Prop 65 Heavy Metal Testing Requirements for Consumer Products Explained

48-hour ICP-MS testing for key heavy metals with Prop 65 safe harbor documentation for dietary supplement, cosmetic, and Amazon FBA brands in California.

IRVINE, CA, UNITED STATES, March 19, 2026 /EINPresswire.com/ -- IRVINE, CA — Qalitex Laboratories, an ISO 17025-accredited third-party analytical testing laboratory specializing in ICP-MS heavy metal analysis, today outlined the critical testing requirements for dietary supplement brands, cosmetic companies, and Amazon FBA sellers marketing products in California under Proposition 65 and FDA guidance on elemental contaminants.

Enacted in 1986 and administered by the California Office of Environmental Health Hazard Assessment (OEHHA), California Proposition 65 requires businesses to provide clear and reasonable warnings before exposing consumers to chemicals known to cause cancer or reproductive toxicity. The list now includes more than 900 substances—among them lead, arsenic, cadmium, and mercury, which may occur naturally in botanical ingredients and cosmetic raw materials.

Unlike many regulatory frameworks, Prop 65 enforcement is largely driven by private litigation. Companies that lack compliant testing data or cannot demonstrate that exposures fall below established safe harbor levels face significant legal risk.

OEHHA has established strict thresholds for heavy metals, including a Maximum Allowable Dose Level (MADL) for lead of 0.5 micrograms per day (reproductive toxicity) and a No Significant Risk Level (NSRL) of 15 micrograms per day (carcinogenicity).

“We frequently see supplement brands enter the California market without conducting heavy

metal testing, only to receive a Prop 65 notice from a private plaintiff," said Nour Abochama, Vice President of Operations at Qalitex Laboratories. "While a notice is not a finding of violation, responding effectively requires validated data from an ISO 17025-accredited laboratory—and often under tight timelines. Proactive testing is the strongest position a brand can take."

In parallel, FDA guidance on elemental contaminants references USP General Chapter <2232>, which defines Permitted Daily Exposure (PDE) limits based on toxicological risk assessments aligned with ICH Q3D. These limits include:

Lead: 250 micrograms/day

Arsenic: 15 micrograms/day

Cadmium: 25 micrograms/day

Mercury: 30 micrograms/day

For accurate detection and compliance, inductively coupled plasma mass spectrometry (ICP-MS) remains the industry-standard analytical method. ICP-MS offers ultra-trace detection in the parts-per-trillion range, multi-element analysis, and the sensitivity required for complex botanical and cosmetic matrices.

Qalitex Laboratories provides ICP-MS testing for lead, arsenic, cadmium, mercury, and more than 20 additional elements, with results benchmarked against Prop 65 safe harbor levels, FDA guidance, USP <2232>, and applicable EU limits.

Certain high-risk ingredients are more prone to heavy metal contamination. These include turmeric (lead, arsenic), ashwagandha (lead), spirulina and chlorella (lead, arsenic, cadmium), rice protein (arsenic), and botanicals sourced from industrial regions. In cosmetics, mineral pigments and naturally derived ingredients may also introduce trace contaminants.

"For brands working with botanical ingredients, we strongly recommend lot-by-lot testing of incoming raw materials—not just finished products," Abochama added. "Testing at the ingredient stage allows for better sourcing decisions, reduces financial risk, and aligns with FDA expectations under 21 CFR Part 111."

Resources

Full article: https://qalitex.com/services/heavy-metal-testing/

About Qalitex Laboratories

Qalitex Laboratories is an ISO 17025-accredited third-party analytical testing laboratory with

facilities in Irvine and San Diego, California. The company provides comprehensive testing services, including certificate of analysis (COA) testing, ICP-MS heavy metal analysis, microbiological testing per USP <61> and <62>, preservative efficacy testing, and ICH-compliant stability studies.

Qalitex supports regulatory compliance for dietary supplement brands, cosmetic companies, and consumer product manufacturers, with programs aligned to 21 CFR Part 111, California Proposition 65, Amazon compliance requirements, and Health Canada NHP standards. Standard turnaround times begin at 48 hours.

Nour Abochama
Qalitex Laboratories
+ +1 (949) 881-6661
email us here
Visit us on social media:
LinkedIn
Instagram
Facebook
