

ALADDIN SCIENTIFIC CORPORATION

14078 Meridian Parkway, Riverside, CA. 92518

Certificate of Analysis

Date of Testing: 2023-11-01 10:44:59
Date of Next Testing: 2027-10-31 10:44:59
Product Name: **L-Valine**
CAS Number: 72-18-4
Specifications & Purity: Moligand™, ≥99%
Lot #: J2325591
SKU #: **V103487**
Version: **0**
Analysis #: **291057**

| Parameter | Limit Values | Result |
|---|-----------------------|-----------------------|
| Specific Rotation [α] ₂₀ /D(c=8 in HCl(1+1)) | 27-28.5 (°) | 28.30° |
| Purity(HPLC) | 98-100 (%) | 99.23500% |
| Nitrogen by Elemental Analysis | 11.3-12.5 (%) | 11.80% |
| Carbon by Elemental Analysis | 50.2-51.7 (%) | 50.90% |
| Appearance (V103487) | white powder | White powder |
| Infrared spectrum | Conforms to Structure | Conforms to Structure |
| Solubility in H ₂ O , Colorless ,Clear ,50 mg/mL in H ₂ O | pass | Pass |



John Su
QA & QC Manager