SONY

Product Data Sheet

Purified anti-mouse/human CD276 (B7-H3)

Catalog # / Size: 1278010 / 100 µg

Clone: MIH35

Isotype: Rat IgG2a, κ

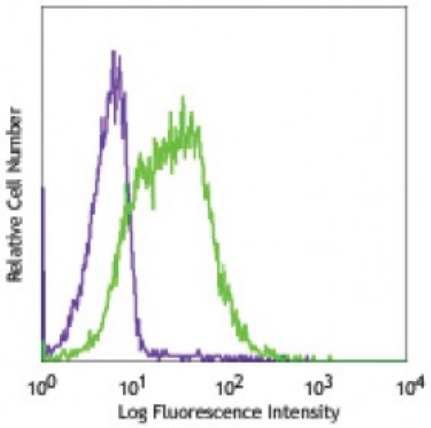
Immunogen: Mouse B7-H3 transfected L cell and P815

Reactivity: Human

Preparation: The antibody was purified by affinity chromatography.

Formulation: Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.

Concentration: 0.5



Mouse B7-H3 transfected P815 cells stained with MIH35 PE

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 ≤0.25 microg per million cells in 100 microL volume. It is recommended that the reagent be titrated for optimal performance for each application.

Application References:

1. Hashiguchi M, *et al.* 2008. *Proc Natl Acad Sci USA.* 105(30):10495.
2. del Rio ML, *et al.* 2011. *Transpl. Int.* 24:501. (FC) PubMed

Description: B7-H3 is a type I transmembrane protein belonging to the B7 family of co-stimulatory proteins. B7-H3 is mostly expressed on professional APCs including B cells, macrophages, and dendritic cells at low levels. It is detected on various human and murine tumor cells, nasal and airway epithelial cells. Its expression on dendritic cells appears to be up-regulated by LPS. Initial studies have shown that B7-H3 provides a stimulatory signal to T cells. However, recent studies suggest a negative regulatory role for B7-H3 in T cell responses. Mouse B7-H3 protein inhibited T cell activation and effector cytokine production. Thus, the immunological function of B7-H3 remains unclear. B7-H3 is involved in the suppression of Th1-mediated immune responses and plays an important role in the development of pathogenic Th2 cells in a murine asthma model. Monoclonal antibody against B7-H3 enhances T cell proliferation in vitro and leads to exacerbated EAE *in vivo*. It has been reported that the Triggering Receptor Expressed on Myeloid cells (TREM)-like Transcript 2 (TLT-2, TREML2) is a receptor for B7-H3 in mice, although it remains controversial. Further studies are needed to identify the receptor of B7-H3.

Antigen References:

1. Nagashima O, *et al.* 2008. *J. Immunol.* 181:4062
2. Prasad DVR, *et al.* 2004. *J. Immunol.* 173:2500
3. Sun M, *et al.* 2002. *J. Immunol.* 168:6294
4. Xu J, *et al.* 2006. *Cellu*

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