

Datasheet: MCA771G

Description:	RAT ANTI MOUSE Ly-6B.2 ALLOANTIGEN
Specificity:	Ly-6B.2 ALLOANTIGEN
Format:	Purified
Product Type:	Monoclonal Antibody
Clone:	7/4
Isotype:	IgG2a
Quantity:	0.25 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 www.bio-rad-antibodies.com/protocols.

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry	▪			1/50 - 1/100
Immunohistology - Frozen	▪			
Immunohistology - Paraffin	▪			
ELISA			▪	
Immunoprecipitation			▪	
Western Blotting	▪			
Immunofluorescence	▪			

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 their own system using appropriate negative/positive controls.

Target Species	Mouse
Product Form	Purified IgG - liquid
Preparation	Purified IgG prepared by affinity chromatography on Protein G from tissue culture supernatant
Buffer Solution	Phosphate buffered saline
Preservative Stabilisers	0.09% Sodium Azide
Carrier Free	Yes

Approx. Protein Concentrations	IgG concentration 1.0 mg/ml
Immunogen	Cultured bone marrow cells
RRID	AB_322950
Fusion Partners	Spleen cells from AO rats were fused with cells from the Y3 Ag1.2.3 rat myeloma cell line.
Specificity	<p>Rat anti Mouse Ly-6B.2 monoclonal antibody, clone 7/4 recognizes the Ly-6B.2 antigen. Ly-6B.2 is a ~25-30 kDa GPI-anchored, heavily glycosylated protein expressed on neutrophils, inflammatory monocytes and some activated macrophages (Rosas et al. 2010). High levels of expression are seen in bone marrow, spleen, lung and lymph nodes. N-glycanase treatment of thioglycollate elicited peritoneal neutrophil lysates lowers the apparent molecular weight of Ly-6B.2 to ~15 kDa (Rosas et al. 2010).</p> <p>In common with other Ly-6 antigens Ly-6B.2 demonstrates a polymorphic expression on inbred mouse strains (Kimura et al. 1984). Rat anti mouse Ly-6B.2, clone 7/4 recognizes the Ly-6B.2 antigen in 129J; AKR; C57BL/6; C57BL/10; C58; DBA/2; NZB; NZW; SJL; MFI; Swiss (PO) Strains whilst A2G; A/Sn; ASW; BALB/c; C3H/HEH; CBA.T6T6 are negative or demonstrate very weak reactivity (Hirsch and Gordon 1982).</p> <p>Rat anti mouse Ly-6B.2 has been successfully used for the immunomagnetic depletion of neutrophils during the enrichment of primitive hematopoietic cells from bone marrow (Bertoncello et al. 1991) and the depletion of myeloid cells <i>in vivo</i> (Rosas et al. 2010).</p>
Flow Cytometry	Use 10ul of the suggested working dilution to label 10 ⁶ cells in 100ul.
References	<ol style="list-style-type: none"> Rosas, M. <i>et al.</i> (2010) The myeloid 7/4-antigen defines recently generated inflammatory macrophages and is synonymous with Ly-6B. J Leukoc Biol. 88 (1): 169-80. Gordon, S. <i>et al.</i> (1992) Antigen markers of macrophage differentiation in murine tissues. Curr Top Microbiol Immunol. 181: 1-37. Word, R.A. <i>et al.</i> (2005) Transgene insertion on mouse chromosome 6 impairs function of the uterine cervix and causes failure of parturition. Biol Reprod. 73 (5): 1046-56. Locke, L.W. (2009) A novel neutrophil-specific PET imaging agent: cFLFLFK-PEG-64Cu. J Nucl Med. 50: 790-7. Allam, R. <i>et al.</i> (2011) Cyclic Polypeptide and Aminoglycoside Antibiotics Trigger IL-1{beta} Secretion by Activating the NLRP3 Inflammasome. J Immunol. 186: 2714-8. Holt, R. <i>et al.</i> (2011) The Molecular Mechanisms of Cervical Ripening Differ between Term and Preterm Birth. Endocrinology. 152: 1036-46. Frossard, J.L. <i>et al.</i> (2011) Role of CCL-2, CCR-2 and CCR-4 in cerulein-induced acute pancreatitis and pancreatitis-associated lung injury. J Clin Pathol. 64: 387-93. McDonald, J.U. <i>et al.</i> (2011) <i>In vivo</i> functional analysis and genetic modification of in vitro-derived mouse neutrophils. FASEB J. 25: 1972-82. Larmonier, C.B. <i>et al.</i> (2011) NHE3 modulates the severity of colitis in IL-10-deficient mice. Am J Physiol Gastrointest Liver Physiol. 300: G998-G1009. Yellon, S.M. <i>et al.</i> (2011) Remodeling of the cervix and parturition in mice lacking the progesterone receptor B isoform. Biol Reprod. 85: 498-502.

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Storage	Store at +4°C. DO NOT FREEZE. This product should be stored undiluted. 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 #10040 available at: 10040: https://www.bio-rad-antibodies.com/uploads/MSDS/10040.pdf
Regulatory	For research purposes only

Related Products

Recommended Secondary Antibodies

Rabbit Anti Rat IgG (STAR17...) [FITC](#)

Goat Anti Rat IgG (STAR69...)	FITC
Goat Anti Rat IgG (STAR131...)	Alk. Phos., Biotin
Goat Anti Rat IgG (STAR73...)	RPE
Rabbit Anti Rat IgG (STAR21...)	HRP
Rabbit Anti Rat IgG (STAR16...)	DyLight®800
Goat Anti Rat IgG (MOUSE ADSORBED) (STAR71...)	DyLight®800
Goat Anti Rat IgG (STAR72...)	HRP

Recommended Negative Controls

[RAT IgG2a NEGATIVE CONTROL \(MCA1212\)](#)

North & South America	Tel: +1 800 265 7376 Fax: +1 919 878 3751 Email: antibody_sales_us@bio-rad.com	Worldwide	Tel: +44 (0)1865 852 700 Fax: +44 (0)1865 852 739 Email: antibody_sales_uk@bio-rad.com	Europe	Tel: +49 (0) 89 8090 95 21 Fax: +49 (0) 89 8090 95 50 Email: antibody_sales_de@bio-rad.com
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