

ARG53751 anti-CD10 antibody [MEM-78] (PE)

Package: 100 tests
Store at: 4°C

Summary

Product Description	PE-conjugated Mouse Monoclonal antibody [MEM-78] recognizes CD10
Tested Reactivity	Hu
Tested Application	FACS
Specificity	The clone MEM-78 reacts with CD10 antigen (CALLA - Common acute lymphatic leukemia antigen), a 100 kDa type II integral membrane protein. HLDA IV; WS Code B 506 HLDA V; WS Code B CD10.4
Host	Mouse
Clonality	Monoclonal
Clone	MEM-78
Isotype	IgG1
Target Name	CD10
Species	Human
Immunogen	NALM-6 human pre-B cell line
Conjugation	PE
Alternate Names	Enkephalinase; Neutral endopeptidase; Neutral endopeptidase 24.11; Common acute lymphocytic leukemia antigen; Neprilysin; CD antigen CD10; CALLA; EC 3.4.24.11; CD10; Skin fibroblast elastase; SFE; Atriopeptidase; NEP

Application Instructions

Application table	Application	Dilution
	FACS	20 µl / 10 ⁶ cells
Application Note	* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	

Properties

Form	Liquid
Purification Note	The purified antibody is conjugated with R-Phycoerythrin (PE) under optimum conditions. The conjugate is purified by size-exclusion chromatography and adjusted for direct use. No reconstitution is necessary.
Buffer	PBS, 15 mM Sodium azide and 0.2% (w/v) high-grade protease free BSA
Preservative	15 mM Sodium azide
Stabilizer	0.2% (w/v) high-grade protease free BSA
Storage instruction	Aliquot and store in the dark at 2-8°C. Keep protected from prolonged exposure to light. Avoid

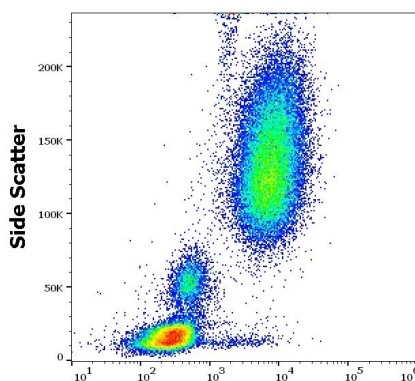
repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.

Note For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

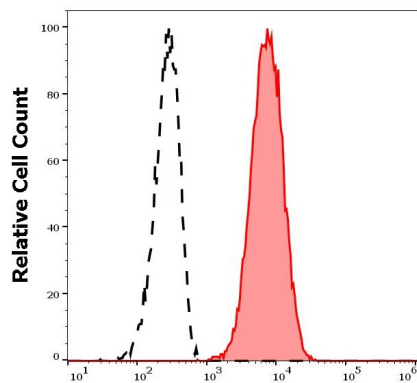
Database links	GeneID: 4311 Human Swiss-port # P08473 Human
Gene Symbol	MME
Gene Full Name	membrane metallo-endorpeptidase
Background	CD10 is a type II transmembrane glycoprotein and a common acute lymphocytic leukemia antigen that is an important cell surface marker in the diagnosis of human acute lymphocytic leukemia (ALL). The encoded protein is present on leukemic cells of pre-B phenotype, which represent 85% of cases of ALL. This protein is not restricted to leukemic cells, however, and is found on a variety of normal tissues. The protein is a neutral endopeptidase that cleaves peptides at the amino side of hydrophobic residues and inactivates several peptide hormones including glucagon, enkephalins, substance P, neurotensin, oxytocin, and bradykinin. [provided by RefSeq, Aug 2017]
Function	CD10: Thermolysin-like specificity, but is almost confined on acting on polypeptides of up to 30 amino acids (PubMed:15283675, PubMed:8168535). Biologically important in the destruction of opioid peptides such as Met- and Leu-enkephalins by cleavage of a Gly-Phe bond (PubMed:17101991). Able to cleave angiotensin-1, angiotensin-2 and angiotensin 1-9 (PubMed:15283675). Involved in the degradation of atrial natriuretic factor (ANF) (PubMed:2531377, PubMed:2972276). Displays UV-inducible elastase activity toward skin preelastic and elastic fibers (PubMed:20876573). [UniProt]
Research Area	Cancer antibody; Developmental Biology antibody; Immune System antibody
Calculated Mw	86 kDa
PTM	Myristoylation is a determinant of membrane targeting. Glycosylation at Asn-628 is necessary both for surface expression and neutral endopeptidase activity.

Images



ARG53751 anti-CD10 antibody [MEM-78] (PE) FACS image

Flow Cytometry: Human peripheral whole blood stained with ARG53751 anti-CD10 antibody [MEM-78] (PE) (20 µl reagent / 100 µl of peripheral whole blood).



ARG53751 anti-CD10 antibody [MEM-78] (PE) FACS image

Flow Cytometry: Separation of human neutrophil granulocytes (red-filled) from CD10 negative lymphocytes (black-dashed). Human peripheral whole blood stained with ARG53751 anti-CD10 antibody [MEM-78] (PE) (20 μ l reagent / 100 μ l of peripheral whole blood).