

## Datasheet: MCA2142APC

**BATCH NUMBER 172104**

<b>Description:</b>	MOUSE ANTI HUMAN CD63:APC
<b>Specificity:</b>	CD63
<b>Format:</b>	APC
<b>Product Type:</b>	Monoclonal Antibody
<b>Clone:</b>	MEM-259
<b>Isotype:</b>	IgG1
<b>Quantity:</b>	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](http://www.bio-rad-antibodies.com/protocols).

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry	▪			Neat

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>	Human		
<b>Product Form</b>	Purified IgG conjugated to allophycocyanin (APC) - lyophilized		
<b>Reconstitution</b>	Reconstitute with 1ml distilled water		
<b>Max Ex/Em</b>	<b>Fluorophore</b>	<b>Excitation Max (nm)</b>	<b>Emission Max (nm)</b>
	APC	650	661
<b>Preparation</b>	Purified IgG prepared by affinity chromatography on Protein A from tissue culture supernatant		
<b>Buffer Solution</b>	Phosphate buffered saline		
<b>Preservative</b>	0.09% Sodium Azide (NaN <sub>3</sub> )		
<b>Stabilisers</b>	1% Bovine Serum Albumin 5% Sucrose		

<b>Approx. Protein Concentrations</b>	IgG concentration 0.1 mg/ml
<b>Immunogen</b>	HPB-ALL cell line.
<b>External Database Links</b>	<p><b>UniProt:</b>  <a href="#">P08962</a>    <a href="#">Related reagents</a></p> <p><b>Entrez Gene:</b>  <a href="#">967</a>    CD63    <a href="#">Related reagents</a></p>
<b>Synonyms</b>	MLA1, TSPAN30
<b>RRID</b>	AB_2229161
<b>Specificity</b>	<p><b>Mouse anti Human CD63 antibody, clone MEM-259</b> recognizes the CD63 cell surface antigen, also known as granulophysin, lysosomal associated membrane protein 3 (LAMP-3), Melanoma-associated antigen ME491, Ocular melanoma-associated antigen or tetraspanin-30. CD63 is a 238 amino acid, tetraspanin glycoprotein of ~40-60 kDa.</p> <p>CD63 is expressed by monocytes, macrophages, endothelial cells where it is a component of Weibel-Palade bodies (<a href="#">Vischer et al. 1993</a>) and by a variety of cell lines. It is located intracellularly in lysosomal granules of platelets, being translocated to the surface upon activation. It may therefore be useful as a marker of platelet activation (<a href="#">Hamamoto et al. 1994</a>). CD63 expression is also associated with melanoma development (<a href="#">Radford et al. 1997</a>) and expression is rapidly down-regulated by progesterone in endometrial tissues (<a href="#">Okada et al. 1999</a>).</p>
<b>Flow Cytometry</b>	Use 10µl of the suggested working dilution to label 10 <sup>6</sup> cells in 100µl or 100µl whole blood
<b>References</b>	<ol style="list-style-type: none"> <li>Casey, T.M. <i>et al.</i> (2007) Organelle proteomics: identification of the exocytic machinery associated with the natural killer cell secretory lysosome. <a href="#">Mol Cell Proteomics. 6 (5): 767-80.</a></li> <li>Durand-Panteix, S. <i>et al.</i> (2012) B7-H1, which represses EBV-immortalized B cell killing by autologous T and NK cells, is oppositely regulated by c-Myc and EBV latency III program at both mRNA and secretory lysosome levels. <a href="#">J Immunol. 189 (1): 181-90.</a></li> <li>Abdel-Latif, D. <i>et al.</i> (2004) Rac2 is critical for neutrophil primary granule exocytosis. <a href="#">Blood. 104: 832-9.</a></li> <li>Norling, L.V. <i>et al.</i> (2012) Resolvin D1 limits polymorphonuclear leukocyte recruitment to inflammatory loci: receptor-dependent actions. <a href="#">Arterioscler Thromb Vasc Biol. 32 (8): 1970-8.</a></li> <li>McKechnie, N.M. <i>et al.</i> (2006) Fas-ligand is stored in secretory lysosomes of ocular barrier epithelia and released with microvesicles. <a href="#">Exp Eye Res. 83: 304-14.</a></li> <li>Spring, F.A. <i>et al.</i> (2013) Tetraspanins CD81 and CD82 facilitate α4β1-mediated adhesion of human erythroblasts to vascular cell adhesion molecule-1. <a href="#">PLoS One. 8(5):e62654.</a></li> <li>Pliyev, B.K. (2008) Activated human neutrophils rapidly release the chemotactically</li> </ol>

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10. Jakhria, T. *et al.* (2014)  $\beta$ 2-microglobulin amyloid fibrils are nanoparticles that disrupt lysosomal membrane protein trafficking and inhibit protein degradation by lysosomes. [J Biol Chem. 289 \(52\): 35781-94.](#)

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14. Vrancx, C. *et al.* (2021) Mechanism of Cellular Formation and *In Vivo* Seeding Effects of Hexameric  $\beta$ -Amyloid Assemblies. [Mol Neurobiol. 58 \(12\): 6647-69.](#)

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16. Cinato, M. *et al.* (2021) Apilimod alters TGF $\beta$  signaling pathway and prevents cardiac fibrotic remodeling. [Theranostics. 11 \(13\): 6491-506.](#)

17. Yuan, Z. *et al.* (2017) TRAIL delivery by MSC-derived extracellular vesicles is an effective anticancer therapy. [J Extracell Vesicles. 6 \(1\): 1265291.](#)

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**Storage**

This product is shipped at ambient temperature.

Prior to reconstitution store at +4°C.

After reconstitution store at +4°C.

DO NOT FREEZE.

This product should be stored undiluted. This product is photosensitive and should be protected from light. 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 #20487 available at: <https://www.bio-rad-antibodies.com/SDS/MCA2142APC>

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**Regulatory**

For research purposes only

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## Related Products

### Recommended Negative Controls

[MOUSE IgG1 NEGATIVE CONTROL:APC \(MCA928APC\)](#)

### Recommended Useful Reagents

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

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

**Product inquiries:** [www.bio-rad-antibodies.com/technical-support](http://www.bio-rad-antibodies.com/technical-support)

To find a batch/lot specific datasheet for this product, please use our online search tool at: [bio-rad-antibodies.com/datasheets](http://bio-rad-antibodies.com/datasheets)

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