

For Research Use Only

COL6A3-Specific Recombinant antibody, PBS Only (Capture)

Catalog Number: 83010-3-PBS



Basic Information

Catalog Number: 83010-3-PBS	GenBank Accession Number: NM_004369	Purification Method: Protein A purification
Size: 100ug, Concentration: 1 mg/ml by Nanodrop;	GeneID (NCBI): 1293	CloneNo.: 230540D3
Source: Rabbit	UNIPROT ID: P12111	
Isotype: IgG	Full Name: collagen, type VI, alpha 3	
Immunogen Catalog Number: AG34752	Calculated MW: 344 kDa	
	Observed MW: 343 kDa	

Applications

Tested Applications:
FC (Intra), Cytometric bead array, Indirect ELISA

Species Specificity:
human

Product Information

83010-3-PBS targets COL6A3-Specific as part of a matched antibody pair:

MP00027-1: 83010-3-PBS capture and 83010-4-PBS detection (validated in Cytometric bead array)

Unconjugated rabbit recombinant monoclonal antibody in PBS only (BSA and azide free) storage buffer at a concentration of 1 mg/mL, ready for conjugation. Created using Proteintech's proprietary in-house recombinant technology. Recombinant production enables unrivalled batch-to-batch consistency, easy scale-up, and future security of supply.

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

COL6A3 belongs to the type VI collagen family. Collagen VI acts as a cell-binding protein. It is expected to be expressed in smooth muscle. And the calculated molecular weight of COL6A3 is 343 kDa. The protein has similar expression in obese and T2DM (2 patients, and it regulates the chemotaxis and inflammation of macrophages in adipose tissue. Its expression is also related to weight gain. The expression of this protein in adipocytes is related to insulin resistance, which is believed to depend on PPAR (peroxisome proliferator-activated receptor) α -mediated adipocyte development (PMID: 25337653). Defects in COL6A3 are a cause of Bethlem myopathy (BM). Defects in COL6A3 are a cause of Ullrich congenital muscular dystrophy (UCMD) which also known as Ullrich scleroatonic muscular dystrophy. This antibody is specific to COL6A3.

Storage

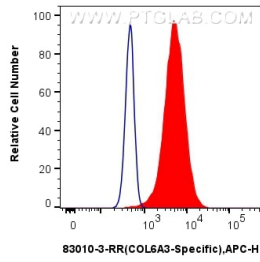
Storage:
Store at -80°C.

Storage Buffer:
100% PBS pH 7.3

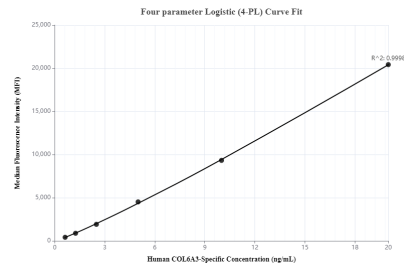
For technical support and original validation data for this product please contact:
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA) E: proteintech@ptglab.com W: ptglab.com

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

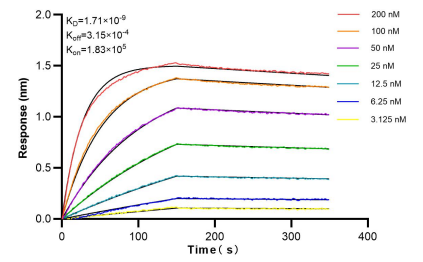
Selected Validation Data



1x10⁶ HeLa cells were intracellularly stained with 0.25 ug Col6a3-Specific Recombinant Antibody (83010-3-RR, Clone:230540D3) and APC-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) (red), or 0.25 ug Isotype Control (blue). Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C). This data was developed using the same antibody clone with 83010-3-PBS in a different storage buffer formulation.



Cytometric bead array standard curve of MP00027-1, COL6A3-Specific Recombinant Matched Antibody Pair, PBS Only. Capture antibody: 83010-3-PBS. Detection antibody: 83010-4-PBS. Standard: Ag34752. Range: 0.625-20 ng/mL.



Bi-layer interferometry (BLI) kinetic assays of 83010-3-RR against Human COL6A3-Specific were performed. The affinity constant is 1.71 nM.