

## Datasheet: MCA5647

<b>Description:</b>	RAT ANTI MOUSE CD276
<b>Specificity:</b>	CD276
<b>Other names:</b>	B7-H3
<b>Format:</b>	Purified
<b>Product Type:</b>	Monoclonal Antibody
<b>Clone:</b>	MJ18
<b>Isotype:</b>	IgG1
<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	▪			1/25 - 1/200

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.

<b>Target Species</b>	Mouse
<b>Product Form</b>	Purified IgG - liquid
<b>Preparation</b>	Purified IgG prepared by affinity chromatography on Protein G from tissue culture supernatant
<b>Buffer Solution</b>	Phosphate buffered saline
<b>Preservative Stabilisers</b>	0.09% Sodium Azide (NaN <sub>3</sub> )
<b>Carrier Free</b>	Yes
<b>Approx. Protein Concentrations</b>	IgG concentration 1.0mg/ml

<b>Immunogen</b>	Mouse IgG2a Fc-CD276 (aa 1-242).
<b>External Database Links</b>	<p><b>UniProt:</b>  <a href="#">Q8VE98</a>   <a href="#">Related reagents</a></p> <p><b>Entrez Gene:</b>  <a href="#">102657</a>   Cd276   <a href="#">Related reagents</a></p>
<b>Synonyms</b>	B7h3
<b>RRID</b>	AB_10843423
<b>Fusion Partners</b>	Lymph node cells from immunised Sprague Dawley rats were fused with cells of the P3U1 myeloma cell line.
<b>Specificity</b>	<p><b>Rat anti Mouse CD276 antibody, clone MJ18</b> specifically recognizes mouse CD276, otherwise known as B7-H3, a ubiquitously expressed transmembrane glycoprotein and member of the B7 family of co-stimulatory molecules, which acts as both a positive and negative regulator of T-cell-mediated immune responses.</p> <p>CD276 is highly expressed in bone during embryogenesis, and can be induced on dendritic cells and monocytes by inflammatory cytokines. CD276 has been implicated in the development of acute and chronic transplant rejection, and is reported to have therapeutic potential as a regulator of cell-mediated immune responses to cancer, particularly in conjunction with anti-angiogenic therapy. In mice, CD276 has been linked with the development of pathogenic Th2 cells during the induction phase of allergic asthma and have shown that Rat anti Mouse CD276 antibody, clone MJ18 inhibits stimulated CD4+ T-cell proliferation (<a href="#">Nagashima et al. 2008</a>).</p>
<b>Flow Cytometry</b>	Use 10ul of the suggested working dilution to label $1 \times 10^6$ cells in 100ul.
<b>References</b>	<ol style="list-style-type: none"> <li>1. Nagashima, O. <i>et al.</i> (2008) B7-H3 contributes to the development of pathogenic Th2 cells in a murine model of asthma. <a href="#">J Immunol. 181 (6): 4062-71.</a></li> <li>2. Fukushima, A. <i>et al.</i> (2007) B7-H3 regulates the development of experimental allergic conjunctivitis in mice. <a href="#">Immunol Lett. 113 (1): 52-7.</a></li> </ol>
<b>Storage</b>	<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>
<b>Guarantee</b>	12 months from date of despatch
<b>Health And Safety Information</b>	<p>Material Safety Datasheet documentation #10040 available at: <a href="https://www.bio-rad-antibodies.com/SDS/MCA5647">https://www.bio-rad-antibodies.com/SDS/MCA5647</a></p> <p>10040</p>

## Related Products

### Recommended Secondary Antibodies

Goat Anti Rat IgG (STAR69...)	<a href="#">FITC</a>
Goat Anti Rat IgG (STAR73...)	<a href="#">RPE</a>
Goat Anti Rat IgG (MOUSE ADSORBED) (STAR71...)	<a href="#">DyLight@550</a> , <a href="#">DyLight@650</a> , <a href="#">DyLight@800</a>
Rabbit Anti Rat IgG (STAR21...)	<a href="#">HRP</a>
Rabbit Anti Rat IgG (STAR16...)	<a href="#">DyLight@800</a>
Goat Anti Rat IgG (STAR131...)	<a href="#">Alk. Phos.</a> , <a href="#">Biotin</a>
Rabbit Anti Rat IgG (STAR17...)	<a href="#">FITC</a>
Goat Anti Rat IgG (STAR72...)	<a href="#">HRP</a>

**North & South** Tel: +1 800 265 7376**America** Fax: +1 919 878 3751Email: [antibody\\_sales\\_us@bio-rad.com](mailto: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](mailto: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](mailto: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](https://bio-rad-antibodies.com/datasheets)

'M421726:230713'

**Printed on 12 Aug 2023**