

Datasheet: MCA1226A488T

**BATCH NUMBER 164921**

<b>Description:</b>	MOUSE ANTI HUMAN CD8:Alexa Fluor® 488
<b>Specificity:</b>	CD8
<b>Format:</b>	ALEXA FLUOR® 488
<b>Product Type:</b>	Monoclonal Antibody
<b>Clone:</b>	LT8
<b>Isotype:</b>	IgG1
<b>Quantity:</b>	25 TESTS/0.25ml

## 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](http://www.bio-rad-antibodies.com/protocols).

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry	▪			Neat - 1/10

Where this product 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 product for use in their own system using appropriate negative/positive controls.

### Target Species

Human

### Species Cross Reactivity

Reacts with: Marmoset, Chimpanzee, Cynomolgus monkey, Red-bellied Tamarin  
**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 Alexa Fluor® 488 - liquid

### Max Ex/Em

Fluorophore	Excitation Max (nm)	Emission Max (nm)
Alexa Fluor®488	495	519

### Preparation

Purified IgG prepared by ion exchange chromatography from ascites

### Buffer Solution

Phosphate buffered saline

<b>Preservative Stabilisers</b>	0.09% sodium azide (NaN <sub>3</sub> ) 1% bovine serum albumin
<b>Approx. Protein Concentrations</b>	IgG concentration 0.05 mg/ml
<b>Immunogen</b>	Normal human peripheral blood lymphocytes.
<b>External Database Links</b>	<p><b>UniProt:</b></p> <p><a href="#">P01732</a>   <a href="#">Related reagents</a></p> <p><a href="#">P10966</a>   <a href="#">Related reagents</a></p> <p><b>Entrez Gene:</b></p> <p><a href="#">925</a>   CD8A   <a href="#">Related reagents</a></p> <p><a href="#">926</a>   CD8B   <a href="#">Related reagents</a></p>
<b>Synonyms</b>	CD8B1, MAL
<b>Fusion Partners</b>	Spleen cells from immunised BALB/c mice were fused with cells of the mouse X63.653 myeloma cell line.
<b>Specificity</b>	<p><b>Mouse anti Human CD8 antibody, clone LT8</b> recognizes the human CD8 cell surface glycoprotein expressed by a subset of peripheral blood T cells which express cytotoxic/suppressor activity. It is also expressed weakly on NK cells.</p> <p>The CD8 antigen is a co-receptor for MHC Class I in conjunction with the T cell receptor, and is important in the selection process of CD8+ MHC Class I restricted T cells.</p>
<b>Flow Cytometry</b>	Use 10µl of the suggested working dilution to label 10 <sup>6</sup> cells or cells or 100µl human whole blood
<b>References</b>	<ol style="list-style-type: none"> <li>1. Zarkesh-Esfahani, H. <i>et al.</i> (2001) High-dose leptin activates human leukocytes via receptor expression on monocytes. <a href="#">J Immunol. 167 (8): 4593-9.</a></li> <li>2. Manninen, A. &amp; Saksela, K. (2002) HIV-1 Nef interacts with inositol trisphosphate receptor to activate calcium signaling in T cells. <a href="#">J Exp Med. 195 (8): 1023-32.</a></li> <li>3. Parnes, J.R. (1989) Molecular biology and function of CD4 and CD8. <a href="#">Adv Immunol. 44: 265-311.</a></li> <li>4. Kap, Y.S. <i>et al.</i> (2009) A monoclonal antibody selection for immunohistochemical examination of lymphoid tissues from non-human primates. <a href="#">J Histochem Cytochem. 57: 1159-67.</a></li> <li>5. Hovden, A.O. <i>et al.</i> (2011) Maturation of monocyte derived dendritic cells with OK432 boosts IL-12p70 secretion and conveys strong T-cell responses. <a href="#">BMC Immunol. 12: 2.</a></li> <li>6. Nelson, M. <i>et al.</i> (2010) Characterization of lethal inhalational infection with <i>Francisella tularensis</i> in the common marmoset (<i>Callithrix jacchus</i>). <a href="#">J Med Microbiol. 59: 1107-13.</a></li> <li>7. Gibbings, D.J. <i>et al.</i> (2007) CD8 alpha is expressed by human monocytes and enhances Fc gamma R-dependent responses. <a href="#">BMC Immunol. 8: 12.</a></li> <li>8. Junker, A. <i>et al.</i> (2007) Multiple sclerosis: T-cell receptor expression in distinct brain</li> </ol>

regions. [Brain. 130: 2789-99.](#)

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11. Nelson, M. & Loveday, M. (2014) Exploring the innate immunological response of an alternative nonhuman primate model of infectious disease; the common marmoset. [J Immunol Res. 2014: 913632.](#)

12. Manivannan, K. *et al.* (2016) CADM1/TS�C1 Identifies HTLV-1-Infected Cells and Determines Their Susceptibility to CTL-Mediated Lysis. [PLoS Pathog. 12 \(4\): e1005560.](#)

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14. Dunham, J. *et al.* (2016) Blockade of CD127 Exerts a Dichotomous Clinical Effect in Marmoset Experimental Autoimmune Encephalomyelitis. [J Neuroimmune Pharmacol. 11 \(1\): 73-83.](#)

15. Bughani, U. *et al.* (2017) T cell activation and differentiation is modulated by a CD6 domain 1 antibody Itolizumab. [PLoS One. 12 \(7\): e0180088.](#)

16. Philippens, I.H. *et al.* (2017) Acceleration of Amyloidosis by Inflammation in the Amyloid-Beta Marmoset Monkey Model of Alzheimer's Disease. [J Alzheimers Dis. 55 \(1\): 101-113.](#)

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<b>Storage</b>	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.
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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.

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<b>Guarantee</b>	12 months from date of despatch
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<b>Health And Safety Information</b>	Material Safety Datasheet documentation #10041 available at: <a href="https://www.bio-rad-antibodies.com/SDS/MCA1226A488T">https://www.bio-rad-antibodies.com/SDS/MCA1226A488T</a> 10041
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## Related Products

### Recommended Negative Controls

[MOUSE IgG1 NEGATIVE CONTROL:Alexa Fluor® 488 \(MCA928A488\)](#)

### Recommended Useful Reagents

[HUMAN SEROBLOCK \(BUF070A\)](#)

[HUMAN SEROBLOCK \(BUF070B\)](#)

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'M408630:221013'

**Printed on 08 Mar 2024**