

Anti-Integrin alpha 5/ITGA5 Antibody Picoband®

Catalog Number: A01911

About ITGA5

Integrin alpha-5, also known as FNRA or VLA5A, is a protein that in humans is encoded by the ITGA5 gene. The product of this gene belongs to the integrin alpha chain family. Integrins are 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.

Overview

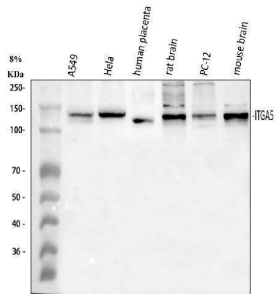
Product Name	Anti-Integrin alpha 5/ITGA5 Antibody Picoband®
Reactive Species	Human, Mouse, Rat
Description	Boster Bio Anti-Integrin alpha 5/ITGA5 Antibody Picoband® catalog # A01911. Tested in ELISA, IHC, WB applications. This antibody reacts with Human, Mouse, Rat. The brand Picoband indicates this is a premium antibody that guarantees superior quality, high affinity, and strong signals with minimal background in Western blot applications. Only our best-performing antibodies are designated as Picoband, ensuring unmatched performance.
Application	ELISA, IHC, WB
Clonality	Polyclonal
Formulation	Each vial contains 4 mg Trehalose, 0.9 mg NaCl and 0.2 mg Na ₂ HPO ₄ .
Storage Instructions	Store at -20°C for one year from date of receipt. After reconstitution, at 4°C for one month. It can also be aliquotted and stored frozen at -20°C for six months. Avoid repeated freeze-thaw cycles.
Host	Rabbit
Uniprot ID	P08648

Technical Details

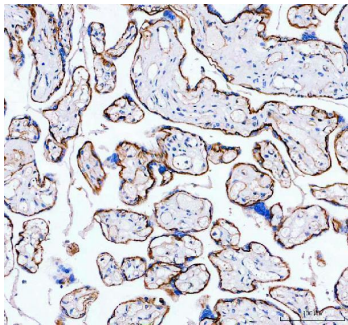
Immunogen	E. coli-derived human Integrin alpha 5 recombinant protein (Position: F42-A263).
Recommended Detection Systems	Boster recommends Enhanced Chemiluminescent Kit with anti-Rabbit IgG (EK1002) for Western blot, and HRP Conjugated anti-Rabbit IgG Super Vision Assay Kit (SV0002-1) for IHC(P).
Cross Reactivity	No cross-reactivity with other proteins.
Isotype	Rabbit IgG
Form	Lyophilized
Concentration	Adding 0.2 ml of distilled water will yield a concentration of 500 ug/ml.

Purification	Immunogen affinity purified.
Suggested Dilutions	Western blot, 0.1-0.5 ug/ml Immunohistochemistry (Paraffin-embedded Section), 2-5 ug/ml ELISA, 0.1-0.5 ug/ml

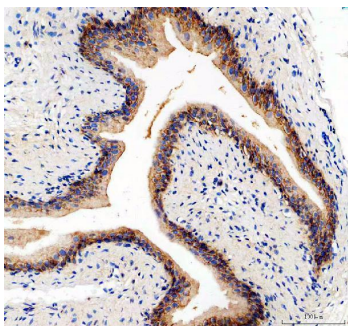
Anti-Integrin alpha 5/ITGA5 Antibody Picoband® (A01911) Images



Western blot analysis of ITGA5 using anti-ITGA5 antibody (A01911). Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel) / 90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 30 ug of sample under reducing conditions. Lane 1: human A549 whole cell lysates, Lane 2: human HeLa whole cell lysates, Lane 3: human placenta tissue lysates, Lane 4: rat brain tissue lysates, Lane 5: rat PC-12 whole cell lysates, Lane 6: mouse brain tissue lysates. After electrophoresis, proteins were transferred to a nitrocellulose membrane at 150 mA for 50-90 minutes. Blocked the membrane with 5% non-fat milk/TBS for 1.5 hour at RT. The membrane was incubated with rabbit anti-ITGA5 antigen affinity purified polyclonal antibody (Catalog # A01911) at 0.5 ug/mL overnight at 4°C, then washed with TBS-0.1%Tween 3 times with 5 minutes each and probed with a goat anti-rabbit IgG-HRP secondary antibody at a dilution of 1:5000 for 1.5 hour at RT. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit (Catalog # EK1002) with Tanon 5200 system. A specific band was detected for ITGA5 at approximately 130 kDa. The expected band size for ITGA5 is at 115 kDa.



IHC analysis of ITGA5 using anti-ITGA5 antibody (A01911). ITGA5 was detected in a paraffin-embedded section of human placenta tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 ug/ml rabbit anti-ITGA5 Antibody (A01911) overnight at 4°C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit (Catalog # SV0002) with DAB as the chromogen.



IHC analysis of ITGA5 using anti-ITGA5 antibody (A01911). ITGA5 was detected in a paraffin-embedded section of rat bladder tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 ug/ml rabbit anti-ITGA5 Antibody (A01911) overnight at 4°C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit (Catalog # SV0002) with DAB as the chromogen.

5 Publications Citing This Product

expression in the atria of patients with rheumatic valvular disease and atrial fibrillation

2. PubMed ID: 19918321, Characterization of Rat Hair Follicle Stem Cells Selected by Vario Magnetic Activated Cell Sorting System

3. PubMed ID: 26680220, Silencing of Paternally Expressed Gene 10 Inhibits Trophoblast Proliferation and Invasion

Visit bosterbio.com/anti-integrin-alpha-5-picoband-trade-antibody-a01911-boster.html to see all 5 publications.

Submit a product review to Biocompare.com

Submit a review of this product to Biocompare.com to receive a \$20 Amazon.com giftcard! Your reviews help your fellow scientists make the right decisions. Thank you for your contribution.



Anti-Integrin alpha 5/ITGA5 Antibody

For Research Use Only. Not for use in diagnostic procedures.