Chem-Impex International, Inc.

Tel: (630) 766-2112 Fax: (630) 766-2218

E-mail: sales@chemimpex.com Web site: www.chemimpex.com

Manufacturing site:

Shipping and Correspondence:

935 Dillon Drive

Wood Dale, IL 60191

825 Dillon Drive

Wood Dale, IL 60191

Certificate of Analysis

Catalogue Number 00019

Lot Number 001192-002812009-6

Product L-Alanine

L-Ala-OH

(S)-2-Aminopropanoic acid

CAS Number 56-41-7 Molecular Formula C₃H₇NO₂ Molecular Weight 89.09

Appearance White crystals or crystalline powder

Heavy Metals < 15 ppm (as Pb)

Trace Metal Analysis Iron (Fe): < 30 ppm

Anion Chloride (Cl^-): < 0.05%

Sulfate (SO_4^{2-}): < 0.03%

pH 5.9

Optical Rotation +14.85°

Infrared Spectrum Conforms to structure

Loss on Drying 0.10%

Organic Volatile

Impurities

Meets the requirements

Related Substances Individual impurity: < 0.5%; Total impurities: < 2.0%

Residue On Ignition 0.05%

Assay by titration 99.0% (anhydrous basis)

Grade Meets USP Specification

Storage Store at RT

Certificate of Analysis

Catalog Number: 00019 Lot Number: 001192-002812009-6

Remarks

See material safety data sheet for additional information

For laboratory use only

The foregoing is a copy of the Certificate of Analysis as provided by our supplier

Bala Kumar

Quality Control Manager