

Datasheet: MCA1258F BATCH NUMBER 1701

Description:	RAT ANTI MOUSE CD45R:FITC		
Specificity:	CD45R		
Other names:	B220, LY-5		
Format:	FITC		
Product Type:	Monoclonal Antibody		
Clone:	RA3-6B2		
Isotype:	lgG2a		
Quantity:	0.1 mg		

Product Details

Applications	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 <u>www.bio-rad-antibodies.com/protocols</u> .				
		Yes No	Not Determined	Suggested Dilution	
	Flow Cytometry	•		Neat - 1/10	
	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	Mouse				
Species Cross Reactivity	Reacts with: Human, Cat 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 conjugate	d to Fluorescein Isot	niocyanate Isomer 1 (F	ITC) - liquid.	
Max Ex/Em	Fluorophore FITC	Excitation Max (nm) 490	Emission Max (nm) 525		
Preparation	Purified IgG prepared supernatant	by affinity chromatog	raphy on Protein G fror	n tissue culture	

Buffer Solution	Phosphate buffered saline	
Preservative Stabilisers	0.09% Sodium Azide 1% Bovine Serum Albumin	
Approx. Protein Concentrations	IgG concentration 0.1 mg/ml	
Immunogen	Murine leukemia-induced pre-B tumor cells (RAW112)	
External Database Links	UniProt: P06800 Related reagents Entrez Gene: 19264 Ptprc Related reagents	
Synonyms	Ly-5	
RRID	AB_321417	
Fusion Partners	Spleen cells from immunized Lewis rats were fused with cells of the rat S194/5 XX0.BU- myeloma cell line	1
Specificity	Rat anti Mouse CD45R antibody, clone RA3-6B2 recognizes murine CD45R, a form of the CD45 antigen expressed by B cells and lytically active subsets of NK cells and non-MHC restricted CTL's. Rat anti Mouse CD45R antibody, clone RA3-6B2 immunoprecipitates the high molecular weight form of CD45 (220 kDa).	f
	Rat anti Mouse CD45R antibody, clone RA3-6B2 is suitable for plp fixed paraffin embedded tissues (<u>Whiteland <i>et al</i>.1995</u>).	
Flow Cytometry	Use 10ul of the suggested working dilution to label 10 ⁶ cells in 100ul.	
	The Fc region of monoclonal antibodies may bind non-specifically to cells expressing lov affinity Fc receptors. This may be reduced by using SeroBlock FcR (<u>BUF041A/B</u>).	V
References	 Coffman, R.L. (1982) Surface antigen expression and immunoglobulin gene rearrangement during mouse pre-B cell development. <u>Immunol Rev. 69: 5-23.</u> Rosmalen, J.G. <i>et al.</i> (2000) Subsets of macrophages and dendritic cells in nonobese diabetic mouse pancreatic inflammatory infiltrates: correlation with the development of diabetes. <u>Lab Invest. 80 (1): 23-30.</u> Whiteland, J.L. <i>et al.</i> (1995) Immunohistochemical detection of T-cell subsets and othe leukocytes in paraffin-embedded rat and mouse tissues with monoclonal antibodies. <u>J Histochem Cytochem. 43 (3): 313-20.</u> Spangrude, G.J. <i>et al.</i> (1988) Purification and characterization of mouse hematopoieti stem cells. <u>Science. 241: 58-62.</u> Spangrude, G.J. <i>et al.</i> (1988) Two rare populations of mouse Thy-1lo bone marrow 	ər

cells repopulate the thymus. J Exp Med. 167 (5): 1671-83.

6. Holmes, K.L. *et al.* (1986) Analysis of neoplasms induced by Cas-Br-M MuLV tumor extracts. J Immunol. 137 (2): 679-88.

7. Ankeny, D.P. *et al.* (2009) B cells produce pathogenic antibodies and impair recovery after spinal cord injury in mice. <u>J Clin Invest. 119: 2990-9.</u>

8. Lundqvist, J. *et al.* (2010) Concomitant infection decreases the malaria burden but escalates relapsing fever borreliosis. <u>Infect Immun. 78 (5): 1924-30.</u>

9. Herrmann, I. *et al.* (2006) Streptococcus pneumoniae Infection aggravates experimental autoimmune encephalomyelitis via Toll-like receptor 2. <u>Infect Immun. 74: 4841-8.</u>

10. Kleiter, I. *et al.* (2010) Smad7 in T cells drives T helper 1 responses in multiple sclerosis and experimental autoimmune encephalomyelitis. <u>Brain. 133: 1067-81.</u>

11. Lacroix-Lamande, S. *et al.* (2009) Neonate intestinal immune response to CpG oligodeoxynucleotide stimulation. <u>PLoS One. 4: e8291.</u>

12. Bertilaccio, M.T. *et al.* (2011) Lack of TIR8/SIGIRR triggers progression of chronic lymphocytic leukemia in mouse models. <u>Blood. 118: 660-9.</u>

13. Gengozian, N. *et al.* (2005) Characterization of a monoclonal antibody identifying a CD45RA antigen on feline leukocytes. <u>Vet Immunol Immunopathol. 108: 253-64.</u>

 Giuriato, S. *et al.* (2010) Conditional TPM3-ALK and NPM-ALK transgenic mice develop reversible ALK-positive early B-cell lymphoma/leukemia. <u>Blood. 115: 4061-70.</u>
 Hawke, S. *et al.* (1998) Long-term persistence of activated cytotoxic T lymphocytes after viral infection of the central nervous system. J Exp Med. 187: 1575-82.

16. Nakaya, T. *et al.* (2010) Critical role of Pcid2 in B cell survival through the regulation of MAD2 expression. J Immunol. 185: 5180-7.

 Perry, M.J. *et al.* (2000) Effects of high-dose estrogen on murine hematopoietic bone marrow precede those on osteogenesis. <u>Am J Physiol Endocrinol Metab. 279: E1159-65.</u>
 Gibson-Corley, K.N. *et al.* (2016) A method for histopathological study of the multifocal nature of spinal cord lesions in murine experimental autoimmune encephalomyelitis. PeerJ. 4: e1600.

19. Soejima, M. *et al.* (2011) Role of innate immunity in a murine model of histidyl-transfer RNA synthetase (Jo-1)-mediated myositis. <u>Arthritis Rheum. 63: 479-87.</u>

20. Stevenson, P.G. *et al.* (2002) Uncoupling of virus-induced inflammation and anti-viral immunity in the brain parenchyma. <u>J Gen Virol. 83: 1735-43.</u>

21. Fanning, S. *et al.* (2012) Bifidobacterial surface-exopolysaccharide facilitates commensal-host interaction through immune modulation and pathogen protection. <u>Proc</u> <u>Natl Acad Sci U S A. 109 (6): 2108-13.</u>

22. Ruf, M.T. *et al.* (2012) Chemotherapy-Associated Changes of Histopathological Features of Mycobacterium ulcerans Lesions in a Buruli Ulcer Mouse Model. <u>Antimicrob Agents Chemother. 56: 687-96.</u>

23. Carpenter, R.S. *et al.* (2015) Traumatic spinal cord injury in mice with human immune systems. <u>Exp Neurol. 271: 432-44.</u>

24. Lastrucci, C. *et al.* (2015) Molecular and cellular profiles of the resolution phase in a damage-associated molecular pattern (DAMP)-mediated peritonitis model and revelation of leukocyte persistence in peritoneal tissues. <u>FASEB J. 29 (5): 1914-29.</u>

25. Thiele, L.S.N. *et al.* (2020) Functional relevance of the multi-drug transporter abcg2 on teriflunomide therapy in an animal model of multiple sclerosis. <u>J Neuroinflammation. 17</u> (<u>1): 9.</u>

Storage	Store at +4°C for one month or at -20°C for longer.
	This product should be stored undiluted. This product is photosensitive and should be protected from light.
	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/MCA1258F
Regulatory	For research purposes only

Related Products

Recommended Negative Controls

RAT IgG2a NEGATIVE CONTROL:FITC (MCA1212F)

Product inquiries: www.bio-rad-antibodies.com/technical-support

To find a batch/lot specific datasheet for this product, please use our online search tool at: bio-rad-antibodies.com/datasheets 'M365004:200529'

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