



Certificate of Analysis

Thymosin α 1 Acetate

Product Name : Thymosin α 1 Acetate
Mfg. Date : Jan 19, 2024
M.F. : C₁₃₁H₂₁₉N₃₃O₅₇
CAS No. : 62304-98-7 (Free Base)
Sequence : Ser-Asp-Ala-Ala-Val-Asp-Thr-Ser-Ser-Glu-Ile-Thr-Thr-Lys-Asp-Leu-Lys-Glu-Lys-Lys-Glu-Val-Val-Glu-Glu-Ala-Glu-Asn • CH₃COOH

Lot No. : DL8121
Exp. Date : Jan 18, 2027
M.W. : 3168.35
Batch Qty : 190 g

TESTS	SPECIFICATIONS		RESULTS
Appearance	White or almost white crystalline powder		White crystalline powder
Solubility	Soluble in water		Complies
Mass (MS)	3108.28 \pm 1		3108.5
Amino Acid Composition (AAA)	Leu	0.8 – 1.2	1.1
	Ile	0.8 – 1.2	1.1
	Ser	2.4 – 3.6	3.2
	Thr	2.4 – 3.6	3.3
	Val	2.4 – 3.6	3.1
	Ala	2.7 – 3.3	3.0
	Asp	3.4 – 4.6	4.2
	Lys	3.4 – 4.6	4.2
	Glu	5.4 – 6.6	6.1
Peptide Content (N%)	\geq 80.0%		94.4%
Peptide Purity (HPLC) (CP2020)	\geq 98.0%		99.7%
Related Substances (HPLC)	Single Largest Impurity	\leq 1.00%	0.10%
	Total Impurities	\leq 2.00%	0.30%
Water Content (KF)	\leq 10.0%		1.30%
Bacterial Endotoxins (USP2022)	\leq 10 EU/mg		< 10 EU/mg
Microbial Limits (USP2022)	Total Aerobic Microbial Count	\leq 10 ² CFU/g	< 20 CFU/g
	Total Yeast and Mold Count	\leq 10 ² CFU/g	< 20 CFU/g
	<i>E. coli</i>	Absent	Absent
Acetic Acid Content (HPLC)	\leq 15.0%		4.20%
Assay (On Anhydrous and Acetic Acid-Free Basis) (HPLC) (CP2020)	95.0 - 105.0%		100.1%

Conclusion: The product is a synthetic peptide and meets the In-House specifications.
Long Term Storage: Store in a sealed container at 2°C - 8°C in the fridge or in the freezer.
Distributed by Darmerica.

Note: Analytical results transcribed from the original COA provided by Nanjing JaySenYu Biological Technology Co., Ltd (China); Lot No. TA2401008-TA055.

Based on the review of the above information, the lot stands released.

	Name	Title	Signature	Date
Prepared by	Kamlesh Mistry	Quality Manager		05/17/2024
Released by	Faiz Badrudeen	Quality Associate		05/30/2024