

ITGA5 Antibody (Center)
Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP12204c

Specification

ITGA5 Antibody (Center) - Product Information

Application	WB, IHC-P,E
Primary Accession	P08648
Other Accession	P11688 , NP_002196 , Q27977
Reactivity	Human
Predicted	Bovine, Mouse
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Antigen Region	575-602

ITGA5 Antibody (Center) - 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, FNRA

Target/Specificity

This ITGA5 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 575-602 amino acids from the Central region of human ITGA5.

Dilution

WB~~1:1000
IHC-P~~1:10~50

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

ITGA5 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

ITGA5 Antibody (Center) - Protein Information

Name 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](#), PubMed:[25398877](#)). ITGA5:ITGB1 acts as a receptor for fibrillin-1 (FBN1) and mediates R-G-D-dependent cell adhesion to FBN1 (PubMed:[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

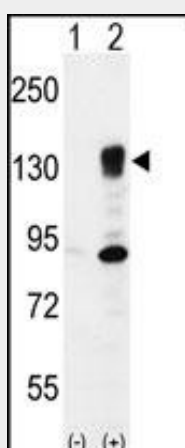
Expressed in placenta (at protein level).

ITGA5 Antibody (Center) - Protocols

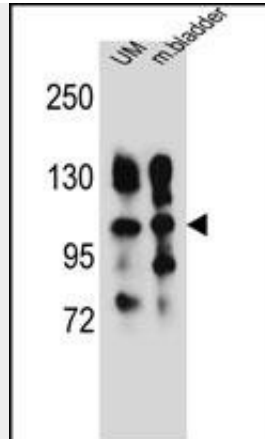
Provided below are standard protocols that you may find useful for product applications.

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

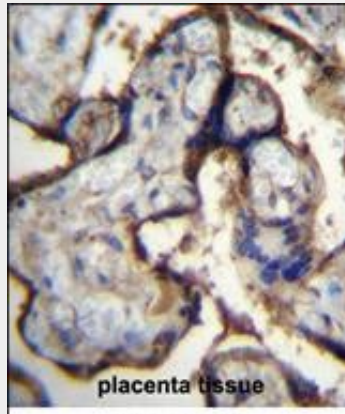
ITGA5 Antibody (Center) - Images



Western blot analysis of ITGA5 (arrow) using rabbit polyclonal ITGA5 Antibody (Center) (Cat. #AP12204c). 293 cell lysates (2 ug/lane) either nontransfected (Lane 1) or transiently transfected (Lane 2) with the ITGA5 gene.



ITGA5 Antibody (Center) (Cat. #AP12204c) western blot analysis in human uterine tumor and mouse bladder tissue lysates (35ug/lane). This demonstrates the ITGA5 antibody detected the ITGA5 protein (arrow).



ITGA5 Antibody (Center) (Cat. #AP12204c) immunohistochemistry analysis in formalin fixed and paraffin embedded human placenta tissue followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of ITGA5 Antibody (Center) for immunohistochemistry. Clinical relevance has not been evaluated.

ITGA5 Antibody (Center) - Background

The product of this gene belongs to the integrin alpha chain family. Integrins are heterodimeric integral membrane proteins composed of an alpha chain and a beta chain. This gene encodes the integrin alpha 5 chain. Alpha chain 5 undergoes post-translational cleavage in the extracellular domain to yield disulfide-linked light and heavy chains that join with beta 1 to form a fibronectin receptor. In addition to adhesion, integrins are known to participate in cell-surface mediated signalling. [provided by RefSeq].

ITGA5 Antibody (Center) - References

- Hutton, M.L., et al. Infect. Immun. 78(11):4523-4531(2010)
- Fang, Z., et al. J. Cell. Biochem. 110(5):1130-1141(2010)
- Lobert, V.H., et al. Dev. Cell 19(1):148-159(2010)
- Caicedo-Carvajal, C.E., et al. PLoS ONE 5 (7), E11830 (2010) :
- Dingemans, A.M., et al. Mol. Cancer 9, 152 (2010) :

ITGA5 Antibody (Center) - Citations

- [Nanoparticle biointerfacing by platelet membrane cloaking.](#)