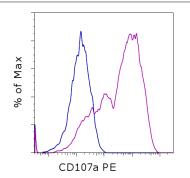


Anti-Mouse CD107a (LAMP-1) PE

Catalog Number: 12-1071 Also known as: lysosomal-associated membrane protein 1 RUO: For Research Use Only. Not for use in diagnostic procedures.



Intracellular staining of mouse thioglycolate-elicited peritoneal exudate cells with 0.5 ug of Rat IgG2a K Isotype Control PE (cat. 12-4321) (blue histogram) or 0.5 ug of Anti-Mouse CD107a (LAMP-1) PE (purple histogram). Total viable cells were used for analysis.

Product Information

 Contents: Anti-Mouse CD107a (LAMP-1) PE
 Formulation: aqueous buffer, 0.09% sodium azide, may contain carrier protein/stabilizer

 REF
 Catalog Number: 12-1071
 azide, may contain carrier protein/stabilizer

 Clone: eBio1D4B (1D4B)
 Temperature Limitation: Store at 2-8°C. Do not freeze. Light sensitive material.

 Host/Isotype: Rat IgG2a, kappa
 Batch Code: Refer to vial

 Use By: Refer to vial
 Use By: Refer to vial

 Caution, contains Azide
 Caution, contains Azide

Description

The eBio1D4B monoclonal antibody reacts with mouse CD107a, also known as lysosomal-associated membrane protein-1 (LAMP-1). CD107a is a type I, lysosomal membrane protein that is extensively glycosylated. It is expressed constitutively in the late endosomes-lysosomes in all cells. CD107a is also transiently expressed on the cell surface of degranulating cytolytic T cells. Additionally, CD107a has been implicated in a variety of cellular functions including cancer metastasis and is also a marker for lysosomal storage disorders.

Applications Reported

This eBio1D4B (1D4B) antibody has been reported for use in intracellular staining followed by flow cytometric analysis. It has also been reported for use in surface staining in a flow cytometric based degranulation assay.

Applications Tested

This eBio1D4B (1D4B) antibody has been tested by intracellular staining and flow cytometric analysis of thioglycolate-elicited peritoneal exudate cells. This can be used at less than or equal to 1 μ g per test. A test is defined as the amount (μ g) of antibody that will stain a cell sample in a final volume of 100 μ L. Cell number should be determined empirically but can range from 10⁵ to 10⁸ cells/test. It is recommended that the antibody be carefully titrated for optimal performance in the assay of interest.

References

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Gough NR, Zweifel ME, Martinez-Augustin O, Aguilar RC, Bonifacino JS, Fambrough DM. Utilization of the indirect lysosome targeting pathway by lysosome-associated membrane proteins (LAMPs) is influenced largely by the C-terminal residue of their GYXXphi targeting signals. J Cell Sci. 1999 Dec;112 (Pt 23):4257-69. (**1D4B**, IF, PubMed)



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Rohrer J, Schweizer A, Russell D, Kornfeld S. The targeting of Lamp1 to lysosomes is dependent on the spacing of its cytoplasmic tail tyrosine sorting motif relative to the membrane. J Cell Biol. 1996 Feb;132(4):565-76. (**1D4B**, immunoelectron microscopy, PubMed)

Chen JW, Pan W, D'Souza MP, August JT. Lysosome-associated membrane proteins: characterization of LAMP-1 of macrophage P388 and mouse embryo 3T3 cultured cells. Arch Biochem Biophys. 1985 Jun;239(2):574-86. (**1D4B**, CD107a purification, PubMed)

Related Products

00-4222 Flow Cytometry Staining Buffer 12-1079 Anti-Human CD107a (LAMP-1) PE (eBioH4A3) 12-4321 Rat IgG2a K Isotype Control PE (eBR2a) 53-1072 Anti-Mouse CD107b (LAMP-2) Alexa Fluor® 488 (eBioABL-93 (ABL-93))