

## Certificate of Analysis

Date of Testing: 2023-02-16 13:08:25  
Date of Next Testing: 2027-02-15 13:08:25  
Product Name: **N-Fmoc-L-glutamic acid 5-methyl ester**  
CAS Number: 145038-50-2  
Specifications & Purity:  $\geq 97.0\%$   
Lot #: B2309638  
SKU #: **F140154**  
Analysis: **139929**

Parameter	Limit Values	Result
Specific Rotation $[\alpha]_{20/D}(c=2 \text{ in MeOH})$	-15--9 ( $^{\circ}$ )	-10.42 $^{\circ}$
Purity	97-100 (%)	99.42 %
Appearance (F140154)	white powder or solid	white powder or solid
Infrared spectrum	Conforms to Structure	Conforms to Structure
Proton NMR spectrum	Conforms to Structure	Conforms to Structure



John Su  
QA & QC Manager