

# PERFORMANCE DATA SHEET

2212

## Monoclonal anti-mouse CD3/FITC\*

**mAb name/Clone:** 145-2C11

**Isotype:** IgG

**Immunogen:** Mouse BM10-37 T cell membrane prep

**CATALOG#:** 703-040

**QUANTITY:** 120 tests

**VOLUME IN VIAL:** 0.2ml

**WORKING DILUTION:** 1:50 (or use 1.6µl of concentrated stock per  $5 \times 10^5$ -cell test)

**INFORMATION:** Antibody 145-2C11 binds to an extracellular epitope of the 25 kd CD3e molecule present on murine T cells (1). CD3 molecules associate with T cell Receptors and provide intracellular signaling mechanism. Cross linking Cell surface CD3 with soluble or immobilized 145-2C11 can activate this mechanism(2).

**References:** 1) O Leo, J A Bluestone, et al. (1987) *PNAS USA* **84**(5): 1374-1378. 2) L E Samelson, J A Bluestone, et al. (1987) *J Immunol* **139**(8): 2708-2714.

**STORAGE CONDITIONS:** Store at 2 - 5°C. 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%  $\text{NaN}_3$  (as a preservative).

**PRODUCTION:** Protein G 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 **0.25 mg/ml** with a Fluorescein/IgG molar ratio of 10.8.

**PERFORMANCE:** Reagent was tested for binding to ACK lysed murine splenocytes in FACS. Five  $\times 10^5$  splenocytes per tube were washed and pre incubated with 20 µl of 300 µg/ml Mouse IgG (to block non specific binding), after which they were incubated 45 minutes on ice with 80 µl of anti-mouse CD3/FITC at a 1:50 dilution (5 µg/ml). They were then washed three times, fixed and analyzed by FACS. A **35%** sub population of the cells stained positive with a mean shift of **1.67**  $\log_{10}$  fluorescent units when compared to background. Binding was blocked when cells were pre incubated 10 minutes with 20 µl of 0.5 mg/ml anti-mouse CD3 antibody (Catalog #703-020).

*\*This Product is intended for Laboratory Research use only.*

**Binding of anti-Mouse CD3/FITC to RBC-lysed Splenocytes**

