10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

CD68 Mouse mAb

Catalog # AP97020

Product Information

Application	WB
Primary Accession	P31996
Other Accession	P31996
Reactivity	Mouse
Host	Mouse
Clonality	Monoclonal
Calculated MW	34818
Physical State	Liquid
Immunogen	Recombinant mouse CD68 protein
Epitope Specificity	119-291/326
Purity	affinity purified by Protein A
Buffer	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.
SIMILARITY	Belongs to the LAMP family.
Post-translational modifications	N- and O-glycosylated
Important Note	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
Background Descriptions	This gene encodes a 110-kD transmembrane glycoprotein that is highly expressed by human monocytes and tissue macrophages. It is a member of the lysosomal/endosomal-associated membrane glycoprotein (LAMP) family. The protein primarily localizes to lysosomes and endosomes with a smaller fraction circulating to the cell surface. It is a type I integral membrane protein with a heavily glycosylated extracellular domain and binds to tissue- and organ-specific lectins or selectins. The protein is also a member of the scavenger receptor family. Scavenger receptors typically function to clear cellular debris, promote phagocytosis, and mediate the recruitment and activation of macrophages. Alternative splicing results in multiple transcripts encoding different isoforms. [provided by RefSeq, Jul 2008]CD68 (Macrosialin) is a 110 kDa integral membrane glycoprotein predominantly expressed on the intracellular lysomsomes of monocytes and macrophages and to a lesser extent by dendritic cells and peripheral blood granulocytes. Also, CD68 could play a role in phagocytic activities of tissue macrophages, both in intracellular lysosomal metabolism and extracellular cell-cell and cell-pathogen interactions. CD68 is expressed by interdigitating reticulum cells in tonsil and some histiocytic lymphoma or histiocytosis, acute myeloid leukemia (AML), and granulocytic sarcoma. Elevated expression of CD68 has been demonstrated on CD34+ cells in various human malignancies, including several Acute Myeloid Leukemia studies.

Additional Information

Gene ID	12514

Other Names	GP110; LAMP4; SCARD1; CD68_HUMAN; CD68; CD68_MOUSE; CD68 molecule; CD68 antigen; scavenger receptor class D, member 1; macrophage antigen CD68; macrosialin
Dilution	WB=1:1000-5000
Storage	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

Protein Information

Name	Cd68
Function	Could play a role in phagocytic activities of tissue macrophages, both in intracellular lysosomal metabolism and extracellular cell-cell and cell-pathogen interactions. Binds to tissue- and organ-specific lectins or selectins, allowing homing of macrophage subsets to particular sites. Rapid recirculation of CD68 from endosomes and lysosomes to the plasma membrane may allow macrophages to crawl over selectin-bearing substrates or other cells.
Cellular Location	[Isoform Long]: Endosome membrane; Single-pass type I membrane protein. Lysosome membrane; Single-pass type I membrane protein
Tissue Location	Expressed in tissue macrophages and to a lesser extent in dendritic cells

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.