

# Anti-CD247 Antibody

Rabbit polyclonal antibody to CD247  
Catalog # AP60239

## Product Information

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<b>Application</b>	WB
<b>Primary Accession</b>	<a href="#">P20963</a>
<b>Other Accession</b>	<a href="#">P24161</a>
<b>Reactivity</b>	Human, Mouse, Rat, Rabbit, Monkey, Pig
<b>Host</b>	Rabbit
<b>Clonality</b>	Polyclonal
<b>Calculated MW</b>	18696

## Additional Information

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<b>Gene ID</b>	919
<b>Other Names</b>	CD3Z; T3Z; TCRZ; T-cell surface glycoprotein CD3 zeta chain; T-cell receptor T3 zeta chain; CD247
<b>Target/Specificity</b>	KLH-conjugated synthetic peptide encompassing a sequence within the center region of human CD247. The exact sequence is proprietary.
<b>Dilution</b>	WB~~WB (1/500 - 1/1000)
<b>Format</b>	Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.09% (W/V) sodium azide.
<b>Storage</b>	Store at -20 °C. Stable for 12 months from date of receipt

## Protein Information

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<b>Name</b>	CD247
<b>Synonyms</b>	CD3Z, T3Z, TCRZ
<b>Function</b>	Part of the TCR-CD3 complex present on T-lymphocyte cell surface that plays an essential role in adaptive immune response. When antigen presenting cells (APCs) activate T-cell receptor (TCR), TCR- mediated signals are transmitted across the cell membrane by the CD3 chains CD3D, CD3E, CD3G and CD247/CD3Z. All CD3 chains contain immunoreceptor tyrosine-based activation motifs (ITAMs) in their cytoplasmic domain. Upon TCR engagement, these motifs become phosphorylated by Src family protein tyrosine kinases LCK and FYN, resulting in the activation of downstream signaling pathways (PubMed: <a href="#">1384049</a> , PubMed: <a href="#">1385158</a> , PubMed: <a href="#">2470098</a> , PubMed: <a href="#">7509083</a> ). CD247/CD3Z ITAMs phosphorylation creates multiple docking sites for the protein kinase ZAP70 leading to ZAP70 phosphorylation and its conversion

into a catalytically active enzyme (PubMed:[7509083](#)). Plays an important role in intrathymic T-cell differentiation. Additionally, participates in the activity-dependent synapse formation of retinal ganglion cells (RGCs) in both the retina and dorsal lateral geniculate nucleus (dLGN) (By similarity).

#### Cellular Location

Cell membrane {ECO:0000250 | UniProtKB:P24161}; Single-pass type I membrane protein

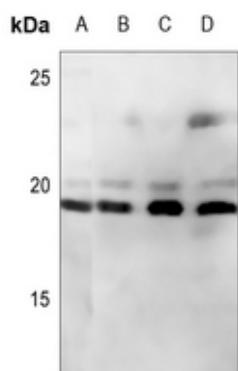
#### Tissue Location

Expressed in normal lymphoid tissue and in peripheral blood mononuclear cells (PBMCs) (PubMed:11722641)

## Background

KLH-conjugated synthetic peptide encompassing a sequence within the center region of human CD247. The exact sequence is proprietary.

## Images



Western blot analysis of CD247 expression in H1792 (A), mouse spleen (B), rat liver (C), rat spleen (D) whole cell lysates.

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