

# Datasheet: MCA409S **BATCH NUMBER 165076**

Description:	RAT ANTI MBP (aa82-87)
Specificity:	MBP (aa82-87)
Other names:	MYELIN BASIC PROTEIN
Format:	S/N
Product Type:	Monoclonal Antibody
Clone:	12
Isotype:	lgG2a
Quantity:	2 ml

### **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.biorad-antibodies.com/protocols.

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry			•	
Immunohistology - Frozen				
Immunohistology - Paraffin				
ELISA	•			
Immunoprecipitation				
Western Blotting	•			
Immunofluorescence	•			
Radioimmunoassays	•			

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	Bovine
Species Cross	Reacts with: Mouse, Rabbit, Rat, Gui
Reactivity	Based on sequence similarity is expe

iinea Pig, Sheep, Human, Chicken, Pig Based on sequence similarity, is expected to react with: Mammals

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	Tissue Culture Supernatant - liquid
Buffer Solution	0.1M TRIS
Preservative Stabilisers	0.1% Sodium Azide
Immunogen	Bovine MBP.
External Database Links	UniProt: P02687 Related reagents
	Entrez Gene: 618684 MBP Related reagents
RRID	AB_325004
Fusion Partners	Spleen cells from an immunised outbred rat were fused with cells of the mouse NS0 myeloma cell line.
Specificity	Rat anti MBP antibody, clone 12 recognizes myelin basic protein from a wide range of species. Rat anti MBP antibody, clone 12 reacts weakly with peptides ending in the Phe 91 where the 91-92 Phe-Phe bond is broken. Synthetic peptide 82-99 reacts very well with Rat anti MBP antibody, clone 12, as does intact MBP. Further epitope analysis indicates binding to a region defined by amino acids 82-87 (DENPVV).  Rat anti MBP antibody, clone 12 has been reported as being suitable for use in western
	blotting ( <u>Glynn et al. 1987</u> ).
References	<ol> <li>Groome, N.P. <i>et al.</i> (1986) Region-specific immunoassays for human myelin basic protein. J Neuroimmunol. 12 (4): 253-64.</li> <li>Glynn, P. <i>et al.</i> (1987) Basic protein dissociating from myelin membranes at physiological ionic strength and pH is cleaved into three major fragments. J Neurochem. 48 (3): 752-9.</li> <li>Hruby, S. <i>et al.</i> (1987) Monoclonal antibodies reactive with myelin basic protein. Mol Immunol. 24 (12): 1359-64.</li> <li>Relvas, J.B. <i>et al.</i> (2001) Expression of dominant-negative and chimeric subunits reveals an essential role for beta1 integrin during myelination. Curr Biol. 11: 1039-43.</li> <li>Massa, P.T. <i>et al.</i> (2002) Critical role for protein tyrosine phosphatase SHP-1 in controlling infection of central nervous system glia and demyelination by Theiler's murine encephalomyelitis virus. J Virol. 76:8335-46.</li> <li>Massa, P.T. <i>et al.</i> (2004) Dysmyelination and reduced myelin basic protein gene expression by oligodendrocytes of SHP-1-deficient mice. J Neurosci Res. 77: 15-25.</li> <li>Homchaudhuri L <i>et al.</i> (2009) Influence of membrane surface charge and</li> </ol>
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## 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.

#### Guarantee

12 months from date of despatch

# Health And Safety Information

Material Safety Datasheet documentation #10451 available at: <a href="https://www.bio-rad-antibodies.com/SDS/MCA409S">https://www.bio-rad-antibodies.com/SDS/MCA409S</a>

**Regulatory** For research purposes only

# **Related Products**

#### **Recommended Secondary Antibodies**

Rabbit Anti Rat IgG (STAR16...) <u>DyLight®800</u>

Rabbit Anti Rat IgG (STAR17...)

Goat Anti Rat IgG (STAR72...)

Goat Anti Rat IgG (STAR69...)

Goat Anti Rat IgG (STAR73...)

Rabbit Anti Rat IgG (STAR21...)

HRP

Goat Anti Rat IgG (MOUSE ADSORBED) (STAR71...) <u>DyLight®550</u>, <u>DyLight®650</u>, <u>DyLight®800</u>

Goat Anti Rat IgG (STAR131...) Alk. Phos., Biotin

 North & South
 Tel: +1 800 265 7376
 Worldwide
 Tel: +44 (0)1865 852 700
 Europe
 Tel: +49 (0) 89 8090 95 21

 America
 Fax: +1 919 878 3751
 Fax: +44 (0)1865 852 739
 Fax: +49 (0) 89 8090 95 50

Email: antibody\_sales\_us@bio-rad.com

Email: antibody\_sales\_uk@bio-rad.com

Email: antibody\_sales\_de@bio-rad.com

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