

Datasheet: MCA2782

BATCH NUMBER 166846

Description:	RAT ANTI MOUSE Ly-6A/E
Specificity:	Ly-6A/E
Other names:	Sca-1
Format:	Purified
Product Type:	Monoclonal Antibody
Clone:	D7
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	▪			
Immunohistology - Frozen	▪			
Immunohistology - Paraffin			▪	
ELISA			▪	
Immunoprecipitation	▪			
Western Blotting	▪			

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
Product Form	Purified IgG - liquid
Preparation	Purified IgG prepared from ascites or tissue culture supernatant
Buffer Solution	Borate buffered saline
Preservative Stabilisers	<0.1% Sodium Azide (NaN ₃)

Approx. Protein Concentrations	IgG concentration 0.5mg/ml
Immunogen	IL-2-dependent mouse T cell line CTL-L.
External Database Links	<p>UniProt: P05533 Related reagents</p> <p>Entrez Gene: 110454 Ly6a Related reagents</p>
Synonyms	Ly6
RRID	AB_1102736
Specificity	<p>Rat anti Mouse Ly-6A/E antibody, clone D7 recognizes members of the lymphocyte activation protein-6 (Ly-6) multi-gene family. Specifically, it recognizes Ly-6A.2 and Ly-6E.1. Ly-6A/E is also known as stem cell antigen-1 (Sca-1). It is an 18kDa mouse glycosyl phosphatidylinositol-anchored cell surface protein of the Ly-6 gene family. It is expressed on multipotent hematopoietic stem cells in bone marrow of mice with both the Ly-6.1 and Ly-6.2 allotypes. As such, it is the most common marker used for enriching adult hematopoietic stem cells. It has varied functions, it plays a role in bone formation, myoblast proliferation and differentiation and the activation and immunosuppressive function of T cells.</p> <p>Rat anti Mouse Ly-6A/E antibody, clone D7 has been reported to induce T cell activation. Removal of sodium azide is recommended prior to use in functional assays.</p>
References	<ol style="list-style-type: none"> Ortega, G. <i>et al.</i> (1986) Role of Ly-6 in lymphocyte activation. I. Characterization of a monoclonal antibody to a nonpolymorphic Ly-6 specificity. J Immunol. 137 (10): 3240-6. Malek, T.R. <i>et al.</i> (1986) Role of Ly-6 in lymphocyte activation. II. Induction of T cell activation by monoclonal anti-Ly-6 antibodies. J Exp Med. 164 (3): 709-22. Codias, E.K. <i>et al.</i> (1990) Down-regulation of IL-2 production by activation of T cells through Ly-6A/E. J Immunol. 145 (5): 1407-14. Snapper, C.M. <i>et al.</i> (1991) Cross-linkage of Ly-6A/E induces Ca²⁺ translocation in the absence of phosphatidylinositol turnover and mediates proliferation of normal murine B lymphocytes. J Immunol. 147 (4): 1171-9.
Further Reading	<ol style="list-style-type: none"> Holmes, C. & Stanford, W.L. (2007) Concise review: stem cell antigen-1: expression, function, and enigma. Stem Cells. 25 (6): 1339-47.
Storage	<p>This product is shipped at ambient temperature. It is recommended to aliquot and store at -20°C on receipt. When thawed, aliquot the sample as needed. Keep aliquots at 2-8°C for short term use (up to 4 weeks) and store the remaining aliquots at -20°C.</p> <p>Avoid repeated freezing and thawing as this may denature the antibody. Storage in frost-free freezers is not recommended.</p>

Guarantee 12 months from date of despatch

Health And Safety Information Material Safety Datasheet documentation #10077 available at:
<https://www.bio-rad-antibodies.com/SDS/MCA2782>
10077

Regulatory For research purposes only

Related Products

Recommended Secondary Antibodies

Goat Anti Rat IgG (MOUSE ADSORBED) (STAR71...) [DyLight@550](#), [DyLight@650](#), [DyLight@800](#)

Rabbit Anti Rat IgG (STAR21...) [HRP](#)

Rabbit Anti Rat IgG (STAR16...) [DyLight@800](#)

Goat Anti Rat IgG (STAR131...) [Alk. Phos.](#), [Biotin](#)

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

Goat Anti Rat IgG (STAR72...) [HRP](#)

Goat Anti Rat IgG (STAR69...) [FITC](#)

Goat Anti Rat IgG (STAR73...) [RPE](#)

Recommended Negative Controls

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

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