

ALADDIN SCIENTIFIC CORPORATION

14078 Meridian Parkway, Riverside, CA. 92518

Certificate of Analysis

Date of Testing: 2022-03-20 16:01:30

Date of Next Testing: 2024-03-19 16:01:30

Product Name: (R)-(-)-1-[(S)-2-(Dicyclohexylphosphino)ferrocenyl]ethyl-di-t-butylphosphine

CAS Number: 158923-11-6

Specifications & Purity: $\geq 97\%$

Lot #: C2211392

SKU #: R396582

Version: 2

Analysis #: 065947

Storage Temperature: Room temperature

Parameter	Limit Values	Result
Specific Rotation $[\alpha]_{20/D}(c=0.5 \text{ in CHCl}_3)$	-195--175 ($^{\circ}$)	-194.88000 $^{\circ}$
Purity(HPLC)	97-100 (%)	97.51010 %
Proton NMR spectrum	Conforms to structure	Conforms to Structure



John Su
QA & QC Manager