

Monoclonal Antibody to CD204 - FITC

Alternate names: MSR1, Macrophage acetylated LDL receptor I and II, Macrophage scavenger receptor types I

and II, SCARA1, Scavenger receptor class A member 1

Catalog No.: SM029F
Quantity: 0.1 mg
Concentration: 0.1 mg/ml

Background: CD204 is expressed by tissue macrophages and functions both as an endocytic receptor for

lipoproteins and as an adhesion receptor for macrophages binding to ligand rich tissues e.g. atherosclerotic lesions. Clone 2F8 inhibits the uptake of acetylated low-density

lipoproteins and also inhibits divalent cation independent adhesion.

Recent research shows that clone 2F8 recognises an epitope within SRA that is

polymorphic in the SRA from C57BL/6 mice. Clone 2F8 is therefore unsuitable for use with

the C57BL/6 mouse strain.

Uniprot ID: P30204

NCBI: NP 001106797.1

GeneID: 20288
Host / Isotype: Rat / IgG2b

Clone: 2F8

Immunogen: RAW264 cell line.

Remarks: Spleen cells from immunised AO rats were fused with cells of the Y3 rat myeloma

cell line.

Format: State: Liquid purified IgG fraction.

Purification: Affinity Chromatography on Protein G.

Buffer System: PBS, pH 7.4 containing 0.09% Sodium Azide as preservative and 1% BSA as

stabilizer.

Label: FITC - Fluorescein Isothiocyanate Isomer 1

Applications: Flow Cytometry: Use 10 µl of neat antibody to label 10e6 cells in 100 µl.

Use The Fc region of monoclonal antibodies may bind non-specifically to cells expressing

low affinity Fc receptors.

Other applications not tested. Optimal dilutions are dependent on conditions and should

be determined by the user.

Specificity: This antibody recognises the Murine Scavenger Receptor class A (SRA), type I and II, also

known as CD204.

Species: Mouse. Reacts with Pig.

Other species not tested.



SM029F: Monoclonal Antibody to CD204 - FITC

Storage:

Store the antibody undiluted at 2-8°C for one month or (in aliquots) at -20°C for longer. Avoid repeated freezing and thawing.

This product is photosensitive and should be protected from light.

Shelf life: one year from despatch.

- General References: 1. Fraser, I.P. et al. (1993) Divalent cation-independent macrophage adhesion inhibited by monoclonal antibody to murine scavenger receptor. Nature 364: 343-346.
 - 2. de Villiers, W.J.S. et al. (1994) Macrophage-colony-stimulating factor selectively enhances macrophage scavenger receptor expression and function J. Exp. Med. 180: 705-709.
 - 3. Hughes, D.A.et al. (1995) Murine Macrophage Scavenger Receptor: in vivo expression and function as receptor for macrophage adhesion in lymphoid and non-lymphoid organs. Eur. J. Immunol. 25: 466-473.
 - 4. Bell, M.D.et al. (1994) Upregulation of the macrophage scavenger receptor in response to different forms of injury in the CNS. J. Neurocytol. 23: 605-613.
 - 5. Hughes, D.A. et al. (1994) Murine Macrophage Scavenger Receptor: Adhesion function and Expression. Imm. Letts. 43: 7-14.
 - 6. Rosen, H. and Hughes, D.A. (1995) Assays of Myeloid Cell Function: Migration and adhesion in vivo. Weir Handbook of Experimental Immunology. London, Blackwell Scientific Publications. 5th, ed. In Press.
 - 7. Daugherty, A. et al. (2000) Polymorphism of class A scavenger receptors in C57BL/6 mice. J. Lipid Res 41: 1568 - 1577.
 - 8. Moldenhauer, L.M. et al. (2010) GM-CSF Is an Essential Regulator of T Cell Activation Competence in Uterine Dendritic Cells during Early Pregnancy in Mice. J Immunol. 185: 7085-7096.
 - 9. Luechtenborg, B. et al. (2008) Function of scavenger receptor class A type I/II is not important for smooth muscle foam cell formation. Eur J Cell Biol. 87: 91-9.
 - 10. Sever-Chroneos, Z. et al. (2011) Surfactant Protein A (SP-A)-mediated Clearance of Staphylococcus aureus Involves Binding of SP-A to the Staphylococcal Adhesin Eap and the Macrophage Receptors SP-A Receptor 210 and Scavenger Receptor Class A. J Biol Chem. 286: 4854-70.