Qualified Third-Party Laboratory Requirements for Customs Acceptance
Laboratories must hold ISO17025 accreditation including SGS, Intertek, BV, Eurofins, South Korea KTR, Japan JFRL; all test reports must carry bilingual English & Chinese official laboratory seals to be recognized by overseas customs authorities

4.5 Full Inspection Document Package for Customs Filing

1. Full ICP-MS heavy metal test report
2. GC-MS full 55-pesticide screening report
3. Specialized hydroquinone impurity test report
4. GC organic solvent residue test report
5. Microbial limit test report

Complete Certification Document Delivery Package Index for Foreign Trade

1. Full ISO22716 GMP PDF Bundle (Certificates, System Files, Factory Environmental Monitoring Reports)
2. ECOCERT COSMOS Organic Certification PDF Pack (Certificates, Farm Documents, Process Declarations)
3. Combined USDA + Halal + Kosher Certification PDF Collection
4. Heavy Metal & Pesticide Testing Standard Handbook + Editable COA Template
5. Supplementary Auxiliary Documents: TDS, SDS, Free Sale Certificate (FSC), REACH Registration/Exemption Papers