# **Product Data Sheet**

Con A-stimulated (3 days)

### KIRAVIA Blue 520™ anti-mouse CD25

Catalog # / 1110315 / 25 μg

**Size:** 1110320 / 100 µg

Clone: PC61

**Isotype:** Rat IgG1,  $\lambda$ 

Immunogen: IL-2-dependent cytolytic mouse T-

cell clone B6.1

Reactivity: Mouse

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

chromatography and conjugated with KIRAVIA Blue 520™ under optimal

conditions.

Formulation: Phosphate-buffered solution, pH 7.2,

containing 0.09% sodium azide

Concentration: 0.2 mg/mL

C57BL/6 mouse splenocytes were stained with CD25 (clone PC61) KIRAVIA Blue 520™ (filled histogram). Unstained control cells are represented by the open histogram.

## 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  $\leq 0.25~\mu g$  per million cells in  $100~\mu L$  volume. It is recommended that the reagent be titrated for optimal performance for each

application.

\* KIRAVIA Blue 520™ has an

excitation maximum of 495 nm, and a

maximum emission of 520 nm.

Application Notes:

Additional reported applications (for the relevant formats) include:

immunoprecipitation<sup>1,2</sup>, *in vitro* blocking of IL-2 binding to low- and high-affinity receptors<sup>1-4</sup>, growth inhibition of IL-2-dependent T-cell

lines<sup>1-4</sup>, *in vivo* depletion of CD25<sup>+</sup>CD4<sup>+</sup> Treg cells<sup>5-8,10</sup>, and immunohistochemical staining of acetone-fixed frozen sections<sup>2</sup>. PC61 antibody recognizes a different epitope than 3C7 antibody (Cat. No.

1109510).

C57BL/6 mouse splenocytes were stained with CD4 APC and CD25 (clone PC61) KIRAVIA Blue 520™ (left) or rat IgG1, κ KIRAVIA Blue 520™ isotype control (right).

#### **Application** References:

- 1. Lowenthal JW, et al. 1985. Nature 315:669. (IP, Block)
- 2. Ceredig R, et al. 1985. Nature 314:98. (IP, IHC, Block)
- 3. Lowenthal JW, et al. 1985. J. Immunol. 135:3988. (Block)
- 4. Moreau JL, et al. 1987. Eur. J. Immunol. 17:929. (Block)
- 5. Takahashi T, et al. 2000. J. Exp. Med. 192:303. (Deplete)
- 6. Onizuka S, et al. 1999. Cancer Res. 59:3128. (Deplete)
- 7. Lei TC, et al. 2005. Blood 105:4865. (Deplete)
- 8. Pasare C, et al. 2004. Immunity 21:733. (Deplete)
- 9. Leon-Ponte M, et al. 2007. Blood 109:3139.
- 10. Cao OW, et al. 2007. Blood doi:10.1182/blood-2007-02-073304. (Deplete)
- 11. Benson MJ, et al. 2007. J. Exp. Med. doi:10.1084/jem.20070719.
- 12. Liu F, et al. 2011. Arch Toxicol. 85:1383. PubMed
- 13. Anguela XM, et al. 2013. Diabetes. 62:551. PubMed

#### **Description:**

CD25 is a 55 kD glycoprotein also known as the low affinity IL-2R\alpha, Ly-43, p55, or Tac. It is expressed on activated T and B cells, thymocyte subsets, pre-B cells, and T regulatory cells. In association with CD122 (IL-2Rβ) and CD132 (common y chain), CD25 forms the high affinity signaling IL-2 receptor.

#### Antigen **References:**

- 1. Taniguchi T, et al. 1993. Cell 73:5.
- 2. Waldmann TA. 1991. J. Biol. Chem. 266:2681.
- 3. Read S, et al. 2000. J. Exp. Med. 192:295.
- 4. Lowenthal JW, et al. 1985. J. Immunol. 135:3988.