

CD50 Monoclonal Mouse Antibody (101-1D2)



Product Description

Recognizes an N-glycosylated glycoprotein of 120 kDa with intra-chain disulfide bonds, identified as CD50 or ICAM-3 (WS: IV & V). Its epitope localizes in the D2 extracellular domain and is resistant to neuraminidase and proteases. CD50 is the major ligand for LFA-1 (CD11a/CD18) and may have signalling role to increase adhesion. It is expressed on thymocytes and T lymphocytes and is resistant to treatment with phosphatidylinositol (PI) phospholipase C. This MAb inhibits primary mixed lymphocyte culture (MLC) but not secondary MLC, cytotoxicity or proliferation induced by mitogens. It blocks binding of NK1-L16 stimulated T cells to L cells expressing CD50. This MAb is excellent for staining of formalin/paraffin tissues.

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 to inquire about stock status and lead times before placing your order.

Catalog number key for antibody number 0177, Anti-CD50 (101-1D2)

Call us: 800-304-5357 Email: techsupport@biotium.com

Product attributes

Cell/tissue expression

Product attributes				
Antibody number	#0177			
Antibody reactivity (target)	CD50			
Antibody type	Primary			
Host species	Mouse			
Clonality	Monoclonal			
Clone	101-1D2			
Isotype	IgG2a, kappa			
Molecular weight	110-160 kDa			
Synonyms	ICAMR; Intercellular adhesion molecule 3 (ICAM3)			
Human gene symbol	ICAM3			
Entrez gene ID	3385			
SwissProt	P32942			
Unigene	354563			
Immunogen	Stimulated human leukocytes			
Antibody target cellular localization	Plasma membrane			
Species reactivity	Human			
Expected antibody applications	ELISA (published for clone), Flow, surface (published for clone), Functional studies (published for clone)			
Antibody application notes	Higher concentration may be required for direct detection using primary antibody conjugates than for indirect detection with secondary antibody, Immunofluorescence: 0.5-1 ug/mL, Immunohistology formalin-fixed 0.5-1 ug/mL, Staining of formalin/paraffin tissues requires boiling tissue sections in 10 mM citrate buffer, pH 6.0, for 10-20 min followed by cooling at RT for 20 min, Flow Cytometry 0.5-1 ug/million cells/0.1 mL, Optimal dilution for a specific application should be determined by user			
Positive control	HL-60 or THP-1 cells. Lymph node and tonsil			
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			
Shelf life	Guaranteed for at least 24 months from date of receipt when stored as recommended			
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/m in PBS/0.05% BSA/0.05% azide, Purified, BSA-free: 1 mg/mL PBS without azide			
Antibody research areas	Immunology			
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.			

Lymphocytes, T-cells

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

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References

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

- Knapp, W. et. al. Leucocyte Typing IV, p541, 667-670, 1087, Oxford Univ. Press, 1989.
 Schlossman SF, et. al. Leucocyte Typing V, p1542-1547, 2011, Oxford Univ. Press, 1993.
 Eur J Immunol (1993) 23: 1508-1512. (IP, Flow)
 Eur J Immunol (1994) 24: 1377-1382. (functional studies)
 J of Immunol (1995) 154(6):3015-24. (ELISA)

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