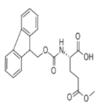


## Certificate of Analysis

Product: Fmoc-L-Glutamic acid gamma-methyl ester

M.Wt: 383.39

Formula: C21H21NO6 CAS No.: 145038-50-2 Batch Number: 20190301



Tests	Specifications	Results
Appearance	White powder	Complies
Purity(HPLC)	≥98%	99.68%
TLC	≥98%	>98%
Element analysis(C、H、N)	≤5.0%	<5.0%
Melting Point	110-120℃	117.3-117.6℃
Specific Rotation[α] D	-12 °±3°(C=2 in MeOH)	-10.6°(C=2 in MeOH)
Clarity of solution	0.3 gram in 2ml MeOH Clear solution	Complies
Water Content(K.F.)	≤1.0%	0.27%
Loss on drying	≤1.0%(50°C,2h)	0.18%
IR Spectrum	In accordance with the structure	Complies
Mass Spectrum	In accordance with the structure	Complies
NMR Spectrum	In accordance with the structure	Complies

Conclusion: Complies with In-house standard.

For and on behalf of SHANGHAI BIOCHEMPARTNER CO., LIMITED

Authorized Signature(s)

Kevin



**QA manager**: kexianxun

