

TECHNICAL DATA SHEET

PE Anti-Human CD19 (SJ25C1)

Catalog Number: 50-0198

PRODUCT INFORMATION

Contents: PE Anti-Human CD19 (SJ25C1)

Isotype: Mouse IgG1, kappa

Concentration: 5 µL (0.25 µg)/test

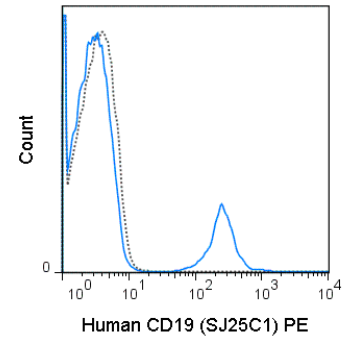
Clone: SJ25C1

Reactivity: Human

Use By: 12 months from date of receipt

Storage Conditions: 2-8°C protected from light

Formulation: 10 mM NaH₂PO₄, 150 mM NaCl, 0.09% NaN₃, 0.1% gelatin, pH7.2



Human peripheral blood lymphocytes were stained with 5 µL (0.25 µg) PE Anti-Human CD19 (50-0198) (solid line) or 0.25 µg PE Mouse IgG1 isotype control (dashed line).

DESCRIPTION

The SJ25C1 antibody reacts with human CD19, a 95 kDa glycoprotein which acts as a co-receptor, along with CD21 (CR2), CD81 (TAPA-1) and CD225 (Leu13), in support of the functional B cell receptor (BCR). This complex provides antigen-specific recognition and subsequent activation of B cells to proliferate and differentiate into antibody-secreting cells (plasma cells) or memory B cells, which are crucial for secondary antigen encounter. Upon activation and tyrosine phosphorylation, the CD19 molecule can provide an anchor for cytoplasmic signaling proteins such as GRB2, SOS or PLCG2. CD19 is a lineage-differentiation marker, as its expression is detectable at the earliest B cell stages, through development, and is finally lost upon transition to mature plasma cells. The SJ25C1 antibody is widely used as a phenotypic marker for CD19 expression on B cells, as well as on dendritic cell subsets.

PREPARATION & STORAGE

This monoclonal antibody was purified from tissue culture supernatant via affinity chromatography. The purified antibody was conjugated under optimal conditions, with unreacted dye removed from the preparation. It is recommended to store the product undiluted at 4°C, and protected from prolonged exposure to light. Do not freeze.

APPLICATION NOTES

This antibody preparation has been pre-titrated and quality-tested for flow cytometry using an appropriate cell type. The antibody has been diluted for use at 5 µL per test, defined as the amount of antibody that will stain a cell sample in a final volume of approximately 100 µL. The number of cells within a sample should be determined empirically, but typically ranges between 1x10⁵ to 1x10⁸ cells.

REFERENCES

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