CD9 monoclonal antibody, clone MEM-61 (APC)

Catalog # MAB4559 Size 100 Reactions

Specification

Product Description	Mouse monoclonal antibody raised against native CD9.
Immunogen	Native purified CD9 from Pre-B cell line NALM-6.
Host	Mouse
Theoretical MW (kDa)	24
Reactivity	Human
Specificity	This antibody recognizes an epitope on second extracellular domain (EC2) of CD9 antigen, a 24 KD a transmembrane protein expressed on platelets, monocytes, pre-B lymphocytes, granulocytes and a ctivated T lymphocytes.
Form	Liquid
Conjugation	APC
Isotype	IgG1
Recommend Usage	Flow Cytometry (10 ul in human blood cells 100 ul in whole blood or 10^6 cells in a suspension) The optimal working dilution should be determined by the end user.
Storage Buffer	In PBS (0.2% BSA, 0.09% sodium azide)
Storage Instruction	Store in the dark at 4°C. Do not freeze. Avoid prolonged exposure to light. Aliquot to avoid repeated freezing and thawing.
Note	This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which shoul d be handled by trained staff only.

Applications

- Flow Cytometry

Gene Info — CD9

Entrez GeneID	928
Gene Name	CD9
Gene Alias	5H9, BA2, BTCC-1, DRAP-27, GIG2, MIC3, MRP-1, P24, TSPAN29
Gene Description	CD9 molecule
Omim ID	143030
Gene Ontology	Hyperlink
Gene Summary	The protein encoded by this gene is a member of the transmembrane 4 superfamily, also known a s the tetraspanin family. Most of these members are cell-surface proteins that are characterized b y the presence of four hydrophobic domains. The proteins mediate signal transduction events that play a role in the regulation of cell development, activation, growth and motility. This encoded prot ein is a cell surface glycoprotein that is known to complex with integrins and other transmembrane 4 superfamily proteins. It can modulate cell adhesion and migration and also trigger platelet activa tion and aggregation. In addition, the protein appears to promote muscle cell fusion and support myotube maintenance. [provided by RefSeq
Other Designations	5H9 antigen|CD9 antigen|CD9 antigen (p24)|OTTHUMP00000041574|OTTHUMP00000041576| antigen defined by monoclonal antibody 602-29|growth-inhibiting gene 2 protein|leukocyte antigen MIC3|motility related protein|motility related protein-1|p24 antigen

Publication Reference

- Novel Antibody Exerts Antitumor Effect through Downregulation of CD147 and Activation of Multiple Stress Signals.

  Keisuke Fukuchi, Kayoko Nanai, Hiroshi Yuita, Chikako Maru, Jun Tsukada, Masato Ishigami, Yoko Nagai, Yoko Nakano, Chigusa Yoshimura, Kozo Yoneda, Masato Amano, Kensuke Nakamura, Yoko Oda, Haruyuki Nishigohri, Shoji Yamamoto, Yusuke Ohnishi-Totoki, Koichiro Inaki, Hironobu Komori, Rika Nakano, Yoshiyuki Kanari, Atsuko Nishida, Yumi Matsui, Satoko Funo, Sayako Takahashi, Toshiaki Ohtsuka, Toshinori Agatsuma.

  Journal of Oncology 2022 Nov; 2022:3552793.

  Application: Flow Cyt, Human, MIA PaCa-2 cells

- Platelet tetraspanin complexes and their association with lipid rafts.

  Israels SJ, McMillan-Ward EM.

  Thrombosis and Haemostasis 2007 Nov; 98(5):1081.

- Role of CD9 in proliferation and proangiogenic action of human adipose-derived mesenchymal stem cells.

  Kim YJ, Yu JM, Joo HJ, Kim HK, Cho HH, Bae YC, Jung JS.

  Pflugers Archiv: European Journal of Physiology 2007 Aug; 455(2):283.

- The tetraspanin CD9 mediates lateral association of MHC class II molecules on the dendritic cell surface.

  Unternaehrer JJ, Chow A, Pypaert M, Inaba K, Mellman I.

  PNAS 2006 Dec; 104(1):234.

Pathway

- Hematopoietic cell lineage

Disease

- Alzheimer disease
- Cardiovascular Diseases
- Diabetes Complications
- Infertility
- Metabolic Syndrome X
- Neoplasms
- Osteoporosis