abcam

ab65089

Anti-LTBR antibody [5G11]

Key facts

Isotype	IgG2a
Host species	Rat
Storage buffer	Constituents: PBS, 0.1% BSA
Form	Liquid
Clonality	Monoclonal
Immunogen	Recombinant Protein within Mouse Ltbr. The exact immunogen used to generate this antibody is proprietary information. Database link P50284
Clone number	5G11
Purification technique	Affinity purification Protein G
Concentration	0.1 mg/mL The concentration of this product may be batch-dependent Batch concentration finder →
Purification notes	ab65089 was 0.2µm filtered.

Reactivity data

Flow Cyt

Tested

Species	Mouse
Dilution info	1/50
Notes	ab18450 - Rat monoclonal IgG2a, is suitable for use as an isotype control with this antibody.

IHC-P

Not recommended

Species	Mouse
Dilution info	-
Notes	-

IHC-Fr

Not recommended

Species	Mouse
Dilution info	-
Notes	-

Target data

See full target information Ltbr

Function	Receptor for the heterotrimeric lymphotoxin containing LTA and LTB, and for TNFS14/LIGHT. Activates NF-kappa-B signaling upon stimulation with lymphotoxin. Promotes apoptosis via TRAF3 and TRAF5. May play a role in the development of lymphoid organs. (Microbial infection) Plays a role in host defense against Zika virus infection.

Storage

Shipped at conditions	Blue Ice
Appropriate short-term storage duration	1-2 weeks
Appropriate short-term storage conditions	+4°C
Appropriate long-term storage conditions	+4°C
Aliquoting information	Upon delivery aliquot

Notes

This antibody is an agonist of LTBR in vitro and is provided in a low endotoxin format.

Supplementary info

This supplementary information is collated from multiple sources and compiled automatically.

Activity summary	LTBR (lymphotoxin beta receptor) also known as the TNFRSF3 is a significant protein that functions as a receptor for lymphotoxin and other related cytokines. The protein has a mass of around 62 kDa and is expressed in various tissues including lymphoid tissues and the epithelial cells of several organs. LTBR is present as a membrane-bound protein and helps mediate signaling that is important for cellular communication and function. Key interactions with ligands such as LTA and LIGHT activate signaling pathways which play roles in immune response.
Biological function summary	LTBR coordinates multiple cellular processes especially in immune regulation and homeostasis. It forms a complex with cytokines that binds to its extracellular domain triggering downstream signaling cascades. These cascades lead to activation of nuclear factor kappa B (NF-kB) which controls gene transcription and promotes survival and differentiation of immune cells. The capability of LTBR to interact with other TNF receptors expands its influence in lymphoid organogenesis and maintenance especially in maintaining the integrity of the lymphoid system.
Pathways	LTBR significantly participates in both the NF-kB and the non-canonical NF-kB pathways. These pathways are essential for regulating immune response and inflammation. Within these pathways LTBR interacts with other proteins such as TRAF3 and TRAF2 to mediate signaling processes. This arrangement allows for modulation of immune responses and is critical for recognizing and eliminating pathogens. Additionally the involvement of LTBR in immune system pathways aligns it with the functions of closely related proteins like TNF receptor superfamily members.
Associated diseases and disorders	LTBR has been implicated in autoimmune diseases and cancer. In autoimmunity aberrant signaling through LTBR may lead to inappropriate immune responses and inflammation as seen in disorders like systemic lupus erythematosus. Moreover in oncology abnormalities in LTBR signaling can influence tumor microenvironments and support tumor cell survival. Throughout these disease contexts LTBR often interacts with other risk-associated proteins such as NFKB1 highlighting its integration in complex pathological processes.

Product promise

Tested

We have tested this species and application combination and it works. It is covered by our product promise.

Expected

We have not tested this specific species and application combination in-house, but expect it will work. It is covered by our product promise.

Predicted

This species and application combination has not been tested, but we predict it will work based on strong homology. However, this combination is not covered by our product promise.

Not recommended

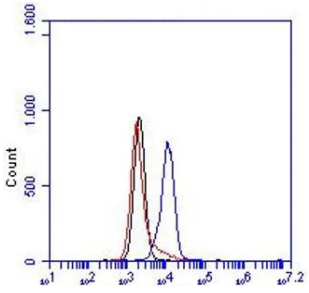
We do not recommend this combination. It is not covered by our product promise.

We are dedicated to supporting your work with high quality reagents and we are here for you every step of the way should you need us.

In the unlikely event of one of our products not working as expected, you are covered by our product promise.

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Terms & Conditions.

1 product image



Flow Cytometry - Anti-LTBR antibody [5G11] (ab65089)

LTBR Flow Cytometry staining using rat Anti-LTBR antibody

Detection of LT beta receptor in Wehi-167 cells. Red, black and blue line represent the isotype control, cells only and ab65089 at 10 µg/ml, respectively.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.