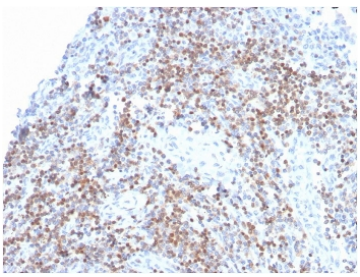
ZAP70 Antibody / Immune Signal Transduction Antibody [clone ZAP70/3921R] (V8564)

Catalog No.	Formulation	Size
V8564-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V8564-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V8564SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug

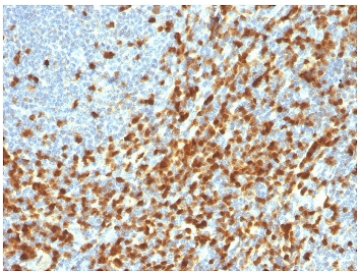
Recombinant RABBIT MONOCLONAL

Bulk quote request

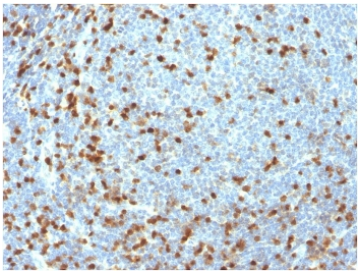
Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Host	Rabbit
Clonality	Recombinant Rabbit Monoclonal
Isotype	Rabbit IgG
Clone Name	ZAP70/3921R
Purity	Protein A affinity chromatography
UniProt	P43403
Localization	Cell surface, cytoplasmic
Applications	ELISA: 2-4ug/ml for coating (order Ab without BSA) Immunohistochemistry (FFPE): 1-2ug/ml for 30 minutes at RT
Limitations	This ZAP70 antibody is available for research use only.



ZAP70 Antibody / Immune Signal Transduction Antibody. Immunohistochemistry analysis of formalin-fixed, paraffin-embedded human tonsil tissue using ZAP70 Antibody / Immune Signal Transduction Antibody. Antigen retrieval was performed by boiling sections in pH 9 Tris-EDTA buffer for 20 minutes followed by cooling. Cytoplasmic HRP-DAB brown staining is observed in lymphoid cell populations within tonsillar follicles and interfollicular regions, consistent with Zeta-chain-associated protein kinase 70 (ZAP70) expression as a central mediator of immune signal transduction. The staining highlights active signaling networks within lymphocyte-rich regions and supports the use of ZAP70 for studying intracellular signal propagation in immune tissue architecture.



ZAP70 Antibody / Immune Signal Transduction Antibody. Immunohistochemistry analysis of formalin-fixed, paraffin-embedded human lymphoma tissue using ZAP70 Antibody / Immune Signal Transduction Antibody. Antigen retrieval was performed by boiling sections in pH 9 Tris-EDTA buffer for 20 minutes followed by cooling. Cytoplasmic HRP-DAB brown staining is observed in malignant lymphoid cells and surrounding lymphocyte populations, consistent with Zeta-chain-associated protein kinase 70 (ZAP70) expression as a key mediator of immune signal transduction. The staining pattern highlights active intracellular signaling networks within lymphoma tissue and supports the use of ZAP70 for evaluating signal propagation and pathway activity in lymphoid malignancy architecture.



IHC staining of FFPE human lymphoma with recombinant ZAP70 antibody. HIER: boil tissue sections in pH 9 10mM Tris with 1mM EDTA for 20 min and allow to cool before testing.

Description

Zeta-chain-associated protein kinase 70 (ZAP70) is a cytoplasmic tyrosine kinase that plays a central role in immune signal transduction by linking receptor activation to downstream intracellular signaling networks. ZAP70 Antibody is uniquely positioned for studying immune signal transduction processes, where it functions as a key intermediary connecting upstream receptor engagement with broad intracellular signaling pathways. ZAP70 antibody, also known as Zeta-chain-associated protein kinase 70 antibody or ZAP-70 antibody, is widely used to investigate how signaling cascades are propagated and integrated within immune cells.

Following activation of the T-cell receptor, ZAP70 initiates phosphorylation cascades that activate multiple downstream pathways, including MAPK, NF-kB, and calcium-dependent signaling. These pathways regulate gene expression, cellular metabolism, proliferation, and survival, forming a complex signaling network that governs immune cell behavior. Unlike receptor-focused studies, signal transduction research emphasizes how signals are transmitted, amplified, and coordinated within the cell.

This ZAP70 Antibody is uniquely positioned for analyzing signal transduction at the network level, rather than focusing exclusively on receptor initiation or kinase activation mechanics. Its use supports investigation of pathway crosstalk, signaling integration, and intracellular communication processes that define immune responses. This differentiator ensures that the page captures a broader signaling audience distinct from T-cell receptor-specific or phosphorylation-focused pages.

ZAP70 functions as a central node within these signaling networks, interacting with multiple adaptor proteins and kinases to propagate signals across different pathways. Its activity influences not only immediate signaling events but also downstream transcriptional and functional outcomes. This makes ZAP70 an important molecule for studying how immune cells coordinate complex responses to external stimuli.

In addition to T cells, ZAP70 contributes to signaling in natural killer cells, further supporting its role as a versatile signaling kinase across immune cell types. Its involvement in multiple pathways highlights its importance in maintaining proper immune function and coordinating cellular responses to activation signals.

Overall, ZAP70 Antibody provides a robust tool for investigating immune signal transduction, enabling detailed study of intracellular signaling networks, pathway integration, and the molecular mechanisms that govern immune cell function

beyond receptor-proximal events.

Application Notes

Optimal dilution of the ZAP70 Antibody / Immune Signal Transduction Antibody should be determined by the researcher.

Immunogen

A portion of amino acids 247-382 from the human protein was used as the immunogen for the ZAP70 Antibody / Immune Signal Transduction Antibody.

Storage

Store the recombinant ZAP70 antibody at 2-8oC (with azide) or aliquot and store at -20oC or colder (without azide).

Alternate Names

ZAP70 antibody, Zeta-chain-associated protein kinase 70 antibody, ZAP70 signal transduction antibody, ZAP70 intracellular signaling antibody, ZAP70 kinase signaling antibody

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