PERFORMANCE DATA SHEET

1514

Monoclonal anti-human CD4/FITC*

mAb name/Clone: M-T441 *Isotype:* Mouse IgG2b

Immunogen: P815 cell transfected with human CD4

CATALOG#: 148-040

QUANTITY: 120 tests

VOLUME IN VIAL: 0.2 ml

WORKING DILUTION: 1:50 (or use 1.6ul of concentrated stock per 5 x 10⁵-cell test)

INFORMATION: Human CD4 is a cell surface glycoprotein of 55 kd expressed on most thymocytes, on about two thirds of peripheral T cells, and on some monocyte macrophage lineage cells. CD4 interacts with MHC Class II molecules in an accessory role during foreign antigen recognition by T cells. The extracellular portion of CD4 is an array of four Ig-like domains. The amino terminal region of CD4 is a receptor for the HIV-1 viral protein gp120. Antibody M-T441 recognizes the domain 2 region of the CD4 molecule and reacts with human CD4 cell transfectants.

References: Characterized by the laboratory of Dr. E.P. Reiber. Leukocyte Typing V (S.F. Schlossman, et al, eds.) Oxford University Press, Oxford, (1995) p. 476-478. R. König, et al, (1995) J Exp Med 182: 779-787.

STORAGE CONDITIONS: *Store at 2 - 5^oC*. Freeze/Thawing is not recommended. Protect from light.

PRODUCT STABILITY: Product should retain activity for at least 12 months after shipping date when stored as recommended. Ship Date:______

BUFFER: 50 mM Sodium Phosphate pH 7.5, 100 mM Potassium Chloride, 150mM NaCl, 5% Glycerol, 0.2% BSA, 0.04% NaN₃ (as a preservative).

PRODUCTION: Protein A purified antibody from tissue culture supernatant was reacted with FITC. Unconjugated FITC was separated from antibody/FITC conjugate by desalting column. The antibody/FITC conjugate is at **0.5 mg/ml** with a Fluorescein/Antibody molar ratio of 9.6.

PERFORMANCE: Five x 10^5 cultured **HPB-MLT** cells were washed and incubated 45 minutes on ice with 80 μ l of anti-CD4/FITC at a **1:50** dilution ($10 \mu g/ml$). Cells were washed three times, fixed and analyzed by FACS. Cells stained positive with a mean shift of **1.37** \log_{10} fluorescent units when compared to a Mouse IgG2b/FITC negative control (Catalog #284-040) at a similar concentration. Binding was blocked when pre incubated 10 minutes with 20 μ l of 0.5 mg/ml anti-CD4(M-T441) antibody (Catalog #148-020).

*This Product is intended for Laboratory Research use only.

Binding of anti-CD4(D2)/FITC to human HPB-MLT cells

