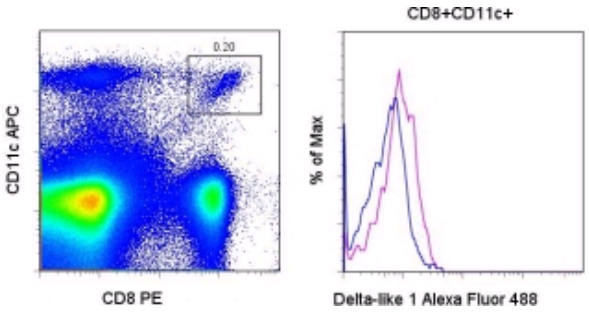
full spectrum cell analysis®
eBioscience®

Anti-Mouse DLL1 (delta-like 1) Alexa Fluor® 488

Catalog Number: 53-5767
Also Known As:DL1
RUO: For Research Use Only



Staining of $CD8^+CD11c^+$-gated C57BL/6 splenocytes with 0.5 µg of Armenian Hamster IgG Isotype Control Alexa Fluor® 488 (cat. 53-4888) (blue histogram) or 0.5 µg of Anti-Mouse DLL1 (delta-like 1) Alexa Fluor® 488 (purple histogram). Total viable cells were used for analysis.

Product Information

Contents: Anti-Mouse DLL1 (delta-like 1) Alexa Fluor® 488
REF Catalog Number: 53-5767
Clone: HMD1-5
Concentration: 0.5 mg/ml
Host/Isotype: Armenian Hamster IgG

Formulation: aqueous buffer, 0.09% sodium azide, may contain carrier protein/stabilizer
Temperature Limitation: Store at 2-8°C. Do not freeze. Light sensitive material.
LOT Batch Code: Refer to Vial
Use By: Refer to Vial
Caution, contains Azide

Description

The HMD1-5 monoclonal antibody reacts with mouse Delta-like 1, one of five type I transmembrane proteins that serves as a Notch receptor ligand. Upon binding the Notch receptor (e.g. Notch 1-4), Delta-like 1 undergoes proteolytic cleavage, first by ADAM-family metalloproteases and then by γ-secretase. The second cleavage event releases an intracellular fragment whose biological function remains controversial. Delta-like 1 is expressed by thymic stromal cells, as well as on macrophages, dendritic cells, and stromal cells in the spleen. This protein is also expressed in nonhematopoietic tissues such as the lung and brain. Delta-like 1 has been linked to B cell development and differentiation, especially marginal zone and plasma cells, regulation of splenic dendritic cells, and leukemogenesis.

Applications Reported

This HMD1-5 antibody has been reported for use in flow cytometric analysis.

Applications Tested

This HMD1-5 antibody has been tested by flow cytometric analysis on mouse splenocytes and transfected cells. This can be used at less than or equal to 1 µg per test. A test is defined as the amount (µg) of antibody that will stain a cell sample in a final volume of 100 µL. Cell number should be determined empirically but can range from 10^5 to 10^8 cells/test. It is recommended that the antibody be carefully titrated for optimal performance in the assay of interest.

References

Sekine C, Moriyama Y, Koyanagi A, Koyama N, Ogata H, Okumura K, Yagita H. Differential regulation of splenic CD8- dendritic cells and marginal zone B cells by Notch ligands. Int Immunol. 2009 Jan 30. (HMD1-5, FC, Pubmed)

Moriyama Y, Sekine C, Koyanagi A, Koyama N, Ogata H, Chiba S, Hirose S, Okumura K, Yagita H. Delta-like 1 is essential for the maintenance of marginal zone B cells in normal mice but not in autoimmune mice. Int Immunol. 2008 Jun;20(6):763-73. (HMD1-5, FC, Pubmed)

Mohtashami M, Zúñiga-Pflücker JC. Three-dimensional architecture of the thymus is required to maintain delta-like expression necessary for inducing T cell development. J Immunol. 2006 Jan 15;176(2):730-4.

Hozumi K, Negishi N, Suzuki D, Abe N, Sotomaru Y, Tamaoki N, Mailhos C, Ish-Horowicz D, Habu S, Owen MJ. Delta-like 1 is necessary for the generation of marginal zone B cells but not T cells in vivo. Nat Immunol. 2004 Jun;5(6):638-44.

Related Products

12-0081 Anti-Mouse CD8a PE (53-6.7)

17-0114 Anti-Mouse CD11c APC (N418)
53-4888 Armenian Hamster IgG Isotype Control Alexa Fluor® 488 (eBio299Arm)

Legal

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