

Purified anti-human HLA-DQ

Catalog # / Size: 318102 / 100 µg

Clone: HLADQ1

Isotype: Mouse IgG1, κ

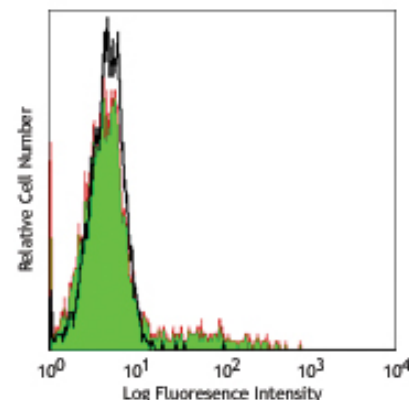
Reactivity: Human

Preparation: The antibody was purified by affinity chromatography.

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

Concentration: 0.5 mg/ml

Storage: The antibody solution should be stored undiluted at 4°C.



Human peripheral blood lymphocytes stained with purified HLA-DQ1, followed by anti-mouse IgG FITC

Applications:

Applications: FC - *Quality tested*
IHC - *Reported in the literature*

Recommended Usage: Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. For immunofluorescent staining, the suggested use of this reagent is ≤ 0.5 µg per 10⁶ cells in 100 µl volume or 100 µl of whole blood. It is recommended that the reagent be titrated for optimal performance for each application.

Application Notes: The antibody HLADQ1 reacts with HLA-DQ 4,5,6,7,8,9 but does not react with DQ2, DR or DP. Additional reported (for the relevant formats) applications include: immunohistochemical staining of acetone-fixed frozen sections and formalin-fixed paraffin-embedded tissues.

Application References: 1. Knapp W, *et al.* 1989. Leukocyte Typing IV. Oxford University Press. New York.

Description: HLA-DQ is also known as MHC class II DQ monomorphic antigen. The major histocompatibility complex is composed of two heterodimeric glycoproteins (α and β chains) with apparent molecular weights of 27 and 32 kD. In contrast to other MHC class II molecules, both polypeptide chains of HLA-DQ are polymorphic, with the α chain showing an extremely high degree of polymorphism. HLA-DQ is expressed on B cells in the peripheral blood, and weakly expressed on activated T cells and some monocytes. HLA-DQ is absent or hematopoietic progenitors, resting T cells, erythrocytes, and platelets. HLA-DQ is expressed after HLA-DR and HLA-DP in hematopoietic development. HLA-DQ presents peptide fragments mainly from degraded intravesicular and extracellular proteins to CD4⁺ T lymphocytes. Specific alleles of HLA-DQ have been linked to the pathogenesis of several autoimmune diseases (including diabetes), both as a susceptibility and resistance factor depending on the particular polymorphism.

Antigen References: 1. So AK, *et al.* 1987. *J. Immunol.* 139:3506.
2. Gyllenstein UB Erlih HA. 1989. *Proc. Natl. Acad. Sci. USA* 86:9986.
3. Sonderstrup G and McDevitt HO. 2001. *J. Clin. Invest.* 107:795.

Related Products:

Product
Purified Mouse IgG1, κ Isotype Ctrl
APC Goat anti-mouse IgG (minimal x-reactivity)
PE Goat anti-mouse IgG (minimal x-reactivity)
Cell Staining Buffer

Clone
MOPC-21
Poly4053
Poly4053

Application
FC, ICFC, ICC, IF, IHC, IP, WB
FC
FC
FC, ICC, ICFC



For research use only. Not for diagnostic use. Not for resale. BioLegend will not be held responsible for patent infringement or other violations that may occur with the use of our products.



*These products may be covered by one or more Limited Use Label Licenses (see the BioLegend Catalog or our website, www.biolegend.com/ordering#license). BioLegend products may not be transferred to third parties, resold, modified for resale, or used to manufacture commercial products, reverse engineer functionally similar materials, or to provide a service to third parties without written approval of BioLegend. By use of these products you accept the terms and conditions of all applicable Limited Use Label Licenses. Unless otherwise indicated, these products are for research use only and are not intended for human or animal diagnostic, therapeutic or commercial use.