

# Product Data Sheet

## PE anti-human CD4

**Catalog # / Size:** 317409 / 25 tests  
317410 / 100 tests

**Clone:** OKT4

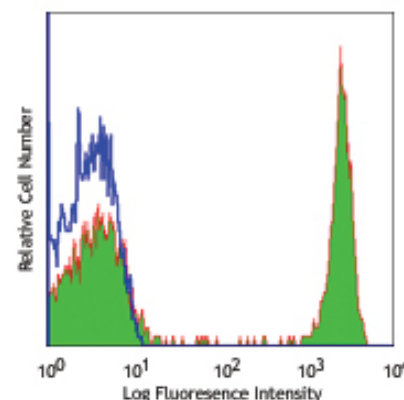
**Isotype:** Mouse IgG2b,  $\kappa$

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

**Preparation:** The antibody was purified by affinity chromatography, and conjugated with PE under optimal conditions. The solution is free of unconjugated PE and unconjugated antibody.

**Formulation:** Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and 0.2% (w/v) BSA (origin USA).

**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 PE

## Applications:

**Applications:** FC - Quality tested

**Recommended Usage:** Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. **Test size products are transitioning from 20  $\mu$ l to 5  $\mu$ l per test.** Please check your vial or your CoA to find the suggested use of this reagent per million cells in 100  $\mu$ l staining volume or per 100  $\mu$ l of whole blood. It is recommended that the reagent be titrated for optimal performance for each application. Read more at [www.biolegend.com/testsize](http://www.biolegend.com/testsize) regarding the test size change.

**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/ $\mu$ g, Azide-Free, 0.2  $\mu$ m filtered) is recommended for functional assays (Cat. No. 317404).

**Application References:**

- Knapp W, *et al.* 1989. Leucocyte Typing IV. Oxford University Press. New York.
- Reinherz EL, *et al.* 1979. *Proc. Natl. Acad. Sci.* 76:4061.
- Kmieciak M, *et al.* 2009. *J. Transl. Med.* 7:89. (FC) PubMed
- 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.
- 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 IL-16.

**Antigen References:**

- Center D, *et al.* 1996. *Immunol. Today* 17:476.
- Gaubin M, *et al.* 1996. *Eur. J. Clin. Chem. Clin. Biochem.* 34:723.

### Related Products:

**Product**  
PE Mouse IgG2b,  $\kappa$  Isotype Ctrl  
Cell Staining Buffer  
RBC Lysis Buffer (10X)  
Human TruStain FcX™ (Fc Receptor Blocking Solution)

**Clone**  
MPC-11

**Application**  
FC, ICFC  
FC, ICC, ICFC  
FC, ICFC  
FC, ICC, ICFC



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