

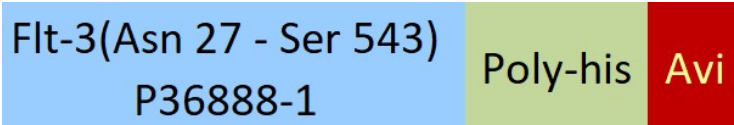
Synonym

Flt-3,Flk-2,STK-1,CD135,FLK2,FLT-3

Source

Biotinylated Human Flt-3, His,Avitag(FL3-H82E3) is expressed from human 293 cells (HEK293). It contains AA Asn 27 - Ser 543 (Accession # [P36888-1](#)).

Molecular Characterization



This protein carries a polyhistidine tag at the C-terminus, followed by an Avi tag (Avitag™).

The protein has a calculated MW of 62.1 kDa. The protein migrates as 80-100 kDa when calibrated against [Star Ribbon Pre-stained Protein Marker](#) under reducing (R) condition (SDS-PAGE) due to glycosylation.

Labeling

*Biotinylation of this product is performed using Avitag™ technology. Briefly, the single lysine residue in the Avitag is enzymatically labeled with biotin.*

Protein Ratio

Passed as determined by the HABA assay / binding ELISA.

Purity

>90% as determined by SDS-PAGE.

>90% as determined by SEC-MALS.

Formulation

Lyophilized from 0.22 µm filtered solution in PBS, pH7.4 with trehalose as protectant.

Contact us for customized product form or formulation.

Reconstitution

Please see Certificate of Analysis for specific instructions.

*For best performance, we strongly recommend you to follow the reconstitution protocol provided in the CoA.*

Storage

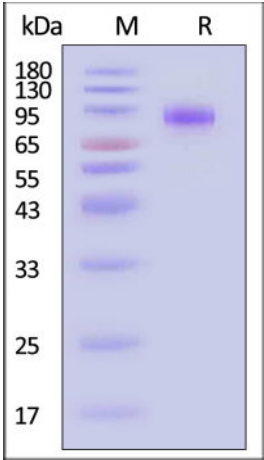
For long term storage, the product should be stored at lyophilized state at -20°C or lower.

*Please avoid repeated freeze-thaw cycles.*

This product is stable after storage at:

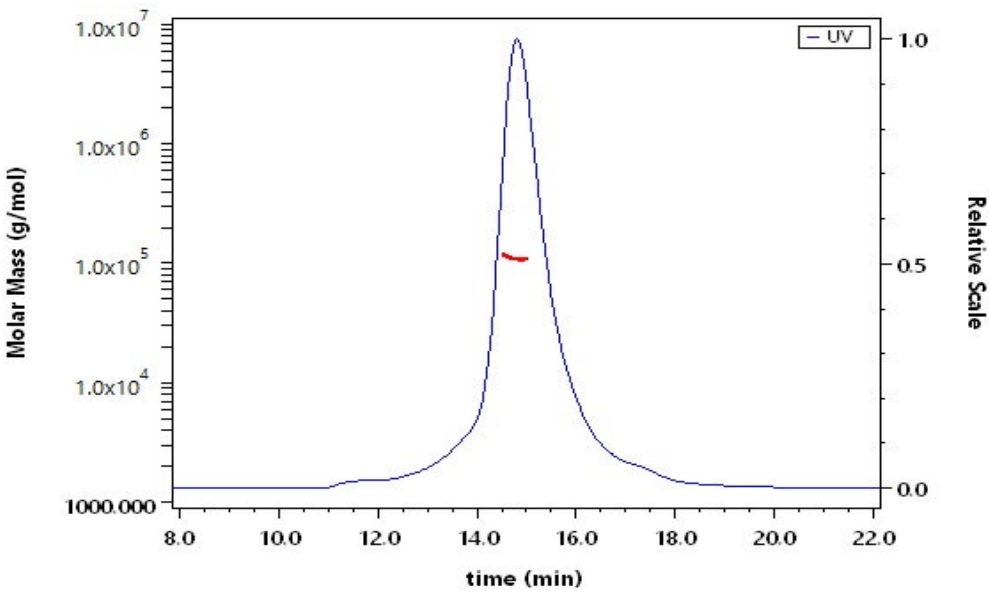
- 20°C to -70°C for 12 months in lyophilized state;
- 70°C for 3 months under sterile conditions after reconstitution.

SDS-PAGE



Biotinylated Human Flt-3, His,Avitag on SDS-PAGE under reducing (R) condition. The gel was stained with Coomassie Blue. The purity of the protein is greater than 90% (With [Star Ribbon Pre-stained Protein Marker](#)).

SEC-MALS

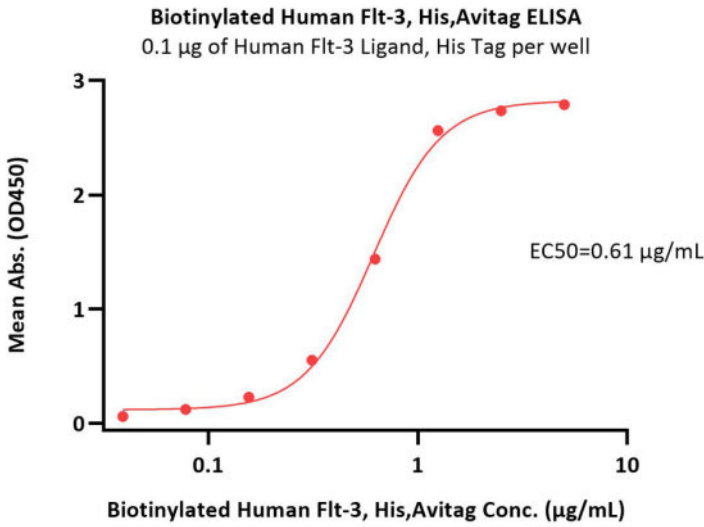


The purity of Biotinylated Human Flt-3, His,Avitag (Cat. No. FL3-H82E3) is more than 90% and the molecular weight of this protein is around 80-110 kDa verified by SEC-MALS.

[Report](#)

Bioactivity-ELISA





Immobilized Human Flt-3 Ligand, His Tag (Cat. No. FLL-H5223) at 1 µg/mL (100 µL/well) can bind Biotinylated Human Flt-3, His,Avitag (Cat. No. FL3-H82E3) with a linear range of 0.039-1.25 µg/mL (QC tested).

Background

Flt-3(Receptor-type tyrosine-protein kinase FLT3) is also known as FLK-2(Fetal liver kinase-2), STK-1(Stem cell tyrosine kinase 1), CD135. FLT3 is a cytokine receptor which belongs to the receptor tyrosine kinase class III. Tyrosine-protein kinase that acts as cell-surface receptor for the cytokine FLT3LG and regulates differentiation, proliferation and survival of hematopoietic progenitor cells and of dendritic cells. Promotes phosphorylation of SHC1 and AKT1, and activation of the downstream effector MTOR. Promotes activation of RAS signaling and phosphorylation of downstream kinases, including MAPK1/ERK2 and/or MAPK3/ERK1. Mutations that cause constitutive kinase activity promote cell proliferation and resistance to apoptosis via the activation of multiple signaling pathways.

