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Technical Data Sheet

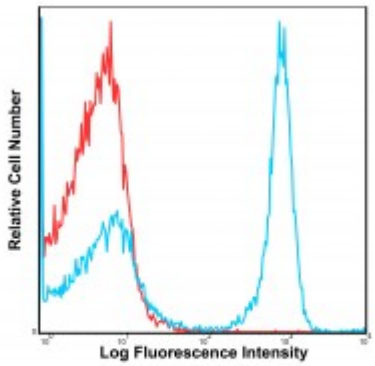
Anti-Mouse CD19 Biotin

Catalogue Number : 11212-30

RUO: For Research Use Only. Not for use in diagnostic procedures.

Product Information

Clone: 1D3
Format/Conjugate: Biotin
Concentration: 0.5 mg/mL
Reactivity: Mouse
Laser: Not Applicable
Peak Emission: Not Applicable
Peak Excitation: Not Applicable
Filter: Not Applicable
Brightness (1=dim,5=brightest): Not Applicable
Isotype: Rat IgG2a, kappa
Formulation: Phosphate-buffered aqueous solution, ≤0.09% Sodium azide, may contain carrier protein/stabilizer, ph7.2.
Storage: Product should be kept at 2-8°C and protected from prolonged exposure to light.
Applications: FC



C57Bl/6 splenocytes were stained with Biotin 1D3 followed by Streptavidin PE with relevant isotype control in Red.

Description

The 1D3 monoclonal antibody specifically reacts with mouse CD19, a 95 kDa transmembrane glycoprotein, a member of the Ig superfamily and a B cell-lineage differentiation antigen expressed by all the B lymphocyte development stages, except for the terminally differentiated plasma cells.
CD19 associates with CD21, CD81 and MHC class II to form a multi-molecular complex that initiates the mature B lymphocyte activation by interaction with the B-cell receptors. CD 19 enhances the B cell proliferation, development and activation, and the maturation of memory B cells. In CD19-deficient mice, the generation and maturation of B lymphocytes in the bone marrow and periphery are affected.

Preparation & Storage

The product should be stored undiluted at 4°C and should be protected from prolonged exposure to light. Do not freeze.
The monoclonal antibody was purified utilizing affinity chromatography and unreacted dye was removed from the product.

Application Notes

The antibody has been analyzed for quality through the flow cytometric analysis of the relevant cell type. For flow cytometric staining, the suggested use of this reagent is ≤0.125 ug per million cells in 100 µl volume. It is recommended that the reagent be titrated for optimal performance for each application.

References

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2. Krop, I., De Fougerolles, A. R., Hardy, R. R., Allison, M., Schlissel, M. S., Fearon, D. T. (1996). Self-renewal of B-1 lymphocytes is dependent on CD19.European journal of immunology,;26(1), 238-242.

3. Engel, P., Zhou, L. J., Ord, D. C., Sato, S., Koller, B., Tedder, T. F. (1995). Abnormal B lymphocyte delevopment, activation, and differentiation in mice that lack or overexpress the CD19 signal transduction molecule.;Immunity,;3(1), 39-50.

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email: info@bio-gems.com | domain: www.bio-gems.com | phone: 818.338.3312 | fax: 818.338.3316