## **Product Data Sheet**

## PE anti-human CD100

Catalog # / Size: 2242035 / 25 tests

2242040 / 100 tests

Clone: A8

**Isotype:** Mouse IgG1, κ

Immunogen: Human PHA activated lymphocytes

Reactivity: Human

**Preparation:** The antibody was purified by affinity

chromatography, and conjugated with PE under optimal conditions. The solution is free of unconjugated PE and

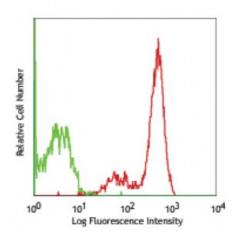
unconjugated antibody.

Formulation: Phosphate-buffered solution, pH 7.2,

containing 0.09% sodium azide and

0.2% (w/v) BSA (origin USA).

Concentration: Lot-specific



Human peripheral blood lymphocytes stained with A8 PE

## **Applications:**

**Applications:** Flow Cytometry

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 microL to 5 microL per test**. Please check your vial or your CoA to find the suggested use of this reagent per million cells in 100 microL staining volume or per 100 microL of whole blood. It is recommended that the reagent be titrated for optimal performance for each application.

Application

1. Hall K, et al. 1996. P. Natl. Acad. Sci. USA 93:11780.

References:

2. Mizrahi S, et al. 2007. *PLoS One.* 2(9):e818.

3. Yoshino N, et al. 2000. Exp. Anim. (Tokyo) 49:97. (FC)

**Description:** 

CD100, a 150 kD homodimer, is a novel semaphorin that induces B cells to aggregate and improves their viability in vitro. Semaphorins are neuronal chemorepellants that direct pioneering neurons during nervous system development. CD100 modifies CD40-CD40L B cell signaling by augmenting B cell aggregation and survival and down regulating CD23 expression. CD72 is a lymphocyte receptor for the class IV semaphorin CD100, which is involved in regulating B cell signaling. CD100 is expressed on resting and PHA stimulated T cells. The protein is weakly expressed on NK cells, EBV transformed B cells, monocytes and tumor/peripheral blood T cell lines, and at higher density on activated T cells and B cells.

Antigen References:

1. Schlossman SL Bloumsell W Gilks et al. eds. 1995. Leucocyte Typing V:White Cell Differentiation Antigens. Oxford University Press New York.

2. Bougeret CIG Mansur H Dastot et al. 1992. Increased surface expression of a newly identified 150 kDa