

## Datasheet: MCA74G

<b>Description:</b>	RAT ANTI MOUSE CD11b
<b>Specificity:</b>	CD11b
<b>Other names:</b>	INTEGRIN ALPHA M CHAIN, MAC-1
<b>Format:</b>	Purified
<b>Product Type:</b>	Monoclonal Antibody
<b>Clone:</b>	M1/70.15
<b>Isotype:</b>	IgG2b
<b>Quantity:</b>	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](http://www.bio-rad-antibodies.com/protocols).

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry	▪			1/50
Immunohistology - Frozen	▪			
Immunohistology - Paraffin (1)	▪			
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 in their own system using appropriate negative/positive controls.

(1) **PLP fixation is recommended for optimal results, see [Whiteland et al.](#) for details**

<b>Target Species</b>	Mouse
<b>Species Cross Reactivity</b>	Reacts with: Human, Rabbit <b>N.B.</b> Antibody reactivity and working conditions may vary between species.
<b>Product Form</b>	Purified IgG - liquid
<b>Preparation</b>	Purified IgG prepared by ion exchange chromatography
<b>Buffer Solution</b>	Phosphate buffered saline
<b>Preservative Stabilisers</b>	0.09% Sodium Azide
<b>Carrier Free</b>	Yes

<b>Approx. Protein Concentrations</b>	IgG concentration 1.0 mg/ml
<b>Immunogen</b>	T cell enriched splenocytes from B10 mice.
<b>External Database Links</b>	<p><b>UniProt:</b>  <a href="#">P05555</a>   <a href="#">Related reagents</a></p> <p><b>Entrez Gene:</b>  <a href="#">16409</a> Itgam   <a href="#">Related reagents</a></p>
<b>RRID</b>	AB_321293
<b>Fusion Partners</b>	Spleen cells from immunised DA rats were fused with cells of the NS1/1.Ag4.1 mouse myeloma cell line.
<b>Specificity</b>	<p><b>Rat anti Mouse CD11b antibody, clone M1/70.15</b> recognizes the murine CD11b cell surface antigen also known as the alpha M integrin chain or MAC-1, a differentiation antigen expressed by granulocytes, monocytes, NK cells and tissue macrophages.</p> <p>The expression of CD11b increases during monocyte maturation and expression levels vary on tissue macrophages. Peritoneal macrophages are reported to express higher levels of CD11b than splenic macrophages.</p> <p>Rat anti Mouse CD11b antibody, clone M1/70.15 has been reported to block iC3b binding to its receptor (<a href="#">Beller <i>et al.</i> 1982</a>).</p> <p>Rat anti Mouse CD11b antibody, clone M1/70.15 has been reported to as being suitable for use on PLP fixed paraffin embedded tissue but has not been tested for use on formalin fixed tissue (<a href="#">Whiteland <i>et al.</i> 1995</a>).</p> <p>This product is routinely tested in flow cytometry on mouse peritoneal macrophages.</p>
<b>References</b>	<ol style="list-style-type: none"> <li>Beller, D.I. <i>et al.</i> (1982) Anti-Mac-1 selectively inhibits the mouse and human type three complement receptor. <a href="#">J Exp Med. 156 (4): 1000-9.</a></li> <li>Fernández-Suárez, D. (2014) The monoacylglycerol lipase inhibitor JZL184 is neuroprotective and alters glial cell phenotype in the chronic MPTP mouse model <a href="#">Neurobiol Aging. 35: 2603-16.</a></li> <li>Welt, F.G. <i>et al.</i> (2000) Neutrophil, not macrophage, infiltration precedes neointimal thickening in balloon-injured arteries. <a href="#">Arterioscler Thromb Vasc Biol. 20 (12): 2553-8.</a></li> <li>Terrando, N. <i>et al.</i> (2010) The impact of IL-1 modulation on the development of lipopolysaccharide-induced cognitive dysfunction. <a href="#">Crit Care. 14 (3): R88.</a></li> <li>Redensek, A. <i>et al.</i> (2011) Expression and detrimental role of hematopoietic prostaglandin D synthase in spinal cord contusion injury. <a href="#">Glia. 59: 603-14.</a></li> <li>Brochard, V. <i>et al.</i> (2009) Infiltration of CD4+ lymphocytes into the brain contributes to neurodegeneration in a mouse model of Parkinson disease. <a href="#">J Clin Invest. 119: 182-92.</a></li> <li>Chinnery, H.R. <i>et al.</i> (2010) Novel characterization of monocyte-derived cell populations in the meninges and choroid plexus and their rates of replenishment in bone marrow chimeric mice. <a href="#">J Neuropathol Exp Neurol. 69: 896-909.</a></li> <li>Ferger, A.I. <i>et al.</i> (2010) Effects of mitochondrial dysfunction on the immunological properties of microglia. <a href="#">J Neuroinflammation. 7: 45.</a></li> <li>Gales, A. <i>et al.</i> (2010) PPARgamma controls dectin-1 expression required for host antifungal defense against <i>Candida albicans</i>. <a href="#">PLoS Pathog. 6 : e1000714.</a></li> </ol>

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#### Storage

Store at +4°C or at -20°C if preferred.

This product should be stored undiluted.

Storage in frost free freezers is not recommended. Avoid repeated freezing and thawing as this may denature the antibody. Should this product contain a precipitate we recommend microcentrifugation before use.

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#### Guarantee

12 months from date of despatch

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#### Health And Safety Information

Material Safety Datasheet documentation #10040 available at: 10040: <https://www.bio-rad-antibodies.com/uploads/MSDS/10040.pdf>

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#### Regulatory

For research purposes only

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## Related Products

### Recommended Secondary Antibodies

Rabbit Anti Rat IgG (STAR17...)	<a href="#">FITC</a>
Goat Anti Rat IgG (STAR69...)	<a href="#">FITC</a>
Goat Anti Rat IgG (STAR131...)	<a href="#">Alk. Phos.</a> , <a href="#">Biotin</a>
Goat Anti Rat IgG (STAR73...)	<a href="#">RPE</a>
Rabbit Anti Rat IgG (STAR21...)	<a href="#">HRP</a>
Goat Anti Rat IgG (STAR72...)	<a href="#">HRP</a>
Rabbit Anti Rat IgG (STAR16...)	<a href="#">DyLight@800</a>
Goat Anti Rat IgG (MOUSE ADSORBED) (STAR71...)	<a href="#">DyLight@800</a>

### Recommended Useful Reagents

[ANTIGEN RETRIEVAL BUFFER, pH8.0 \(BUF025A\)](#)

[ANTIGEN RETRIEVAL BUFFER, pH8.0 \(BUF025C\)](#)

<b>North &amp; South America</b>	Tel: +1 800 265 7376 Fax: +1 919 878 3751 Email: <a href="mailto:antibody_sales_us@bio-rad.com">antibody_sales_us@bio-rad.com</a>	<b>Worldwide</b>	Tel: +44 (0)1865 852 700 Fax: +44 (0)1865 852 739 Email: <a href="mailto:antibody_sales_uk@bio-rad.com">antibody_sales_uk@bio-rad.com</a>	<b>Europe</b>	Tel: +49 (0) 89 8090 95 21 Fax: +49 (0) 89 8090 95 50 Email: <a href="mailto:antibody_sales_de@bio-rad.com">antibody_sales_de@bio-rad.com</a>
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