

Anti-Mouse TCR Gamma/Delta Antibody, Clone GL3, Biotin



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Antibodies

Hamster (Armenian) monoclonal IgG2 antibody against mouse T cell receptor gamma/delta, biotin-conjugated

Catalog #60104BT	500 µg	0.5 mg/mL
#60104BT.1	100 µg	0.5 mg/mL
#60104BT.2	50 µg	0.5 mg/mL

Product Description

The GL3 antibody reacts with the δ chain of the murine T cell receptor γ/δ (TCR γ/δ or TCR gamma/delta), a subtype of the TCR involved in the recognition of both peptide and lipid antigens. TCR γ/δ comprises a heterodimer (~ 80 kDa in humans) of disulfide-linked γ and δ subunits that associates with CD3 on the cell surface. It is a member of the immunoglobulin superfamily. TCR γ/δ is expressed on a subpopulation of T cells in the circulation but may be found on up to 50% of the T cells in epithelial cell-rich tissues. TCR γ/δ T cells have been identified in the thymus, epidermis, intestinal and pulmonary epithelia, peritoneum, peripheral lymphoid tissues, and reproductive organ mucosa. These cells have roles in oral and tumor-associated tolerance as well as autoimmune disease, and have been described as a link between the adaptive and innate immune responses. Once activated, they secrete effector cytokines in a subtype- and context-specific manner. Most γ/δ T cells are CD4-/CD8-, though some express CD8. A subset, known as dendritic epidermal T cells, are CD90+ (Thy-1+). The GL3 antibody recognizes an epitope in the constant region of the δ chain, and can reportedly activate TCR γ/δ + cells.

Target Antigen Name:	T Cell Receptor Gamma/Delta
Alternative Names:	Gamma/Delta TCR , gdTCR, TCRgd, TCR γ/δ , T cell receptor delta chain, T cell receptor gamma chain, T cell receptor γ/δ , T3D, T3G
Gene ID:	110066/110067
Species Reactivity:	Mouse
Host Species:	Hamster (Armenian)
Clonality:	Monoclonal
Clone:	GL3
Isotype:	IgG2, kappa
Immunogen:	Mouse (C57BL/6J) intra-epithelial lymphocytes
Conjugate:	Biotin

Applications

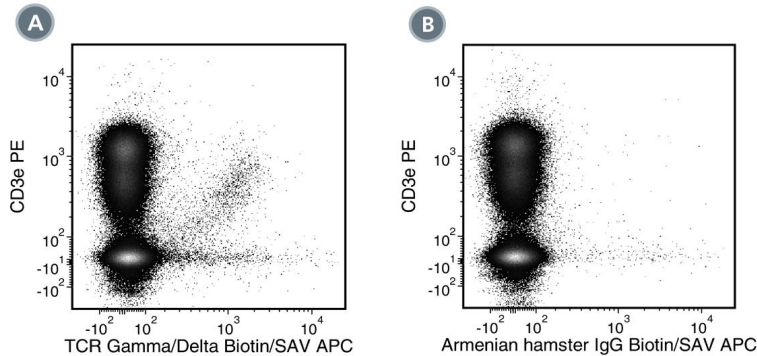
Verified:	CellSep, FC
Reported:	CellSep, FC, IF, IHC
Special Applications:	This antibody clone has been verified for purity assessments of cells isolated with EasySep™ kits, including EasySep Mouse T Cell Isolation Kit (Catalog #19851).

Abbreviations: CellSep: Cell separation; ChIP: Chromatin immunoprecipitation; FA: Functional assay; FACS: Fluorescence activated cell sorting; FC: Flow cytometry; ICC: Immunocytochemistry; IF: Immunofluorescence microscopy; IHC: Immunohistochemistry; IP: Immunoprecipitation; RIA: Radioimmunoassay; WB: Western blotting

Properties

Formulation:	Phosphate-buffered saline, pH 7.2, containing 0.09% sodium azide and 0.1% gelatin
Purification:	The antibody was purified by affinity chromatography and conjugated with biotin under optimal conditions. The solution is free of unconjugated biotin.
Stability and Storage:	Product stable at 2 - 8°C when stored undiluted. Do not freeze. For product expiry date, contact techsupport@stemcell.com.
Directions for Use:	For flow cytometry, the suggested use of this antibody is $\leq 0.25 \mu\text{g}$ per 1×10^6 cells in 100 μL . It is recommended that the antibody be titrated for optimal performance for each application.

Data



(A) Flow cytometry analysis of C57BL/6 mouse lymph node cells labeled with Anti-Mouse TCR Gamma/Delta Antibody, Clone GL3, Biotin followed by streptavidin (SAV) APC and Anti-Mouse CD3e Antibody, Clone 145-2C11, PE (Catalog #60015PE).

(B) Flow cytometry analysis of C57BL/6 mouse lymph node cells labeled with a biotinylated Armenian hamster IgG isotype control antibody followed by SAV APC and Anti-Mouse CD3e Antibody, Clone 145-2C11, PE.

Related Products

For a complete list of antibodies, including other conjugates, sizes and clones, as well as related products available from STEMCELL Technologies, visit www.stemcell.com/antibodies or contact us at techsupport@stemcell.com.

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