Antibodies

Anti-Human CD2 Antibody, Clone RPA-2.10

Mouse monoclonal IgG1 antibody against human, rhesus, cynomolgus CD2, unconjugated

Catalog #60007

100 µg 0.5 mg/mL

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Product Description

The RPA-2.10 antibody reacts with CD2, an ~50 kDa type I transmembrane glycoprotein and a member of the immunoglobulin (Ig) superfamily; two Ig-like domains are located in its extracellular portion. CD2 is broadly expressed on peripheral T and NK cells, dendritic cells, erythrocytes, most thymic T cells, subsets of thymic B cells, and on the endothelium. CD2 expression appears early during T cell differentiation. Aberrant expression has been observed in some lymphomas and myeloid leukemias. CD2 is critically important for T cell activation and signaling, and lymphocyte adhesion. The primary ligand for CD2 is CD58 (LFA-3) located on antigen-presenting cells, with additional ligands comprising CD15 (SSEA-1), CD48 and CD59. Notably, the RPA-2.10 antibody blocks the mixed lymphocyte reaction.

Target Antigen Name:	CD2
Alternative Names:	LFA-2, SRBC-R, T11
Gene ID:	914
Species Reactivity:	Human, Rhesus, Cynomolgus, Baboon, Chimpanzee, Capuchin Monkey, Pigtailed Macaque, Pig
Host Species:	Mouse
Clonality:	Monoclonal
Clone:	RPA-2.10
Isotype:	IgG1, kappa
Immunogen:	Human CD2 recombinant protein
Conjugate:	Unconjugated

Applications

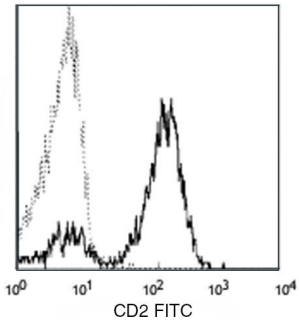
Verified:	FC
Reported:	FA, FC, ICC, IF, IHC, WB
Special Applications:	This antibody clone has been verified for purity assessments of cells isolated with EasySep™ kits, including EasySep™ HLA CD3 Positive Selection Kit (Catalog #18051HLA), EasySep™ Human CD3 Positive Selection Kit (Catalog #18051), EasySep™ HLA Whole Blood CD3 Positive Selection Kit (Catalog #18081HLA) and EasySep™ Human Whole Blood CD3 Positive Selection Kit (Catalog #18081).

Abbreviations: CellSep: Cell separation; ChIP: Chromatin immunoprecipitation; FA: Functional assay; FC: Flow cytometry; ICC: Immunocytochemistry; IF: Immunofluorescence microscopy; IHC: Immunohistochemistry; IP: Immunoprecipitation; WB: Western blotting

Properties

Formulation:	Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide
Purification:	The antibody was purified by affinity chromatography.
Stability and Storage:	Product stable at 2 - 8°C when stored undiluted. Do not freeze. For product expiry date, please request a lot-specific Certificate of Analysis from techsupport@stemcell.com.
Directions for Use:	For flow cytometry the suggested use of this antibody is ≤ 0.25 µg per 1 x 10e6 cells in 100 µL volume. It is recommended that the antibody be titrated for optimal performance for each application.

Data



Flow cytometry analysis of human peripheral blood lymphocytes labeled with Anti-Human CD2 Antibody, Clone RPA-2.10, followed by anti-mouse IgG, FITC (solid line histogram) or a mouse IgG1, kappa isotype control antibody followed by anti-mouse IgG, FITC (dashed line histogram).

Related Products

PRODUCT NAME	CATALOG #	SIZE
Anti-Human CD2 Antibody, Clone RPA-2.10	60007	100 µg
Anti-Human CD2 Antibody, Clone RPA-2.10, PE	60007PE	100 tests
Anti-Human CD2 Antibody, Clone RPA-2.10, PE	60007PE.1	25 tests
Anti-Human CD2 Antibody, Clone RPA-2.10, FITC	60007FI	100 tests

References

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5. Piriou-Guzylack L, Salmon H. Membrane markers of the immune cells in swine: an update. Vet Res 39(6): 54, 2008
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10. Yoshino N, et al. Upgrading of flow cytometric analysis for absolute counts, cytokines and other antigenic molecules of cynomolgus monkeys (Macaca fascicularis) by using anti-human cross-reactive antibodies. Exp Anim 49(2): 97-110, 2000 (FC)