

Datasheet: MCA920GA

### **BATCH NUMBER 148200**

Description:	MOUSE ANTI SHEEP CD14	
Specificity:	CD14	
Format:	Purified	
Product Type:	Monoclonal Antibody	
Clone:	VPM65	
Isotype:	lgG1	
Quantity:	0.1 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 <a href="www.bio-rad-antibodies.com/protocols">www.bio-rad-antibodies.com/protocols</a>.

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry	•			1/50 - 1/250
Immunohistology - Frozen	•			
Immunohistology - Paraffin				
ELISA				
Immunoprecipitation	•			
Western Blotting				

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	Sheep
Species Cross Reactivity	Reacts with: Bovine, Goat, Water Buffalo <b>N.B.</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 - liquid
Preparation	Purified IgG prepared by affinity chromatography on Protein A from tissue culture supernatant

Buffer Solution	Phosphate buffered saline
Preservative Stabilisers	0.09% Sodium Azide (NaN <sub>3</sub> )
Carrier Free	Yes
Approx. Protein Concentrations	IgG concentration 1.0 mg/ml
Immunogen	Ovine macrophages
External Database Links	UniProt:  Q06AV9 Related reagents
Fusion Partners	Spleen cells from immunised BALB/c mice were fused with cells of the mouse NS0 myeloma cell line
Specificity	Mouse Anti Sheep CD14 antibody, clone VPM65 recognizes Ovine CD14, a GPI-anchored 55 kDa membrane glycoprotein and monocyte/macrophage differentiation antigen belonging to the lipopolysaccharide receptor family. Ovine CD14 is expressed by monocytes, macrophages and peripheral blood granulocytes.  CD14 acts as a receptor for the potent bacterial endotoxin, lipopolysaccharide (LPS), facilitated by LPS-binding protein (LBP). The binding of LPS to CD14 results in cell activation, the release of cytokines and the inflammatory response, which has been shown to upregulate the cell surface expression of adhesion molecules.
Flow Cytometry	Use 10ul of the suggested working dilution to label 10 <sup>6</sup> cells or cells or 100ul whole blood
References	<ol> <li>Akesson, C.P. et al. (2008) Phenotypic characterisation of intestinal dendritic cells in sheep. Dev Comp Immunol. 32: 837-49.</li> <li>Gupta, V.K. et al. (1996) Identification of the sheep homologue of the monocyte cell surface moleculeCD14. Vet Immunol Immunopathol. 51 (1-2): 89-99.</li> <li>Summers, C. et al. (2012) The distribution of immune cells in the lungs of classical and atypical ovine pulmonary adenocarcinoma. Vet Immunol Immunopathol. 146: 1-7.</li> <li>Langrova, T. et al. (2008) Expression of CD14 and CD44 on bovine polymorphonuclear leukocytes during resolution of mammary inflammatory response induced by muramyldipeptide and lipopolysaccharide Veterinarni Medicina, 53: 1-11</li> <li>Andréoletti, O. et al. (2002) Phenotyping of protein-prion (PrPsc)-accumulating cells in lymphoid and neural tissues of naturally scrapie-affected sheep by double-labeling immunohistochemistry. J Histochem Cytochem. 50: 1357-70.</li> <li>Berthon, P. and Hopkins, J. (1996) Ruminant cluster CD14. Vet Immunol Immunopathol. 52: 245-8.</li> <li>Chan, S.S. et al. (2002) Generation and characterization of ovine dendritic cells derived from peripheral blood monocytes. Immunology. 107 (3): 366-72.</li> <li>Daniel, J.A. et al. (2003) Leptin, tumor necrosis factor-alpha (TNF), and CD14 in ovine</li> </ol>

adipose tissue and changes in circulating TNF in lean and fat sheep. <u>J Anim Sci. 81:</u>

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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.

#### Guarantee

12 months from date of despatch

#### **Health And Safety**

Material Safety Datasheet documentation #10040 available at:

Information https://www.bio-rad-antibodies.com/SDS/MCA920GA

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**Regulatory** For research purposes only

# Related Products

# **Recommended Secondary Antibodies**

Rabbit Anti Mouse IgG (STAR12...) RPE

Goat Anti Mouse IgG IgA IgM (STAR87...) HRP

Goat Anti Mouse IgG (STAR76...) RPE

Rabbit Anti Mouse IgG (STAR13...) HRP

Goat Anti Mouse IgG (STAR70...) FITC

Goat Anti Mouse IgG (H/L) (STAR117...) Alk. Phos., DyLight®488, DyLight®550,

DyLight®650, DyLight®680, DyLight®800,

FITC, HRP

Rabbit Anti Mouse IgG (STAR9...) <u>FITC</u>

Goat Anti Mouse IgG (STAR77...) HRP

Goat Anti Mouse IgG (Fc) (STAR120...) FITC, HRP

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