



3050 Spruce Street
Saint Louis, Missouri 63103 USA
Telephone 800-325-5832 • (314) 771-5765
Fax (314) 286-7828
email: techserv@sial.com
sigma-aldrich.com

Product Information

CHLORAMPHENICOL SIGMA REFERENCE STANDARD

Product No. **C6455**

Lot No: 16H5955

CAS No: 56-75-7

Storage Temperature: 2 - 8°

Synonyms: Acetamide, 2,2-dichloro-N-[2-hydroxy-1-(hydroxymethyl)-2-(4-nitrophenyl)ethyl]-, [R-(R*,R*)]-. D-threo-(–)-2,2-Dichloro-N-[β-hydroxy-α-(hydroxymethyl)-p-nitrophenethyl]acetamide.

Formula: $C_{11}H_{12}Cl_2N_2O_5$

Formula Weight: 323.13

Product Description

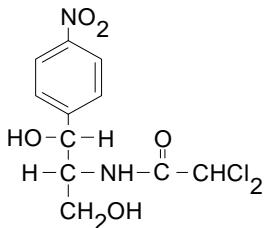
This product meets USP specifications (Current through USP 23, 4th Supplement), and is traceable to USP Reference Standard lot M.

Keep container tightly closed. Protect from light. Store in a cold place. Do not dry before using.

TEST	USP 23 SPECIFICATIONS	Result
Sigma R.S. Lot 16H5955		
Infrared absorption spectrum KBr dispersion (197K)	compares to standard	conforms to USP RS lot M
Identification B High pressure liquid chromatography (621)	retention time of the major peak in the chromatogram of the assay preparation corresponds to that in the standard preparation as obtained in the assay	conforms to USP RS lot M
Melting range (741)	between 149° and 153°C	150-151°C
Specific rotation, $[\alpha]_D^{25}$ 50 mg, undried/mL solution in dehydrated alcohol (781S)	between + 17.0° and + 20.0°	+ 17.8°
Crystallinity (695)	meets requirements	meets requirements
pH aqueous suspension (791)	between 4.5 and 7.5	6.1
Chromatographic purity	no impurity greater than 1% and the sum of impurities does not exceed 2%	passes
Assay — high pressure liquid chromatography (621)	not less than 97.0% and not more than 103.0%	100.2%
HPLC Column L1 Supelco Supelcosil LC-18 4.6 mm x 10 cm, 5 μm particles (Cat. No. 5-9209)		

See reverse side for IR spectrum of Sigma Reference Standard.

CHLORAMPHENICOL
SIGMA REFERENCE STANDARD
Product No. **C6455**
Lot 16H5955



INFRARED SPECTRUM

KBr dispersion

