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Certificate of Analysis

Ferric Chloride CS, USP / EP Yellow Primary Solution 1 mL = 45.0 mg FeCl₃ 6H₂O

Lot Number: 2405B59 Product Number: 3110

Manufacture Date: MAY 02, 2024

Expiration Date: OCT 2025

Cobaltous Chloride Colorimetric Solution (CS), 1.00 mL = 59.5 mg CoCl₂ 6H₂O (RICCA CHEMICAL COMPANY Cat. No. 2210), Cupric Sulfate Colorimetric Solution (CS), 1.00 mL = 62.4 mg CuSO₄ 5H₂O (RICCA CHEMICAL COMPANY Cat. No. 2495), and high purity, ACS Reagent Grade Water (RICCA CHEMICAL COMPANY Cat. No. 9150) are used with this solution to prepare "Matching Fluids" (for use as liquid color standards) by the instructions given in the USP procedure for "Color and Achromicity."

Name	CAS#	Grade
Water	7732-18-5	ACS/ASTM/USP/EP
Hydrochloric Acid	7647-01-0	ACS
Ferric Chloride Hexahydrate	10025-77-1	ACS

Test	Specification	Result	NIST SRM#
Appearance	Amber liquid	Passed	
Assay (vs. Sodium Thiosulfate/Starch)	44.97-45.03 mg/mL	$45.03~\mathrm{mg/mL}$	136

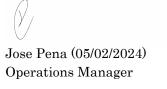
Specification	Reference
Ferric Chloride Solution (0.5 N)	ASTM (D 565)
Ferric Chloride Solution (0.5 N)	ASTM (D 612)
Yellow primary solution	EP (2.2.2)
Ferric Chloride CS	USP (N/A)

Volumetric glassware complies with Class A tolerance requirements of ASTM E 288 and NIST Circular 434; it is calibrated before first use and recalibrated regularly in accordance with ASTM E 542 and NIST Procedure NBSIR 74-461. Balances are calibrated regularly with weights certified traceable to the NIST national mass standard. Thermometers and temperature probes are calibrated before first use and recalibrated regularly with a thermometer traceable to NIST standards. All products are prepared according to master documents that assure manufacture according to validated methods. Batch records document raw material traceability and production and testing history for each lot manufactured.

Part Number	Size / Package Type	Shelf Life (Unopened Container)
3110-16	500 mL amber glass	18 months
3110-4	120 mL amber glass	18 months

Recommended Storage: 15°C - 30°C (59°F - 86°F)

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