



Certificate of Analysis

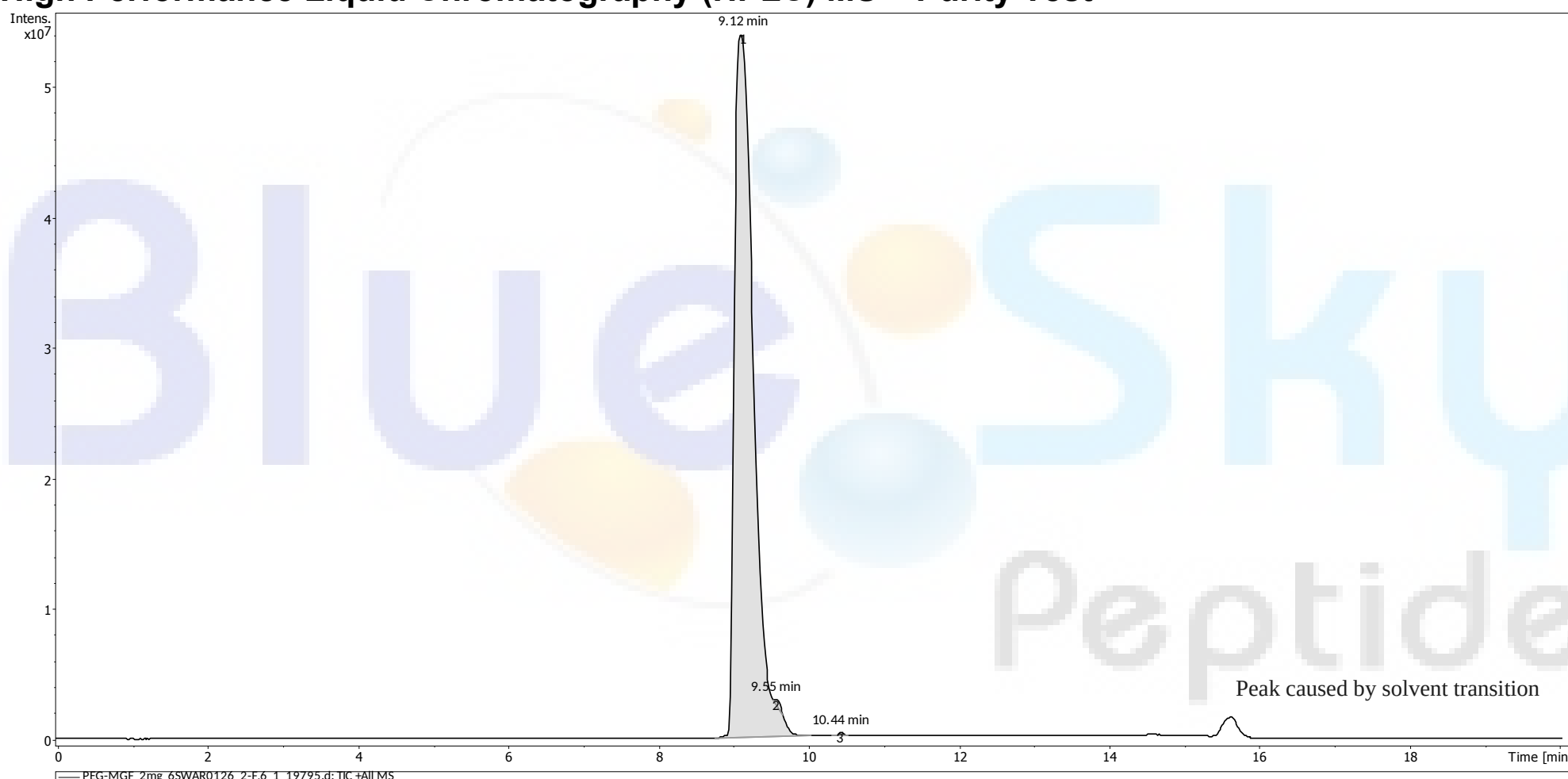
PEG-MGF

pegylated Insulin-like growth factor fragment (IGF-1Ec)

Compound : PEG-MGF
Lot number : 4PUQ0226
Analysis date : 2026-02-10
Purity % : 99.64%
Method : HPLC-MS

Client : Blue Sky Peptide
<https://www.blueskypeptide.com/>

High Performance Liquid Chromatography (HPLC) MS – Purity Test



PEAK LIST		Number of detected peaks: 3		
	Time (min)	Area	%Area	
1	9.12	9.68E+08	99.64	PEG-MGF
2	9.55	2.36E+06	0.24	
3	10.44	1.15E+06	0.12	

Analysis Performed by
Ken Pendarvis, ChE
Analytical Chemist
MZ Biolabs
contact@mzbiolabs.com



2026-02-16

Note: Injectable peptides may contain salts and sugars to aid in solubility and act as pH buffers. These are not normally detected using UV and are not considered impurities.

PEG-MGF

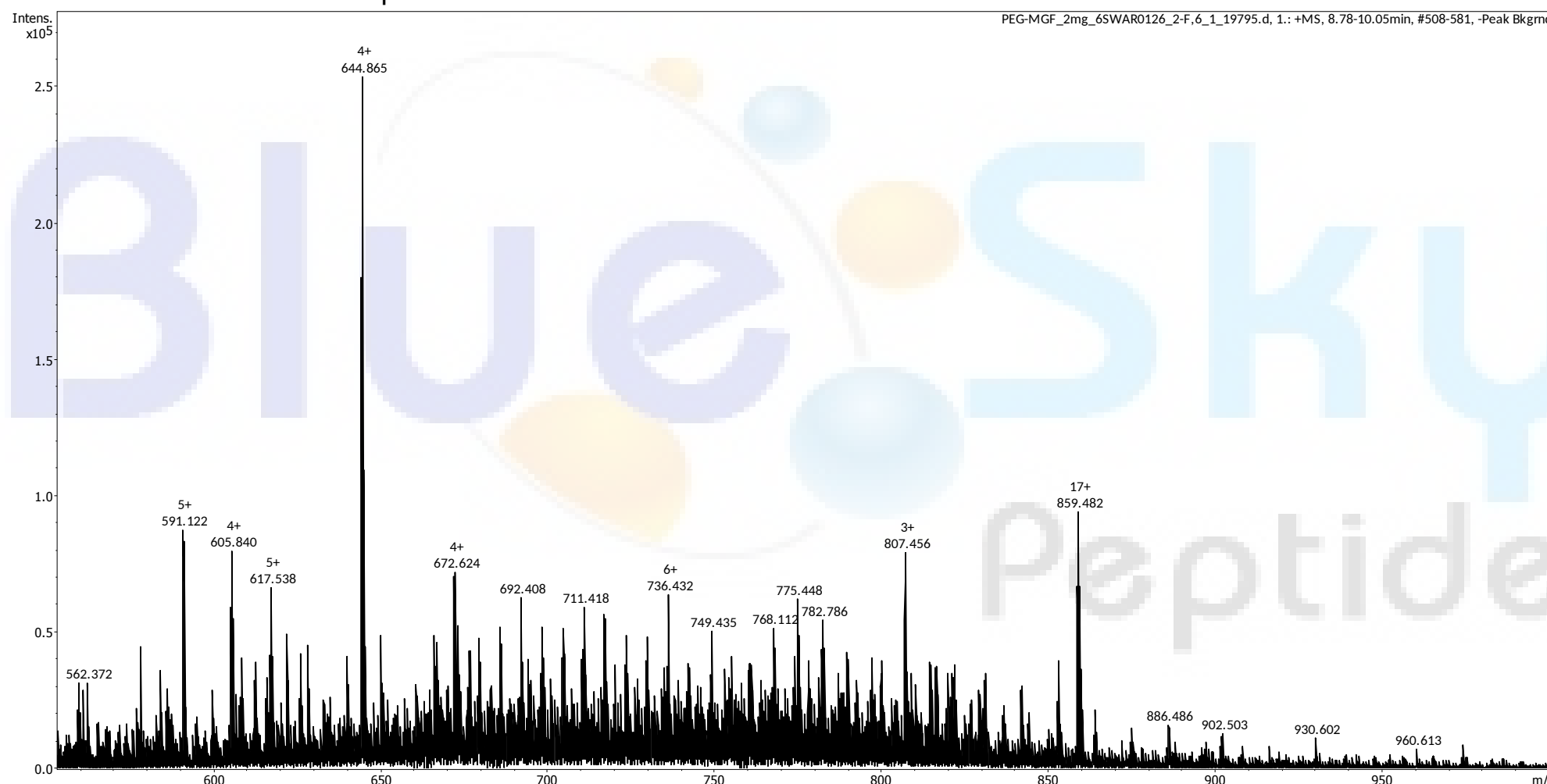
pegylated Insulin-like growth factor fragment (IGF-1Ec)

Mass Spectrometry (MS) – Identity Test

Molecules with PEG added are difficult to interpret. The spectrum below shows 4 large overlapping humps corresponding to different charge states of PEG when ionized (+4, +5, +6, +7). These humps are characteristic of PEG and indicate the MGF is pegylated. This is further confirmed by the m/z spacing corresponding to the 44 Da repeating peg units. This is not shown below because space constraints. MGF is confirmed by the peak of m/z 845 which is unique to MGF and appears when the mass spectrometer provides a slight fragmentation energy to the sample.

Identity Confirmed

Recorded MS spectrum



Analysis Performed by
Ken Pendarvis, ChE
Analytical Chemist
MZ Biolabs
contact@mzbiolabs.com



2026-02-16