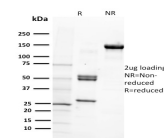


# CD29 Monoclonal Mouse Antibody (12G10)



## Product Description

Recognizes CD29. Binds to the cell membrane of T- and B- lymphocytes, monocytes, platelets, fibroblasts, endothelial cells, mast cells and smooth muscle cells. CD29 is an adhesion receptor and co-stimulatory molecule. This antigen was initially characterized as GPIIa on platelets and as the common b1 subunit of the very late antigen (VLA) protein family. CD29 forms a non-covalent heterodimeric complex with integrin alpha subunits. It also mediates adhesion to invasion and thrombospondin.

Primary antibodies are available purified, or with a selection of fluorescent CF® dyes and other labels. CF® dyes offer exceptional brightness and photostability. See the [CF® Dye Brochure](#) for more information. Note: Conjugates of blue fluorescent dyes like CF®405S and CF®405M are not recommended for detecting low abundance targets, because blue dyes have lower fluorescence and can give higher non-specific background than other dye colors.

**Stock status:** Because Biotium offers a large number of antibody and conjugation options, primary antibody conjugates may be made to order. Typical lead times are up to one week for CF® dye and biotin conjugates, and up to 2-3 weeks for fluorescent protein and enzyme conjugates. Please email [order@biotium.com](mailto:order@biotium.com) to inquire about stock status and lead times before placing your order.

**Catalog number key for antibody number 2905, Anti-CD29 (12G10)**

## Product attributes

Antibody number	#2905
Antibody reactivity (target)	CD29
Antibody type	Primary
Host species	Mouse
Clonality	Monoclonal
Clone	12G10
Isotype	IgG1, kappa
Molecular weight	110 kDa (non-reduced) & 130 kDa (reduced)
Synonyms	Fibrinogen Receptor beta subunit; FNRR; Glycoprotein IIa (GPIIa); Integrin beta-1 (ITGB1); integrin VLA-4 beta subunit; MDF2; MSK12; Very Late Activation Protein beta Polypeptide; VLA-4 subunit beta; VLA-BETA; VLAB
Human gene symbol	ITGB1
Entrez gene ID	3688
SwissProt	P05556
Unigene	643813
Immunogen	Purified human beta 1 integrin from HT1080 fibrosarcoma cell extract.
Antibody target cellular localization	Plasma membrane
Species reactivity	Human
Expected antibody applications	Flow, surface (published for clone), Functional studies (published for clone), IF (published for clone), IP (published for clone)
Antibody application notes	Does not react with Mouse or Rat; ELISA: For coating use Ab at 1-5 ug/mL, order Ab without BSA; Optimal dilution for a specific application should be determined by user., Higher concentration may be required for direct detection using primary antibody conjugates than for indirect detection with secondary antibody
Positive control	HT1080 whole cell lysate. HeLa cell line.
Shipping condition	Room temperature
Storage Conditions	Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C
Regulatory status	For research use only (RUO)
Antibody/conjugate formulation	Conjugates: 0.1 mg/mL in PBS/0.1% BSA/0.05% azide, HRP conjugates: 0.1 mg/mL in PBS/0.05% BSA, Purified: 0.2 mg/mL in PBS/0.05% BSA/0.05% azide, Purified, BSA-free: 1 mg/mL in PBS without azide
Shelf life	Guaranteed for at least 24 months from date of receipt when stored as recommended
Product origin	Product may contain either bovine serum albumin (BSA) from bovine serum (Bos taurus), or recombinant BSA produced in Chinese hamster ovary cells. Inquire for the specific lot.
Cell/tissue expression	Platelets, Endothelial cells, Fibroblasts, Lymphocytes, Mast cells, Monocytes/macrophages, Smooth muscle

Antibody # prefix	Conjugation	Ex/Em (nm)	Laser line	Detection channel	Dye Features
BNC04	CF®405S	404/431	405	DAPI (microscopy), AF405	<a href="#">CF®405S Features</a>
BNC88	CF®488A	490/515	488	GFP, FITC	<a href="#">CF®488A Features</a>
BNC68	CF®568	562/583	532, 561	RFP, TRITC	<a href="#">CF®568 Features</a>
BNC94	CF®594	593/614	561	Texas Red®	<a href="#">CF®594 Features</a>
BNC40	CF®640R	642/662	633-640	Cy®5	<a href="#">CF®640R Features</a>
BNC47	CF®647	650/665	633-640	Cy®5	<a href="#">CF®647 Features</a>
BNC74	CF®740	742/767	633-685	775/50	<a href="#">CF®740 Features</a>
BNCB	Biotin	N/A	N/A	N/A	
BNUB	Purified	N/A	N/A	N/A	
BNUM	Purified, BSA-free	N/A	N/A	N/A	

Alexa Fluor, Pacific Blue, Pacific Orange, and Texas Red are trademarks or registered trademarks of Thermo Fisher Scientific; Cy is a registered trademark of Cytiva; IRDye, LI-COR, and Odyssey are registered trademarks of LI-COR Bioscience.

## References

Note: References for this clone sold by other suppliers may be listed for expected applications.

1. FEBS Lett (1995) 363: 118-122. (functional studies)
2. J Cell Sci (2005) 118: 4009-4016. (IP)
3. Traffic (2012) 13: 610-625. (Flow, IF)