

## ARG53868 anti-CD5 antibody [CRIS1] (PE)

Package: 100 tests  
Store at: 4°C

### Summary

Product Description	PE-conjugated Mouse Monoclonal antibody [CRIS1] recognizes CD5
Tested Reactivity	Hu
Tested Application	FACS
Specificity	The clone CRIS1 reacts with the cell surface glycoprotein CD5, a 67kDa single-chain transmembrane glycoprotein expressed on mature T lymphocytes, most of thymocytes and B lymphocytes subset (B-1a lymphocytes). HLDA I; WS Code T 29 HLDA III; WS Code T 530
Host	Mouse
Clonality	Monoclonal
Clone	CRIS1
Isotype	IgG2a
Target Name	CD5
Species	Human
Immunogen	stimulated human leukocytes
Conjugation	PE
Alternate Names	CD antigen CD5; Lymphocyte antigen T1/Leu-1; LEU1; T-cell surface glycoprotein CD5; T1

### Application Instructions

Application table	Application	Dilution
	FACS	20 µl / 10 <sup>6</sup> 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.

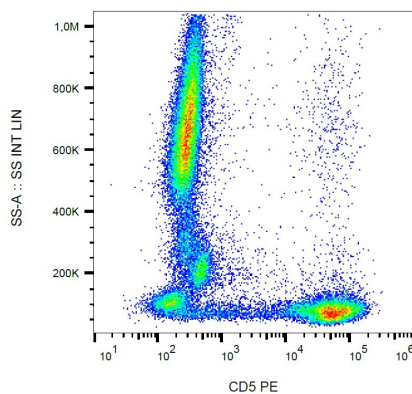
Note

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

## Bioinformation

Database links	<a href="#">GeneID: 921 Human</a> <a href="#">Swiss-port # P06127 Human</a>
Gene Symbol	CD5
Gene Full Name	CD5 molecule
Background	<p>CD5 antigen (T1; 67 kDa) is a human cell surface T-lymphocyte single-chain transmembrane glycoprotein. CD5 is expressed on all mature T-lymphocytes, most of thymocytes, subset of B-lymphocytes and on many T-cell leukemias and lymphomas. It is a type I membrane glycoprotein whose extracellular region contains three scavenger receptor cysteine-rich (SRCR) domains.</p> <p>The CD5 is a signal transducing molecule whose cytoplasmic tail is devoid of any intrinsic catalytic activity. CD5 modulates signaling through the antigen-specific receptor complex (TCR and BCR). CD5 crosslinking induces extracellular Ca<sup>++</sup> mobilization, tyrosine phosphorylation of intracellular proteins and DAG production. Preliminary evidence shows protein associations with ZAP-70, p56lck, p59fyn, PC-PLC, etc. CD5 may serve as a dual receptor, giving either stimulatory or inhibitory signals depending both on the cell type and development stage. In thymocytes and B1a cells seems to provide inhibitory signals, in peripheral mature T lymphocytes it acts as a costimulatory signal receptor. CD5 is the phenotypic marker of a B cell subpopulation involved in the production of autoreactive antibodies.</p> <p>Disease relevance: CD5 is a phenotypic marker for some B cell lymphoproliferative disorders (B-CLL, Hairy cell leukemia, etc.). The CD5<sup>+</sup> population is expanded in some autoimmune disorders (Rheumatoid Arthritis, etc.). Herpes virus infections induce loss of CD5 expression in the expanded CD8<sup>+</sup> human T cells.</p>
Function	May act as a receptor in regulating T-cell proliferation. [UniProt]
Research Area	Developmental Biology antibody; Immune System antibody
Calculated Mw	55 kDa
PTM	Phosphorylated on tyrosine residues by LYN; this creates binding sites for PTPN6/SHP-1.

## Images



ARG53868 anti-CD5 antibody [CRIS1] (PE) FACS image

Flow Cytometry: Human peripheral blood stained with ARG53868 anti-CD5 antibody [CRIS1] (PE).