

30-1068PC-Cy5.5: PerCP-Cy™ 5.5 Conjugated Anti-Human TCR gamma/delta Monoclonal Antibody (Clone: B1)

Clonality :	Monoclonal
Clone Name :	B1
Application :	FACS
Reactivity :	Human, Non-Human Primates
Alternative Name :	TCRG/D
Isotype :	Mouse IgG1 kappa

Description

The antigen-specific T cell receptor (TCR) is composed of either alpha and beta subunit, or gamma and delta subunit. Majority of T cells present in the blood, lymph and secondary lymphoid organs express TCR alpha/beta heterodimers, whereas the T cells expressing TCR gamma/delta heterodimers are localized mainly in epithelial tissues and at the sites of infection. The subunits of TCR heterodimers are covalently bonded and in the endoplasmic reticulum they associate with CD3 subunits to form functional TCR-CD3 complex. Lack of expression of any of the chains is sufficient to stop cell surface expression.

Specificity: The mouse monoclonal antibody B1 (also known as B1.1) recognizes an extracellular epitope of TCR gamma/delta, the subtype of T cell receptor expressed mainly in epithelial tissues and at the sites of infection.

Product Info

Amount :	100 tests
Purification :	Purified antibody is conjugated with activated tandem dye of activated Peridinin-Chlorophyll Protein-Cyanine 5.5 (PerCP-Cy™ 5.5) under optimum conditions and unconjugated antibody and free fluorochrome are removed by size-exclusion chromatography.
Content :	Stabilizing phosphate buffered saline (PBS), pH 7.4, 15 mM sodium azide
Storage condition :	Store at 2-8°C. Protect from prolonged exposure to light. Do not freeze.

Application Note

Flow cytometry: The reagent is designed for analysis of human blood cells using 4 µl reagent / 100 µl of whole blood or 10⁶ cells in a suspension. The content of a vial (0.4 ml) is sufficient for 100 tests.

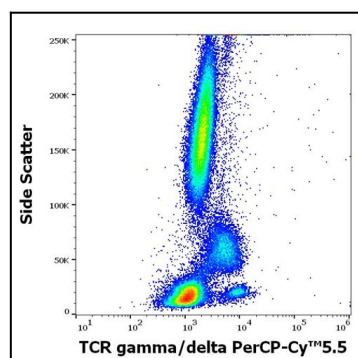


Figure 1: Flow cytometry surface staining pattern of human peripheral whole blood stained using anti-human TCR gamma/delta (B1) PerCP-Cy™ 5.5 antibody (4 µl reagent / 100 µl of peripheral whole blood).

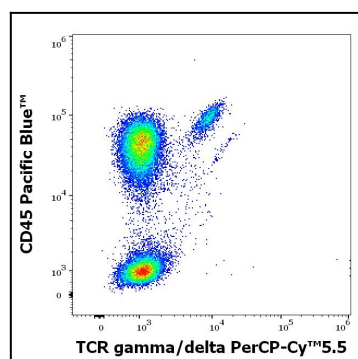


Figure 2: Flow cytometry multicolor surface staining pattern of human lymphocytes stained using anti-human CD3 (UCHT1) Pacific Blue™ antibody (4 µl reagent / 100 µl of peripheral whole blood) and anti-human TCR gamma/delta (B1) PerCP-Cy™ 5.5 antibody (4 µl reagent / 100 µl of peripheral whole blood).

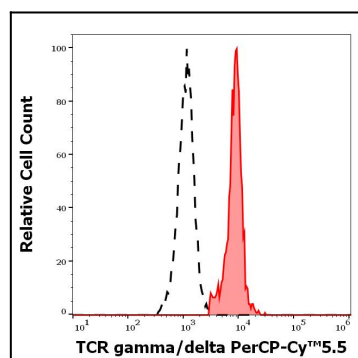


Figure 3: Separation of human TCR gamma/delta positive CD3 positive T cells (red-filled) from TCR gamma/delta negative CD3 negative lymphocytes (black-dashed) in flow cytometry analysis (surface staining) of human peripheral whole blood stained using anti-human TCR gamma/delta (B1) PerCP-Cy™ 5.5 antibody (4 µl reagent / 100 µl of peripheral whole blood).