

mFluor™ Blue 585 Anti-human CD4 Antibody *SK3*

Catalog Number: 100421Z0, 100421Z1
Unit Size: 100 tests, 500 tests

Product Details

Storage Conditions	Refrigerated (2-8 °C), Minimize light exposure
Expiration Date	12 months upon receiving

Chemical Properties

Appearance	Liquid
Molecular Weight	N/A

Soluble In

Spectral Properties

Excitation Wavelength	491 nm
Emission Wavelength	578 nm

Applications

SK3 is an anti-human monoclonal antibody that recognizes the CD4 antigen. CD4 (alternatively called T4 or Leu3a) is a 55 kD member of the Ig superfamily located on the surface of cells such as macrophages, T cells, and granulocytes. CD4 has been associated with important biological processes such as membrane organization, specifically the fusion of the virus membrane with the host plasma membrane. Furthermore, it is involved with vital cellular pathways, such as the T cell receptor signaling pathway, enzyme-linked receptor protein signaling pathway, and cytokine-mediated signaling pathway. In some organisms, CD4 positively regulates peptidyl-tyrosine phosphorylation, which is an enhancer of transcription and DNA-templated and is a positive regulator of the ERK1 and ERK2 cascade. From a research standpoint, it is of biological interest due to its association with essential macromolecules/ligands such as MHC Class II, gp120, IL-16, and Lck. CD4 is a very popular antibody target, with over 180000 publications in the last decade. CD4 is commonly used in flow cytometry applications as a phenotypic marker for differentiating cell types, especially in the study of immunology. This antibody was purified through affinity chromatography and conjugated to mFluor™ Blue 585 (ex/em = 491/578 nm). It is compatible with the 488 nm laser and 586/15 nm bandpass filter (for example, as in the BD FACSCelesta™).