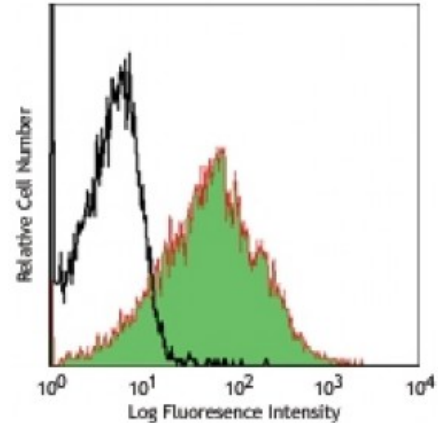


Alexa Fluor® 700 anti-mouse CD86

Catalog # / Size: 1125610 / 100 µg
Clone: PO3
Isotype: Rat IgG2b, κ
Immunogen: BALB/c mouse B leukemia cell line BCL1
Reactivity: Mouse
Preparation: The antibody was purified by affinity chromatography, and conjugated with Alexa Fluor® 700 under optimal conditions.
Formulation: Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.
Concentration: 0.5



LPS-stimulated (day-3) C57BL/6 mouse splenocytes stained with PO3 Alexa Fluor® 700

Applications:

Applications: Flow Cytometry

Recommended Usage: Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. The suggested use of this reagent is ≤1.0 microg per million cells in 100 microL volume. It is highly recommended that the reagent be titrated for optimal performance for each application.

* Alexa Fluor® 700 has a maximum emission of 719 nm when it is excited at 633 nm / 635 nm. Prior to using Alexa Fluor® 700 conjugate for flow cytometric analysis, please verify your flow cytometer's capability of exciting and detecting the fluorochrome.

Application Notes: Additional reported applications (for the relevant formats) include: *in vivo* and *in vitro* blocking^{1,4,5} of autoantibody production and T cell activation, stimulation of B cell activity³, immunoprecipitation², and immunohistochemical staining² of acetone-fixed frozen sections. The LEAF™ purified antibody (Endotoxin <0.1 EU/µg, Azide-Free, 0.2 µm filtered) is recommended for functional assays (Cat. No. 105108).

Application References:

1. Nakajima A, *et al.* 1995. *Eur. J. Immunol.* 25:3060.
2. Nuriya S, *et al.* 1996. *Int. Immunol.* 8:917.
3. Kasproicz DJ, *et al.* 2000. *J. Immunol.* 165:680.
4. Saito K, *et al.* 1998. *J. Immunol.* 160:4225.
5. Nakajima A, *et al.* 1998. *J. Immunol.* 161:1901.
6. Ma XT, *et al.* 2006. *Cancer Research* 66:1169.
7. Lawson BR, *et al.* 2007. *J. Immunol.* 178:5366.
8. Bhatnagar S and Schorey JS. 2007. *J. Biol. Chem.* doi:10.1074/jbc.M702277200.
9. Giroux M, *et al.* 2007. *J. Immunol.* 179:4492.
10. Luger R. *et al.* 2013. *PLoS One.* 8:e54879. [PubMed.](#)
11. Mayer E, *et al.* 2013. *Int Immunopharmacol.* 15:638. [PubMed.](#)

Description: CD86 is an 80 kD immunoglobulin superfamily member, also known as B7-2, B70, and Ly-58. CD86 is expressed on activated B and T cells, macrophages, dendritic cells and astrocytes. CD86 along with CD80 are the ligands of CD28 and CD152 (CTLA-4). CD86 is expressed earlier in the immune response than CD80. CD86

has also been shown to be involved in immunoglobulin class-switching and triggering of NK cell-mediated cytotoxicity. CD86 binds to CD28 to transduce co-stimulatory signals for T cell activation, proliferation, and cytokine production. CD86 can also bind to CD152, also known as CTLA-4, to deliver an inhibitory signal to T cells. The PO3 antibody has been shown to block autoantibody production *in vivo* and inhibit T cell activation *in vitro*.

**Antigen
References:**

1. Barclay A, *et al.* 1997. *The Leukocyte Antigen FactsBook* Academic Press.
2. Hathcock KS, *et al.* 1993. *Science* 262:905.
3. Freeman GJ, *et al.* 1993. *Science* 262:907.
4. Carreno BM, *et a*