

Datasheet: MCA1075B

BATCH NUMBER 0215

Description:	MOUSE ANTI HUMAN CD32:Biotin		
Specificity:	CD32		
Other names:	FcRII		
Format:	Biotin		
Product Type:	Monoclonal Antibody		
Clone:	AT10		
Isotype:	IgG1		
Quantity:	0.1 mg		

Product Details

Applications

Stabilisers

This product has been reported to work in the following applications. This information is derived from testing within our laboratories, peer-reviewed publications or personal communications from the originators. Please refer to references indicated for further information. For general protocol recommendations, please visit www.bio-rad-antibodies.com/protocols.

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry	-			Neat

Where this antibody has not been tested for use in a particular technique this does not necessarily exclude its use in such procedures. Suggested working dilutions are given as a guide only. It is recommended that the user titrates the antibody for use in their own system using appropriate negative/positive controls.

Target Species	Human
Species Cross Reactivity	Reacts with: Dog, Rhesus Monkey, Pig N.B. Antibody reactivity and working conditions may vary between species. Cross reactivity is derived from testing within our laboratories, peer-reviewed publications or personal communications from the originators. Please refer to references indicated for further information.
Product Form	Purified IgG conjugated to Biotin - liquid
Preparation	Purified IgG prepared by affinity chromatography on Protein A
Buffer Solution	Phosphate buffered saline
Preservative	0.09% Sodium Azide

Approx. Protein Concentrations IgG concentration 0.1 mg/ml K562 cell line.

External Database Links

UniProt:

P12318 Related reagentsP31994 Related reagentsP31995 Related reagents

Entrez Gene:

2212 FCGR2A Related reagents
 2213 FCGR2B Related reagents
 9103 FCGR2C Related reagents

Synonyms

CD32, FCG2, FCGR2A1, IGFR2

RRID

AB_323091

Fusion Partners

Spleen cells from immunised BALB/c mice were fused with cells of the mouse NS1 myeloma cell line.

Specificity

Mouse anti Human CD32 antibody, clone AT10 recognizes the human CD32 antigen, a ~40 kDa glycoprotein that acts as a low affinity receptor for IgG (also known as Fc gamma RII). CD32 mediates several functions including endocytosis, activation of secretion, cytotoxicity and immunomodulation. CD32 is expressed by B cells, monocytes, granulocytes and platelets.

Mouse anti Human CD32 antibody, clone AT10 blocks the binding of IgG to Fc gamma RII (<u>Larsson et al. 1997</u>).

Flow Cytometry

Use 10ul of the suggested working dilution to label 10⁶ cells or 100ul whole blood

References

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- 4. Mold, C. and Du Clos, T.W. (2006) C-reactive protein increases cytokine responses to *Streptococcus pneumoniae* through interactions with Fc gamma receptors. <u>J Immunol.</u> 176: 7598-604.
- 5. Dutertre, C.A. et al. (2008) A novel subset of NK cells expressing high levels of

inhibitory FcgammaRIIB modulating antibody-dependent function. <u>J Leukoc Biol. 84 (6):</u> 1511-20.

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- 8. Benitez-Ribas, D. *et al.* (2006) Plasmacytoid dendritic cells of melanoma patients present exogenous proteins to CD4+ T cells after Fc gamma RII-mediated uptake. <u>J Exp Med.</u> 203: 1629-35.
- 9. Zhao, X.W. *et al.* (2011) CD47-signal regulatory protein-α (SIRPα) interactions form a barrier for antibody-mediated tumor cell destruction. <u>Proc Natl Acad Sci U S A. 108 (45):</u> 18342-7.
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- 12. Santer, D.M. *et al.* (2010) C1q deficiency leads to the defective suppression of IFN-alpha in response to nucleoprotein containing immune complexes. <u>J Immunol. 185:</u> 4738-49.
- 13. Shannon, O. *et al.* (2010) Platelet activation and biofilm formation by *Aerococcus urinae*, an endocarditis-causing pathogen. Infect Immun. 78: 4268-75.
- 14. Ito, T. *et al.* (1999) A CD1a+/CD11c+ subset of human blood dendritic cells is a direct precursor of Langerhans cells. <u>J Immunol. 163: 1409-19.</u>
- 15. Moreira, M.L. *et al.* (2016) Vaccination against canine leishmaniosis increases the phagocytic activity, nitric oxide production and expression of cell activation/migration molecules in neutrophils and monocytes. Vet Parasitol. 220: 33-45.
- 16. Gazendam, R.P. *et al.* (2016) Impaired killing of *Candida albicans* by granulocytes mobilized for transfusion purposes: a role for granule components. <u>Haematologica. 101</u> (5): 587-96.
- 17. Liu M *et al.* (2011) Vitellogenin mediates phagocytosis through interaction with FcγR. Mol Immunol. 49 (1-2): 211-8.
- 18. Petersson, F. *et al.* (2018) Platelet activation and aggregation by the opportunistic pathogen *Cutibacterium* (*Propionibacterium*) *acnes*. <u>PLoS One.</u> 13 (1): e0192051.
- 19. Kahn, F. *et al.* (2008) Antibodies against a surface protein of *Streptococcus pyogenes* promote a pathological inflammatory response. <u>PLoS Pathog. 4 (9): e1000149.</u>
- 20. Bruggeman, C.W. *et al.* (2019) Tissue-specific expression of IgG receptors by human macrophages *ex vivo*. PLoS One. 14 (10): e0223264.
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Storage

Store at +4°C or at -20°C if preferred.

This product should be stored undiluted.

Storage in frost-free freezers is not recommended. Avoid repeated freezing and thawing

as this may denature the antibody. Should this product contain a precipitate we recommend microcentrifugation before use.

Guarantee	12 months from date of despatch
Health And Safety Information	Material Safety Datasheet documentation #10041 available at: https://www.bio-rad-antibodies.com/SDS/MCA1075B 10041
Regulatory	For research purposes only

Related Products

Recommended Useful Reagents

HUMAN SEROBLOCK (BUF070A) HUMAN SEROBLOCK (BUF070B)

North & South Tel: +1 800 265 7376 America

Worldwide

Tel: +44 (0)1865 852 700 Fax: +44 (0)1865 852 739 Europe Tel: +49 (0) 89 8090 95 21

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To find a batch/lot specific datasheet for this product, please use our online search tool at: bio-rad-antibodies.com/datasheets 'M364734:200529'

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