

Datasheet for ABIN4949120

**ITGAV/ITGB8 Protein (AA 31-992) (His tag)****3** Images[Go to Product page](#)

## Overview

Quantity:	100 µg
Target:	ITGAV/ITGB8
Protein Characteristics:	AA 31-992
Origin:	Human
Source:	HEK-293 Cells
Protein Type:	Recombinant
Biological Activity:	Active
Purification tag / Conjugate:	This ITGAV/ITGB8 protein is labelled with His tag.
Application:	Functional Studies (Func)

## Product Details

Sequence:	AA 31-992
Characteristics:	Human ITGAV & ITGB8 Heterodimer Protein, produced by co-expression of ITGAV and ITGB8, has a calculated MW of 113 kDa (ITGAV) and 75.5 kDa (ITGB8). Subunit ITGAV is fused with polyhistidine tag at the C-terminus and followed by a acidic tail and subunit ITGB8 contains no tag but a basic tail at the C-terminus. The reducing (R) protein migrates as 145 kDa (ITGAV) and 100-116 kDa (ITGB8) respectively due to glycosylation.
Purity:	>95 % as determined by SDS-PAGE.
Endotoxin Level:	Less than 1.0 EU per µg by the LAL method.

## Target Details

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Target: ITGAV/ITGB8

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Alternative Name: Integrin alpha V beta 8 ([ITGAV/ITGB8 Products](#))

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Background: Integrin alpha V beta 8 (ITGAV & ITGB8 or ITGAVB8) is expressed in yolk sac, placenta, brain perivascular astrocytes, Schwann cells, renal glomerular mesangial cells and pulmonary epithelial cells. Unlike other alpha V integrins, ITGAVB8 does not appear to assume different activation states, and the cytoplasmic tail does not connect to the cytoskeleton. It binds ligands containing an RGD motif, including vitronectin, fibrin and the latency associated peptide (LAP) of the latent TGF-beta complex. High affinity binding of alpha V beta 8 to LAP allows proteolytic cleavage by MT1-MMP, which releases active TGF-beta. This mechanism differs from that of alpha V beta 6, the other alpha V integrin which can activate TGF-beta from latency through non-proteolytic mechanisms. Downstream effects of TGF-beta activation include control of cell growth and associated vascularization.

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Molecular Weight: 112.9 kDa (ITGAV) & 76.5 kDa (ITGB8)

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## Application Details

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Restrictions: For Research Use only

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## Handling

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Format: Lyophilized

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Buffer: 50 mM Tris, 100 mM NaCl, pH 8.0

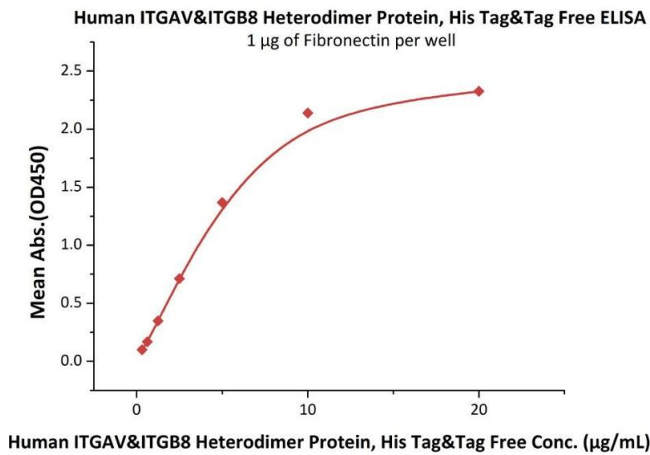
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Handling Advice: Please avoid repeated freeze-thaw cycles.

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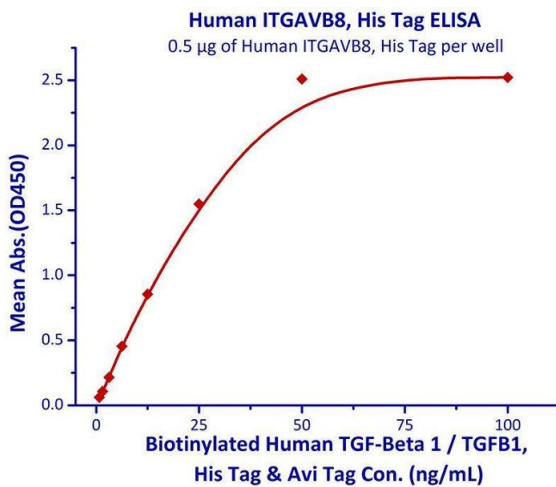
Storage: -20 °C

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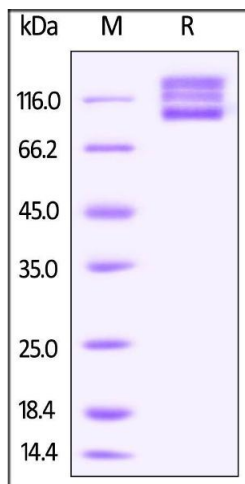


### ELISA

**Image 1.** Immobilized Human Fibronectin at 10 µg/mL (100 µL/well) can bind Human ITGAV&ITGB8 Heterodimer Protein, His Tag&Tag Free (ABIN4949120,ABIN4949121) with a linear range of 0.313-10 µg/mL (Routinely tested).



**Image 2.** Measured by its binding ability in a functional ELISA. Immobilized Human ITGAVB8, His Tag can bind biotinylated Human TGF-Beta 1 / TGFB1, His Tag & Avi Tag with a linear range of 1-25 ng/mL.



### SDS-PAGE

**Image 3.** Human ITGAV & ITGB8 Heterodimer Protein on SDS-PAGE under reducing (R) condition. The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 95%.