

CD4 antibody [RPA-T4] (PE)

Cat. No. GTX74819

| Host | Mouse |
|-------------|-------------------|
| Clonality | Monoclonal |
| Isotype | lgG1 |
| Application | FACS |
| Reactivity | Human, Chimpanzee |

Reference (8)
Package
100 test

PRODUCT

Summary

The RPA-T4 antibody reacts with human CD4, a 59 kDa protein which acts as a co-receptor for the T cell receptor (TCR) in its interaction with MHC Class II molecules on antigen-presenting cells. The extracellular domain of CD4 binds to the beta-2 domain of MHC Class II, while its cytoplasmic tail provides a binding site for the tyrosine kinase lck, facilitating the signaling cascade that initiates T cell activation. CD4, and co-receptors CCR5 and CXCR4, may also be utilized by HIV-1 to enter T cells. Human CD4 is typically expressed on thymocytes, some mature T cell populations such as Th17 and T regulatory (Treg) cells, as well as on dendritic cells.

APPLICATION

Application Note

*Optimal dilutions/concentrations should be determined by the researcher.

| Suggested dilution | Recommended dilution | |
|-----------------------------------|---|--|
| FACS | $0.5~\mu g~(5~\mu l)$ for 10^510^8 cells in 100 μl sample per test | |
| Not tested in other applications. | | |
| Calculated MW | 51 kDa. (<u>Note</u>) | |
| Product Note | Epitope mapping studies have shown that antibodies, produced by clone RPA-T4, recognize an epitope within domain 1 of the extracellular region of the CD4 molecule. | |
| PROPERTIES | | |
| Form | Liquid | |

| PROPERTIES | |
|---------------|--|
| Form | Liquid |
| Buffer | 10mM NaH₂PO₄, 150mM NaCl, 0.1% Gelatin |
| Preservative | 0.09% Sodium azide |
| Storage | Store as concentrated solution. Centrifuge briefly prior to opening vial. Store at 4°C. DO NOT FREEZE. Protect from light. |
| Concentration | 0.1 mg/ml (Please refer to the vial label for the specific concentration.) |
| Immunogen | Human PHA blasts. |
| Purification | Purified by affinity chromatography From tissue culture supernatant |



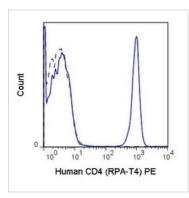
For full product information, images and publications, please visit our <u>website</u>.

Date 2024 / 05 / 19 Page 1 of 2



| Conjugation | Phycoerythrin (PE) |
|-------------|---|
| Note | For laboratory research use only. Not for any clinical, therapeutic, or diagnostic use in humans or animals. Not for animal or human consumption. |
| | Purchasers shall not, and agree not to enable third parties to, analyze, copy, reverse engineer or otherwise attempt to determine the structure or sequence of the product. |

DATA IMAGES



GTX74819 FACS Image

FACS analysis of human peripheral blood lymphocytes using GTX74819 CD4 antibody [RPA-T4] (PE).

Solid line: Primary antibody

Dashed line: PE mouse IgG1 isotype control

Antibody amount : 0.5 μg



For full product information, images and publications, please visit our <u>website</u>.

Date 2024 / 05 / 19 Page 2 of 2