

TotalSeq™-B0565 anti-mouse MERTK (Mer) Antibody

Catalog# / Size	151525 / 10 µg
Clone	2B10C42
Regulatory Status	RUO
Other Names	Mer, Eyk, Nyk, nmf12
Isotype	Rat IgG2a, κ
Barcode Sequence	AGTAGAGCAACTCGT
Description	MerTK (Mer) is a member of the TAM (TYRO3/AXL/MerTK) family. It is a transmembrane protein with two fibronectin type-III domains, two Ig-like C2-type domains, and one tyrosine kinase domain. MerTK is mainly expressed by macrophages, monocytes, and dendritic cells. Its ligands are LGALS3, TUB, TULP1, and GAS6. MerTK is involved in the regulation of TLR signaling, efferocytosis, phagocytosis, cell survival, macrophage migration, and the inhibition of inflammation.

Product Details

Verified Reactivity	Mouse
Antibody Type	Monoclonal
Host Species	Rat
Immunogen	Mouse MERTK extracellular domain
Formulation	Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and 1 mM EDTA
Preparation	The antibody was purified by chromatography and conjugated with TotalSeq™-B oligomer under optimal conditions.
Concentration	0.5 mg/mL
Storage & Handling	The antibody solution should be stored undiluted between 2°C and 8°C. Do not freeze.
Application	PG - Quality tested
Recommended Usage	<p>Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis and the oligomer sequence is confirmed by sequencing. TotalSeq™-B antibodies are compatible with 10x Genomics Single Cell Gene Expression Solutions.</p> <p>To maximize performance, it is strongly recommended that the reagent be titrated for each application, and that you centrifuge the antibody dilution before adding to the cells at 14,000xg at 2 - 8°C for 10 minutes. Carefully pipette out the liquid avoiding the bottom of the tube and add to the cell suspension. For Proteogenomics analysis, the suggested starting amount of this reagent for titration is ≤ 1.0 µg per million cells in 100 µL volume. Refer to the corresponding TotalSeq™ protocol for specific staining instructions.</p> <p>Buyer is solely responsible for determining whether Buyer has all intellectual property rights that are necessary for Buyer's intended uses of the BioLegend TotalSeq™ products. For example, for any technology platform Buyer uses with TotalSeq™, it is Buyer's sole responsibility to determine whether it has all necessary third party intellectual property rights to use that platform and TotalSeq™ with that platform.</p>
Additional Product Notes	<p>TotalSeq™ reagents are designed to profile protein levels at a single cell level following an optimized protocol similar to the CITE-seq workflow. A compatible single cell device (e.g. 10x Genomics Chromium System and Reagents) and sequencer (e.g. Illumina analyzers) are required. Please contact technical support for more information, or visit biolegend.com/totalseq.</p> <p>The barcode flanking sequences are GTGACTGGAGTTTCAGACGTGTGCTCTTCCGATCTNNNNNNNNN (PCR handle), and NNNNNNNNNGCTTTAAGGCCGGTCCTAGC*A*A (capture sequence). N represents either randomly selected A, C, G, or T, and * indicates a phosphorothioated bond, to prevent nuclease</p>

degradation.

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RRID AB_2876510 (BioLegend Cat. No. 151525)

Antigen Details

Structure	Member of the TAM (TYRO3/AXL/MerTK) family. Encodes a transmembrane protein, two fibronectin type-III domains, two Ig-like C2-type domains, and one tyrosine kinase domain.
Distribution	Macrophages, monocytes, and dendritic cells.
Function	Regulates TLR signaling, efferocytosis, phagocytosis, cell survival, and macrophage migration. Inhibits production of inflammatory cytokines.
Interaction	Grb2, LimD4, and Vav1.
Ligand/Receptor	LGALS3, TUB, TULP1, and GAS6.
Cell Type	Dendritic cells, Macrophages, Monocytes
Biology Area	Apoptosis/Tumor Suppressors/Cell Death, Cell Biology, Costimulatory Molecules, Immunology, Innate Immunity, Neuroscience, Neuroscience Cell Markers
Molecular Family	Toll Like Receptors
Antigen References	<ol style="list-style-type: none">1. Zagórska A, <i>et al.</i> 2014. <i>Nat. Immunol.</i> 15:920.2. Toda S, <i>et al.</i> 2014. <i>Blood</i> 123:3963.3. Chung WS, <i>et al.</i> 2013. <i>Nature</i> 504:394.4. Carrera Silva EA, <i>et al.</i> 2013. <i>Immunity</i> 39:160.5. Yi Z, <i>et al.</i> 2009. <i>Blood</i> 114:3191.
Gene ID	17289

Related Protocols

[TotalSeq™-B or -C with 10x Feature Barcoding Technology](#)

Other Formats

Purified anti-mouse MERTK (Mer), PE anti-mouse MERTK (Mer), FITC anti-mouse MERTK (Mer), APC anti-mouse MERTK (Mer), Brilliant Violet 421™ anti-mouse MERTK (Mer), TotalSeq™-C0565 anti-mouse MERTK (Mer), APC/Cyanine7 anti-mouse MERTK (Mer), PE/Cyanine7 anti-mouse MERTK (Mer), PE/Dazzle™ 594 anti-mouse MERTK (Mer), Brilliant Violet 711™ anti-mouse MERTK (Mer), Brilliant Violet 605™ anti-mouse MERTK (Mer), TotalSeq™-B0565 anti-mouse MERTK (Mer), KIRAVIA Blue 520™ anti-mouse MERTK (Mer) Antibody

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