

Datasheet: MCA799F

BATCH NUMBER 163149

Description:	MOUSE ANTI RABBIT CD4:FITC
Specificity:	CD4
Format:	FITC
Product Type:	Monoclonal Antibody
Clone:	KEN-4
Isotype:	IgG2a
Quantity:	100 TESTS

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	▪			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	Rabbit								
Species Cross Reactivity	Reacts with: Brown Hare (<i>Lepus europeus</i>) 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 Fluorescein Isothiocyanate Isomer 1 (FITC) - liquid								
Max Ex/Em	<table><tr><th>Fluorophore</th><th>Excitation Max (nm)</th><th>Emission Max (nm)</th></tr><tr><td>FITC</td><td>490</td><td>525</td></tr></table>	Fluorophore	Excitation Max (nm)	Emission Max (nm)	FITC	490	525		
Fluorophore	Excitation Max (nm)	Emission Max (nm)							
FITC	490	525							
Preparation	Purified IgG prepared by affinity chromatography on Protein A from tissue culture supernatant								
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	Rabbit thymocytes.
External Database Links	<p>UniProt: P46630 Related reagents</p> <p>Entrez Gene: 100009152 CD4 Related reagents</p>
RRID	AB_2075555
Fusion Partners	Spleen cells from immunized mice were fused with cells of the mouse PAI myeloma cell line.
Specificity	<p>Mouse anti Rabbit CD4 antibody, clone KEN-4 recognizes the rabbit CD4 cell surface antigen, also known as T-cell surface antigen T4/Leu-3. Rabbit CD4 is a 434 amino acid, with an additional N-terminal signal peptide ~50 kDa cell surface single pass, type I transmembrane glycoprotein expressed by T helper cells.</p> <p>Mouse anti Rabbit CD4 antibody, clone KEN-4 blocks the allogeneic mixed lymphocyte reaction response.</p>
Flow Cytometry	Use 10ul of the suggested working dilution to label 10 ⁶ cells or 100ul whole blood.
References	<ol style="list-style-type: none"> Perosa, F. and Dammacco, F. (1994) Anti-idiotypic monoclonal antibodies (mAb) to an anti-CD4 mAb induce CD4+ T cell depletion in rabbit. Int J Clin Lab Res. 24: 208-12. Renaux, S. <i>et al.</i> (2003) Dynamics and responsiveness of T-lymphocytes in secondary lymphoid organs of rabbits developing immunity to <i>Eimeria intestinalis</i>. Vet Parasitol. 110 (3-4): 181-95. Dewals, B. <i>et al.</i> (2008) Malignant catarrhal fever induced by alcelaphine herpesvirus 1 is associated with proliferation of CD8+ T cells supporting a latent infection. PLoS ONE 3: e1627. Pakandl, M. <i>et al.</i> (2008) Dependence of the immune response to coccidiosis on the age of rabbit suckling. Parasitol Res. 103 (6): 1265-71. Yang, J. <i>et al.</i> (2009) Expression and localization of rabbit B-cell activating factor (BAFF) and its specific receptor BR3 in cells and tissues of the rabbit immune system. Dev Comp Immunol. 33 (5): 697-708. Chentoufi, A.A. <i>et al.</i> (2010) A novel HLA (HLA-A*0201) transgenic rabbit model for preclinical evaluation of human CD8+ T cell epitope-based vaccines against ocular herpes. J Immunol. 184: 2561-71. Rütgen, B.C. <i>et al.</i> (2014) Exploratory assessment of CD4+ T lymphocytes in brown hares (<i>Lepus europeus</i>) using a cross-reactive anti-rabbit CD4 antibody. Vet Immunol

[Immunopathol. 161 \(1-2\): 108-15.](#)

8. Parameswaran, N. *et al.* (2014) The A2 gene of alcelaphine herpesvirus-1 is a transcriptional regulator affecting cytotoxicity in virus-infected T cells but is not required for malignant catarrhal fever induction in rabbits. [Virus Res. 188: 68-80.](#)
9. Boutard, B. *et al.* (2015) The $\alpha 2,3$ -sialyltransferase encoded by myxoma virus is a virulence factor that contributes to immunosuppression. [PLoS One. 10 \(2\): e0118806.](#)
10. Khan, A.A. *et al.* (2015) Therapeutic immunization with a mixture of herpes simplex virus 1 glycoprotein D-derived “asymptomatic” human CD8+ T-cell epitopes decreases spontaneous ocular shedding in latently infected HLA transgenic rabbits: association with low frequency of local PD-1+ TIM-3+ CD8+ exhausted T cells. [J Virol. 89 \(13\): 6619-32.](#)
11. Myser, F. *et al.* (2015) Viral semaphorin inhibits dendritic cell phagocytosis and migration but is not essential for gammaherpesvirus-induced lymphoproliferation in malignant catarrhal fever. [J Virol. 89 \(7\): 3630-47.](#)
12. Beghelli, D *et al.* (2016) Effects of Oregano (*Origanum vulgare* L.) and Rosemary (*Rosmarinus officinalis* L.) Aqueous Extracts On *in vitro* Rabbit Immune Responses [MOJ Immunology. 4 \(4\) \[Epub ahead of print\].](#)
13. Sorel, O. *et al.* (2017) Macavirus latency-associated protein evades immune detection through regulation of protein synthesis in cis depending upon its glycine/glutamate-rich domain. [PLoS Pathog. 13 \(10\): e1006691.](#)
14. Penadés, M. *et al.* (2018) Long-term implications of feed energy source in different genetic types of reproductive rabbit females. II. Immunologic status. [Animal. 12 \(9\): 1877-85.](#)
15. Jeklova, E. *et al.* (2020) Characterization of humoral and cell-mediated immunity in rabbits orally infected with *Encephalitozoon cuniculi*. [Vet Res. 51 \(1\): 79.](#)
16. Niedźwiedzka-Rystwej, P. *et al.* (2020) B and T lymphocytes in rabbits change according to the sex and throughout the year. [Pol J Vet Sci. 23 \(1\): 37-42.](#)
17. Muñoz-Silvestre, A. *et al.* (2020) Pathogenesis of Intradermal Staphylococcal Infections: Rabbit Experimental Approach to Natural *Staphylococcus aureus* Skin Infections. [Am J Pathol. 190 \(6\): 1188-1210.](#)
18. Largo, R.D. *et al.* (2020) VEGF Over-Expression by Engineered BMSC Accelerates Functional Perfusion, Improving Tissue Density and In-Growth in Clinical-Size Osteogenic Grafts. [Front Bioeng Biotechnol. 8: 755.](#)
19. Niedźwiedzka-Rystwej, P. *et al.* (2022) Reactivity of selected markers of innate and adaptive immunity in rabbits experimentally infected with antigenic variants of RHD (Lagovirus europaeus/GI.1a). [Vet Res Commun. 46 \(1\): 233-42.](#)
20. Dewals, B.G. & Vanderplasschen, A. (2011) Malignant catarrhal fever induced by Alcelaphine herpesvirus 1 is characterized by an expansion of activated CD3+CD8+CD4- T cells expressing a cytotoxic phenotype in both lymphoid and non-lymphoid tissues. [Vet Res. 42 \(1\): 95.](#)
21. Li, H. *et al.* (2011) Characterization of ovine herpesvirus 2-induced malignant catarrhal fever in rabbits. [Vet Microbiol. 150 \(3-4\): 270-7.](#)

Storage

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.

Avoid repeated freezing and thawing as this may denature the antibody. Storage in

frost-free freezers is not recommended. This product is photosensitive and should be protected from light.

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/MCA799F 10041
--------------------------------------	--

Regulatory	For research purposes only
-------------------	----------------------------

Related Products

Recommended Negative Controls

[MOUSE IgG2a NEGATIVE CONTROL:FITC \(MCA929F\)](#)

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
----------------------------------	---	------------------	---	---------------	---

To find a batch/lot specific datasheet for this product, please use our online search tool at: bio-rad-antibodies.com/datasheets
'M385337:210513'

Printed on 26 Jun 2024