

ALADDIN SCIENTIFIC CORPORATION

14078 Meridian Parkway, Riverside, CA. 92518

Certificate of Analysis

Date of Testing: 2023-07-21 09:45:32
Date of Next Testing: 2025-07-10 09:45:32
Product Name: **Vitamin K1**
CAS Number: 84-80-0
Specifications & Purity: 98%(sum of Cis-trans)
Lot #: G2315062
SKU #: **V104147**
Version: **0**
Analysis #: **142179**
Storage Temperature: Store at 2-8°C, Protected from light, Argon charged

| Parameter | Limit Values | Result |
|---|-------------------------|-------------------------|
| Cis-isomer | 0-21 (%) | 0.00 % |
| Refractive index n ₂₀ /D | 1.525-1.529 | 1.53 |
| Purity(Mixture of cis and trans isomers ,HPLC) | 98-100 (%) | 99.00 % |
| Appearance (V104147) | yellow to orange liquid | yellow to orange liquid |
| Solubility in CHCL ₃ , Yellow to Dark Yellow Clear 100 ul/ml | pass | Pass |
| Proton NMR spectrum | Conforms to Structure | Conforms to Structure |



John Su
QA & QC Manager