

Product Data Sheet

Alexa Fluor® 700 anti-human CD4

Catalog # / Size: 317425 / 25 µg

317426 / 100 µg

Clone: OKT4

Isotype: Mouse IgG2b, κ

Reactivity: Human, Cross-Reactivity: Chimpanzee, Cynomolgus, Rhesus

Preparation: The antibody was purified by affinity chromatography, and conjugated with

Alexa Fluor® 700 under optimal conditions. The solution is free of

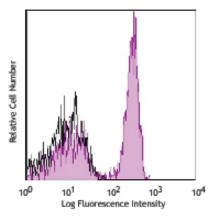
unconjugated Alexa Fluor® 700.

Formulation: Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.

Concentration: 0.5 mg/ml

Storage: The antibody solution should be stored undiluted at 4°C and protected from

prolonged exposure to light. Do not freeze.



Human peripheral blood lymphocytes stained with OKT4 Alexa Fluor® 700

Applications:

Applications: FC - Quality tested

Recommended Usage: This reagent is developed for immunofluorescent staining for flow cytometric analysis; the suggested use of this reagent is ≤1.0 µg per million cells in 100 µl volume. It is highly recommended that the reagent be titrated for optimal performance for each application.

> * Alexa Fluor® 700 has a maximum emission of 719 nm when it is excited at 633 nm / 635 nm. Prior to using Alexa Fluor® 700 conjugate for flow cytometric analysis, please verify your flow cytometer's capability of exciting and detecting the fluorochrome.

> * Alexa Fluor® 700 is a registered trademark of Molecular Probes, Inc. Alexa Fluor® 700 dye antibody conjugates are sold under license from Molecular Probes, Inc. for research use only, except for use in combination with microarrays and high content screening, and are covered by pending and issued patents.

Application Notes: The OKT4 antibody binds to the D3 domain of CD4 and does not block HIV binding. Additional reported applications (for the relevant formats) include: immunohistochemistry of frozen sections and blocking of T cell activation. The LEAF™ purified antibody (Endotoxin <0.1 EU/μg, Azide-Free, 0.2 μm filtered) is recommended for functional assays (Cat. No. 317404).

- **Application References:** 1. Knapp W, *et al.* 1989. Leucocyte Typing IV. Oxford University Press. New York. 2. Reinherz EL, *et al.* 1979. *Proc. Natl. Acad. Sci.* 76:4061.
 - 3. Kmieciak M, et al. 2009. J. Transl. Med. 7:89. (FC) PubMed 4. Cicin-Sain L, et al. 2010. J. Immunol. 184:6739. PubMed Rosenzweig M, et al. 2001. J. Med. Primatol. 30:36.
 Linder J, et al. 1987. Am. J. Pathol. 127:1.

 - 7. Boche D, et al. 1999. J. Neurovirol. 5:232. (IHC)

Description: CD4, also known as T4, is a 55 kD single-chain type I transmembrane glycoprotein expressed on most thymocytes, a subset of T cells, and monocytes/macrophages. CD4, a member of the Ig superfamily, recognizes antigens associated with MHC class II molecules and participates in cell-cell interactions, thymic differentiation, and signal transduction. CD4 acts as a primary receptor for HIV, binding to HIV gp120. CD4 has also been shown to interact with

Antigen References: 1. Center D, et al. 1996. Immunol. Today 17:476.

2. Gaubin M, et al. 1996. Eur. J. Clin. Chem. Clin. Biochem. 34:723.

Application Related Products: Product Clone FC, ICC, ICFC

Cell Staining Buffer RBC Lysis Buffer (10X)

FC, ICFC Alexa Fluor® 700 Mouse IgG2b, κ Isotype Ctrl MPC-11 FC, ICFC Human TruStain FcX™ (Fc Receptor Blocking Solution) FC, ICC, ICFC



