## **Product Data Sheet**

#### PE/Dazzle™ 594 anti-mouse CD16

Catalog # /  $1390060 / 100 \mu g$ 

**Size:** 1390055 / 25 μg

**Clone:** \$17014E

Isotype: Rat IgG2a, κ

Immunogen: Mouse CD16 - transfected cells

Reactivity: Mouse

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

chromatography and conjugated with

PE/Dazzle™ 594 under optimal

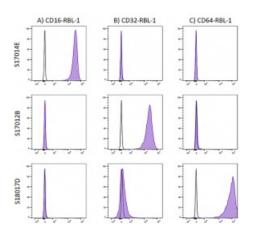
conditions.

**Formulation:** Phosphate-buffered solution, pH 7.2,

containing 0.09% sodium azide

Workshop Number: V-CD28.05

Concentration: 0.2 mg/mL



RBL-1 cells transfected with mouse A) CD16, B) CD32 or C) CD64 were stained with the following antibodies: Anti-mouse CD16 clone S17014E, Anti-mouse CD32 clone S17012B and Anti-mouse CD64 clone S18017D to confirm their specificity (filled histograms). Open histograms shows the corresponding isotype control.

### **Applications:**

**Applications:** Flow Cytometry

Recommended Usage:

Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. For flow cytometric staining, the suggested use of this reagent is  $\leq 0.5 \,\mu g$  per million cells in  $100 \,\mu L$  volume. It is recommended that the reagent be titrated for optimal performance for each

application.

\* PE/Dazzle™ 594 has a maximum excitation of 566 nm and a maximum

emission of 610 nm.

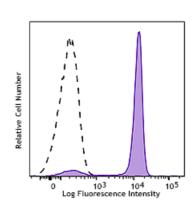
Clone S17014E does not cross-react

with CD32 or CD64.

Application Notes:

Clone S17016D cross-blocks antimouse NK1.1 clone PK136, and can stain for NK1.1 post-formal dehyde and methanol-based fixation based

on in-house testing.



C57BL/6 mouse bone marrow cells were stained with CD16
PE/Dazzle™ 594 (clone S17014E)
(filled histogram) or rat IgG2a, κ
PE/Dazzle™ 594 (open histogram). Data shown were gated on the myeloid cell population.

Application References:

1. Verjan Garcia N, et al. 2011. J. Immunol. 187:2268. (WB, IF)

#### Description:

CD16 also know as Fcgr3 is a 50-65 kD type I transmembrane protein, member of the Fc gamma receptor family and Ig superfamily. CD16 is expressed on most myeloid cells including monocytes, macrophages, dendritic cells, and is also expressed by NK cells and NKT cells. CD16 is involved in cell activation, phagocytosis, and antibody-dependent cell-mediated cytotoxicity (ADCC); its ligands are IgG1, IgG2a and IgG2b.

# Antigen References:

- 1. Nimmerjahn F1 & Ravetch JV. 2008. Nat Rev Immunol. 8(1):34-47.
- 2. Biburger M & Nimmerjahn F. 2012. Immunol Lett. 143(1):53-9.
- 3. Arase N, et al. 2003. J Immunol. 170:3054.