

APC/Fire™ 750 anti-human TSLPR (TSLP-R)

Catalog # / Size: 2214065 / 25 tests
2214070 / 100 tests

Clone: 1B4

Isotype: Mouse IgG1, κ

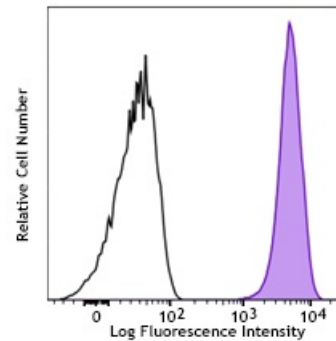
Immunogen: Human TSLP-R:Fc protein

Reactivity: Human, Other

Preparation: The antibody was purified by affinity chromatography and conjugated with APC/Fire™ 750 under optimal conditions.

Formulation: Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and 0.2% (w/v) BSA (origin USA)

Concentration: Lot-specific



TSLPR transfected Ba/F3 cells were stained with TSLPR (TSLP-R) (clone 1B4) APC/Fire™ 750 (filled histogram) or mouse IgG1, κ APC/Fire™ 750 isotype control (open histogram).

Applications:

Applications: Flow Cytometry

Recommended Usage: Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. For flow cytometric staining, the suggested use of this reagent is 5 µL per million cells in 100 µL staining volume or 5 µL per 100 µL of whole blood. It is recommended that the reagent be titrated for optimal performance for each application.

* APC/Fire™ 750 has a maximum excitation of 650 nm and a maximum emission of 787 nm.

Application Notes: For most successful immunofluorescent staining results, it may be important to maximize signal over background by using a relatively bright fluorochrome-antibody conjugate (Cat. No. 322805/322806) or by using a high sensitivity, three-layer staining technique (e.g., including a biotinylated anti-mouse IgG (Cat. No. 405303) second step, followed by SAV-PE (Cat. No. 405204)).

Description: TSLP-R, also known as the thymic stromal lymphopoietin protein receptor, cytokine receptor-like 2, CRL2, and IL-XR, is a type I membrane receptor that forms a functional heterodimeric complex with IL-7R to bind with TSLP. The TSLP-R contains a WSXWS motif required for proper protein folding and a box1 motif important for association with the JAKs. TSLP-R has a predicted molecular weight approximately 40 kD, and has two isoforms reported that are produced by alternative splicing. The TSLP-R is expressed preferentially in myeloid cells, dendritic cells, and activated monocytes. It is weakly expressed in T cells. Expression has also been reported in heart, skeletal muscle, and kidney tissues. TSLP binding to the heterodimeric functional receptor (TSLP-R and IL-7R) activates JAK2, STAT3, and STAT5 to stimulate cell proliferation. Ligand receptor interactions have been implicated in the development of the hematopoietic system, dendritic cell maturation, and the maintenance and polarization of human Th2 memory T cells in allergy diseases.

Antigen
References:

1. Reche PA, *et al.* 2001. *J. Immunol.* 167:336.
2. Tonozuka Y, *et al.* 2001. *Cytogenet. Cell. Genet.* 93:23.
3. Zhang W, *et al.* 2001. *Biochem. Biophys. Res. Commun.* 281:878.
4. Wang YH, *et al.* 2006. *Immunity* 24:827.