

Synonym

Integrin alpha V beta 6,ITGAV&ITGB6

Source

Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free(IT6-M82W9) is expressed from human 293 cells (HEK293). It contains AA Phe 31 - Val 988 & Gly 22 - Pro 708 (Accession # [P43406-1](#) & [Q9Z0T9-1](#)). Predicted N-terminus: Phe 31 | Gly 22

Molecular Characterization

ITGAV (Phe 31 - Val 988) P43406-1	Acidic Tail	Poly-his	Avi
ITGB6 (Gly 22 - Pro 708) Q9Z0T9-1	Basic Tail		

Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein has a calculated MW of 114.2 kDa (ITGAV) & 80.2 kDa (ITGB6). Subunit ITGAV is fused with an acidic tail at the C-terminus and followed by a polyhistidine tag and subunit ITGB6 contains no tag but a basic tail at the C-terminus. The protein migrates as 80-90 kDa and 135-150 kDa under non-reducing (NR) 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.

Endotoxin

Less than 1.0 EU per µg by the LAL method.

Purity

>95% as determined by SDS-PAGE.

Formulation

Lyophilized from 0.22 µm filtered solution in 50 mM Tris, 150 mM NaCl, pH7.5 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

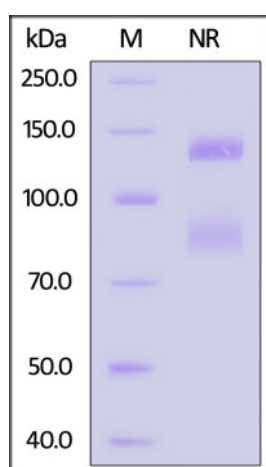
For long term storage, the product should be stored at lyophilized state at -20°C or lower.

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.

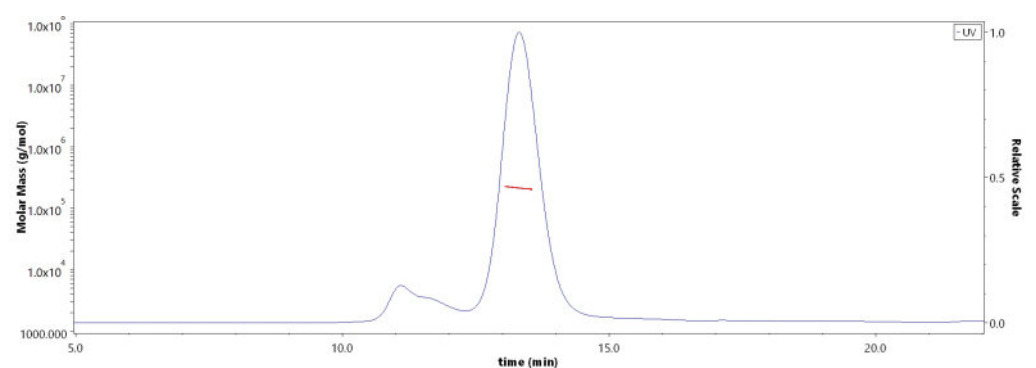
SDS-PAGE



Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free on SDS-PAGE under non-reducing (NR) condition. The gel was stained with Coomassie Blue. The purity of the protein is greater than 95%.

Bioactivity-ELISA

SEC-MALS



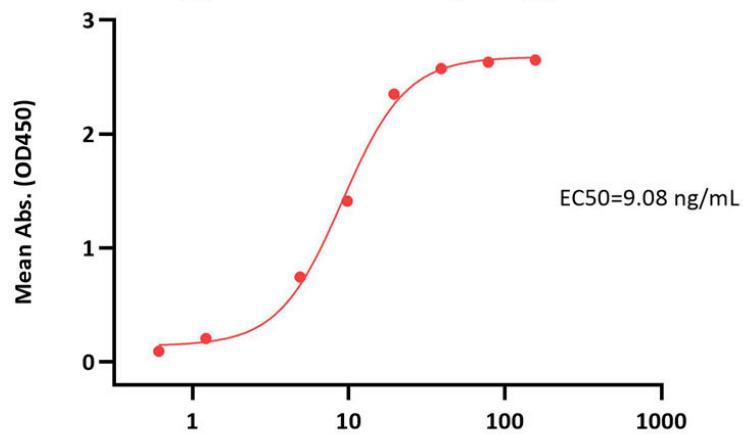
The purity of Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free (Cat. No. IT6-M82W9) is more than 80% and the molecular weight of this protein is around 191-233 kDa verified by SEC-MALS.

[Report](#)

Biotinylated Mouse Integrin alpha V beta 6 (ITGAV&ITGB6) Heterodimer Protein, His,Avitag™ &Tag Free (MALS verified)

Catalog # IT6-M82W9

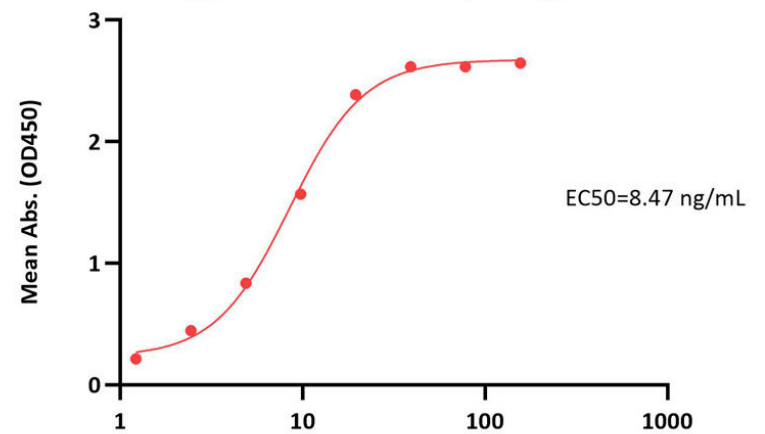
Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free ELISA
0.2 µg of Mouse Latent TGFB1, His Tag per well



Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free Conc. (ng/mL)

Immobilized Mouse Latent TGFB1, His Tag (Cat. No. TG1-M5245) at 2 µg/mL (100 µL/well) can bind Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free (Cat. No. IT6-M82W9) with a linear range of 1-20 ng/mL (QC tested).

Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free ELISA
0.5 µg of Human Latent TGFB1, His Tag per well



Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free Conc. (ng/mL)

Immobilized Human Latent TGFB1, His Tag (Cat. No. TG1-H524x) at 5 µg/mL (100 µL/well) can bind Biotinylated Mouse ITGAV&ITGB6 Heterodimer Protein, His,Avitag&Tag Free (Cat. No. IT6-M82W9) with a linear range of 1-20 ng/mL (Routinely tested).

Background

Integrin alpha V beta 6 is a heterodimer of beta-6 associating with alpha-V. Integrin alpha-V beta-6 is a receptor for fibronectin and cytotactin. It recognizes the sequence R-G-D in its ligands. Internalisation of integrin alpha-V beta-6 via clathrin-mediated endocytosis promotes carcinoma cell invasion. Also, Integrin alpha-V beta-6 acts as a receptor for coxsackievirus A9 and coxsackievirus B1 as well as herpes simplex virus-1/HHV-1. Furthermore, it binds the TGF-beta latency-associated peptide (LAP) and activates TGF-beta 1 or TGF-beta 3 from large latent complexes. This activation requires interaction with LTBP-1 and fibronectin, and is enhanced by PAR-1.

Clinical and Translational Updates

Please contact us via TechSupport@acrobiosystems.com if you have any question on this product.