

KD-Validated Anti-Integrin alpha 5 Rabbit Monoclonal Antibody
Rabbit monoclonal antibody
Catalog # AGI2306**Specification****KD-Validated Anti-Integrin alpha 5 Rabbit Monoclonal Antibody - Product Information**

Application	WB, FC, ICC
Primary Accession	P08648
Reactivity	Rat, Human, Mouse
Clonality	Monoclonal
Isotype	Rabbit IgG
Calculated MW	Predicted , 115 kDa , observed , 150 kDa
Gene Name	ITGA5
Aliases	ITGA5; Integrin; Alpha 5 (Fibronectin Receptor,Alpha Polypeptide); VLA5A FNRA; CD49e; Fibronectin Receptor Subunit Alpha; Fibronectin Receptor Alpha Subunit; Integrin Alpha-F; Integrin Alpha-5; VLA-5; Very Late Activation Protein 5; Alpha Subunit; CD49 Antigen-Like Family Member E; CD49e Antigen
Immunogen	A synthesized peptide derived from human Integrin alpha 5

KD-Validated Anti-Integrin alpha 5 Rabbit Monoclonal Antibody - Additional Information

Gene ID 3678

Other Names

Integrin alpha-5, CD49 antigen-like family member E, Fibronectin receptor subunit alpha, Integrin alpha-F, VLA-5, CD49e, Integrin alpha-5 heavy chain, Integrin alpha-5 light chain, ITGA5 (http://www.genenames.org/cgi-bin/gene_symbol_report?hgnc_id=6141), FNRA

KD-Validated Anti-Integrin alpha 5 Rabbit Monoclonal Antibody - Protein InformationName ITGA5 ([HGNC:6141](#))

Synonyms FNRA

Function

Integrin alpha-5/beta-1 (ITGA5:ITGB1) is a receptor for fibronectin and fibrinogen. It recognizes the sequence R-G-D in its ligands. ITGA5:ITGB1 binds to PLA2G2A via a site (site 2) which is distinct from the classical ligand-binding site (site 1) and this induces integrin conformational changes and enhanced ligand binding to site 1 (PubMed:[18635536](http://www.uniprot.org/citations/18635536), PubMed:[25398877](http://www.uniprot.org/citations/25398877)). ITGA5:ITGB1 acts as a receptor for fibrillin-1 (FBN1) and mediates R-G-D-dependent cell adhesion to FBN1 (PubMed:

href="http://www.uniprot.org/citations/12807887" target="_blank">12807887, PubMed:17158881). ITGA5:ITGB1 acts as a receptor for fibronectin (FN1) and mediates R-G-D-dependent cell adhesion to FN1 (PubMed:33962943). ITGA5:ITGB1 is a receptor for IL1B and binding is essential for IL1B signaling (PubMed:29030430). ITGA5:ITGB3 is a receptor for soluble CD40LG and is required for CD40/CD40LG signaling (PubMed:31331973).

Cellular Location

Cell membrane; Single-pass type I membrane protein. Cell junction, focal adhesion

Tissue Location

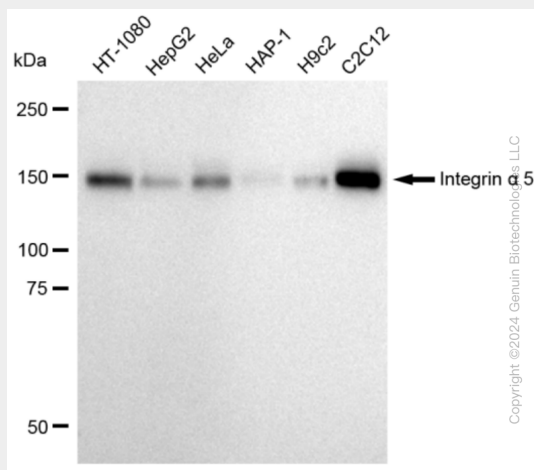
Expressed in placenta (at protein level).

KD-Validated Anti-Integrin alpha 5 Rabbit Monoclonal Antibody - Protocols

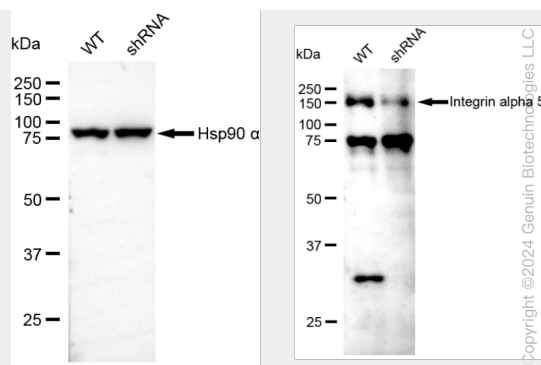
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

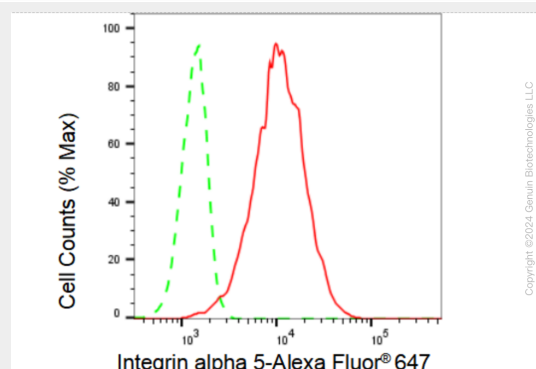
KD-Validated Anti-Integrin alpha 5 Rabbit Monoclonal Antibody - Images



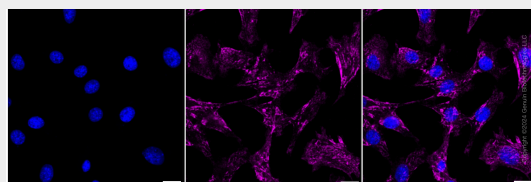
Western blotting analysis using anti-Integrin alpha 5 antibody (Cat#AGI2306). Total cell lysates (30 µg) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with anti-Integrin alpha 5 antibody (Cat#AGI2306, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody respectively.



Western blotting analysis using anti-Integrin alpha 5 antibody (Cat#AGI2306). Integrin alpha 5 expression in wild type (WT) and Integrin alpha 5 shRNA knockdown (KD) HeLa cells with 30 μ g of total cell lysates. β -Tubulin serves as a loading control. The blot was incubated with anti-Integrin alpha 5 antibody (Cat#AGI2306, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody respectively.



Flow cytometric analysis of Integrin alpha 5 expression in C2C12 cells using Integrin alpha 5 antibody (Cat#AGI2306, 1:2,000). Green, isotype control; red, Integrin alpha 5.



Immunocytochemical staining of C2C12 cells with Integrin alpha 5 antibody (Cat#AGI2306, 1:1,000). Nuclei were stained blue with DAPI; Integrin alpha 5 was stained magenta with Alexa Fluor® 647. Images were taken using Leica stellaris 5. Protein abundance based on laser Intensity and smart gain: High. Scale bar: 20 μ m.