

For Research Use Only

Integrin alpha 1 Monoclonal antibody, PBS Only (Detector)

Catalog Number: 68211-1-PBS



Basic Information

Catalog Number: 68211-1-PBS	GenBank Accession Number: BC137121	Purification Method: Protein A purification
Size: 100ug, Concentration: 1 mg/ml by Nanodrop;	GeneID (NCBI): 3672	CloneNo.: 1C4F2
Source: Mouse	UNIPROT ID: P56199	
Isotype: IgG2a	Full Name: integrin, alpha 1	
Immunogen Catalog Number: AG30631	Calculated MW: 1179 aa, 131 kDa	
	Observed MW: 180 kDa	

Applications

Tested Applications:
WB, IF-P, Cytometric bead array, Indirect ELISA

Species Specificity:
human

Product Information

68211-1-PBS targets Integrin alpha 1 as part of a matched antibody pair:

MP50423-3: 68211-4-PBS capture and 68211-1-PBS detection (validated in Cytometric bead array)

Unconjugated mouse monoclonal antibody pair in PBS only (BSA and azide free) storage buffer at a concentration of 1 mg/mL, ready for conjugation.

This conjugation ready format makes antibodies ideal for use in many applications including: ELISAs, multiplex assays requiring matched pairs, mass cytometry, and multiplex imaging applications. Antibody use should be optimized by the end user for each application and assay.

Background Information

The integrins are a superfamily of cell adhesion receptors that bind to extracellular matrix ligands, cell-surface ligands, and soluble ligands (PMID: 17543136). They are transmembrane $\alpha\beta$ heterodimers and at least 24 distinct integrin heterodimers are formed by the combination of 18 α and eight β known subunits (PMID: 17543136; 20029421). In addition to mediating cell adhesion, integrins also play important roles in modulating signal transduction pathways that control cellular responses including migration, proliferation, differentiation, and apoptosis (PMID:19118207). Integrin alpha-1 (ITGA1, CD49a) combines with the beta 1 subunit (ITGB1, CD29) to form a cell-surface receptor for collagen and laminin. This receptor is involved in cell-cell adhesion and may play a role in inflammation and fibrosis. Integrin alpha-1 is a transmembrane glycoprotein with an apparent molecular weight of 180-250 kDa, larger than the calculated molecular weight of 131 kDa (PMID: 2475259; 3257425; 11557277; 18840653).

Storage

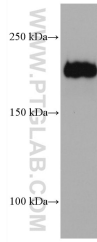
Storage:
Store at -80°C.

Storage Buffer:
PBS Only

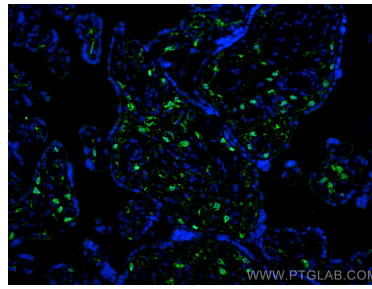
For technical support and original validation data for this product please contact:
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)
E: proteintech@ptglab.com
W: ptglab.com

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.

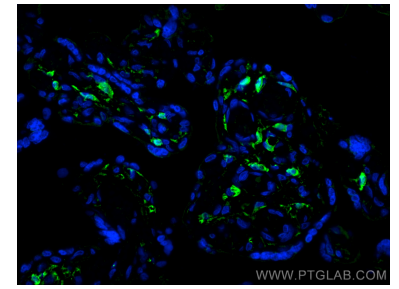
Selected Validation Data



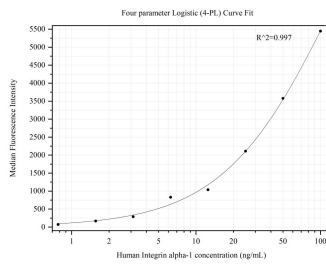
HepG2 cells were subjected to SDS PAGE followed by western blot with 68211-1-Ig (Integrin alpha-1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 68211-1-PBS in a different storage buffer formulation.



Immunofluorescent analysis of (4% PFA) fixed paraffin-embedded human placenta tissue using Integrin alpha 1 antibody (68211-1-Ig, Clone: 1C4F2) at dilution of 1:400 and Multi-rAb Coralite ® Plus 488-Goat Anti-Mouse Recombinant Secondary Antibody (H+L) (RGAM002). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 68211-1-PBS in a different storage buffer formulation.



Immunofluorescent analysis of (4% PFA) fixed paraffin-embedded human placenta tissue using Integrin alpha 1 antibody (68211-1-Ig, Clone: 1C4F2) at dilution of 1:400 and Multi-rAb Coralite ® Plus 488-Goat Anti-Mouse Recombinant Secondary Antibody (H+L) (RGAM002). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 68211-1-PBS in a different storage buffer formulation.



Cytometric bead array standard curve of MP50423-3, Integrin alpha-1 Monoclonal Matched Antibody Pair, PBS Only. Capture antibody: 68211-4-PBS. Detection antibody: 68211-1-PBS. Standard: Ag30631. Range: 0.781-100 ng/mL