

# Human Latent GDF-8 Protein

Cat. No. GDF-HM108

## Description

<b>Source</b>	Recombinant Human Latent GDF-8 Protein is expressed from HEK293 with His tag at the N-terminus. It contains Asn24-Ser375.
<b>Accession</b>	O14793
<b>Molecular Weight</b>	The protein has a predicted MW of 41.19 kDa. Due to glycosylation, the protein migrates to 35-40 kDa and 45-55 kDa based on Tris-Bis PAGE result.
<b>Endotoxin</b>	Less than 1EU per $\mu\text{g}$ by the LAL method.
<b>Purity</b>	> 95% as determined by Tris-Bis PAGE > 95% as determined by HPLC

## Formulation and Storage

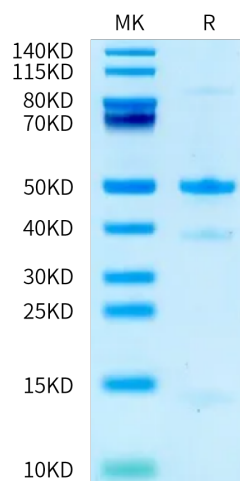
<b>Formulation</b>	Lyophilized from 0.22 $\mu\text{m}$ filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
<b>Reconstitution</b>	Centrifuge the tube before opening. Reconstituting to a concentration more than 100 $\mu\text{g}/\text{ml}$ is recommended. Dissolve the lyophilized protein in distilled water.
<b>Storage</b>	-20 to -80°C for 12 months as supplied from date of receipt. -80°C for 3-6 months after reconstitution. 2-8°C for 2-7 days after reconstitution. Recommend to aliquot the protein into smaller quantities for optimal storage. Please minimize freeze-thaw cycles.

## Background

Growth/differentiation factor 8 (GDF8), or myostatin, negatively regulates muscle mass. GDF8 is held in a latent state through interactions with its N-terminal prodomain. GDF8, like numerous TGF- $\beta$  family members, is a disulfidelinked dimer that is synthesized as a precursor protein which requires cleavage by a furin-like protease to yield an N-terminal prodomain and a C-terminal mature, signaling domain.

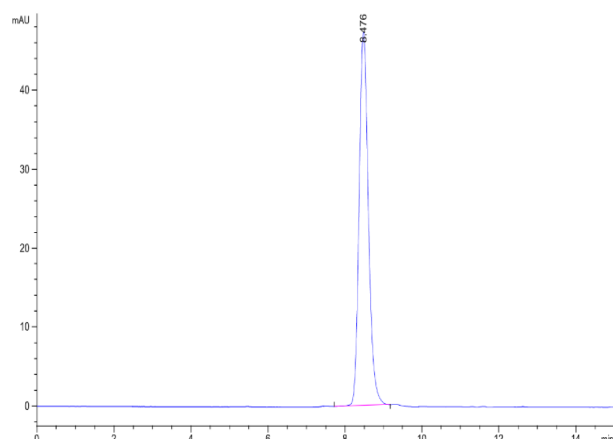
## Assay Data

### Tris-Bis PAGE



Human Latent GDF-8 on Tris-Bis PAGE under reduced condition. The purity is greater than 95%.

### SEC-HPLC



The purity of Human Latent GDF-8 is greater than 95% as determined by SEC-HPLC.