

**PerCP/Cy5.5 Anti-human CD4 Antibody
*OKT-4***Catalog number: 100431U0, 100431U1, 100431U2
Unit size: 25 tests, 100 tests, 500 tests**Product Details**

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|--------------------|---|
| Storage Conditions | 2-8°C with minimized light exposure. Do not freeze. |
| Expiration Date | 12 months upon receiving |
| Concentration | 0.1 mg/mL |
| Formulation | Phosphate-buffered saline (PBS, pH 7.2), 0.09% sodium azide, 0.2% (w/v) BSA |

Antibody Properties

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|--------------------|-----------------|
| Species Reactivity | Human |
| Class | Primary |
| Clonality | Monoclonal |
| Host | Mouse |
| Isotype | Mouse igg2b, κ |
| Immunogen | CD4 (Leu-3, T4) |
| Clone | OKT-4 |
| Conjugate | PerCP/Cy5.5 |

Biological Properties

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| Preparation | Antibody purified by affinity chromatography and then conjugated with PerCP/Cy5.5 under optimal conditions |
| Application | Flow Cytometry (FACS) |

Spectral Properties

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| Conjugate | PerCP/Cy5.5 |
| Excitation Wavelength | 489 nm |
| Emission Wavelength | 679 nm |

Applications

OKT-4 is an anti-human monoclonal antibody that targets the CD4 antigen. CD4 (also known as T4) is a 55 kD member of the Ig superfamily that is located on the surface of cells such as macrophages. In certain organisms, CD4 positively regulates kinase activity, promotes I-kappaB kinase/NF-kappaB signaling and upregulates transcription, DNA-templated. Additionally, it has been thought to be involved with essential biological processes such as immune response, especially adaptive immune response. CD4 is a member of critical cellular pathways, for instance, the cytokine-mediated signaling pathway, enzyme linked receptor protein signaling pathway and interleukin-15-mediated signaling

pathway. From a research standpoint, it is of biological interest due to its association with key macromolecules/ligands like Lck and IL-16. CD4 is a very popular antibody target, with over 185000 publications in the last decade. CD4 is frequently used in flow cytometry applications as a phenotypic marker for differentiation of cell types, especially in the study of immunology. This antibody was purified through affinity chromatography and conjugated to PerCP/Cy5.5 (ex/em = 489/679 nm). It is compatible with the 488 nm laser and 695/40 nm bandpass filter (for example, as in the BD FACSAria™ II).