

## TRAF3 Antibody (C-term) Blocking peptide

Synthetic peptide Catalog # BP13945b

### **Specification**

## TRAF3 Antibody (C-term) Blocking peptide - Product Information

Primary Accession

<u>013114</u>

# TRAF3 Antibody (C-term) Blocking peptide - Additional Information

**Gene ID 7187** 

#### **Other Names**

TNF receptor-associated factor 3, 632-, CAP-1, CD40 receptor-associated factor 1, CRAF1, CD40-binding protein, CD40BP, LMP1-associated protein 1, LAP1, TRAF3, CAP1, CRAF1

## Target/Specificity

The synthetic peptide sequence used to generate the antibody AP13945b was selected from the C-term region of TRAF3. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

### **Format**

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

#### Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

#### **Precautions**

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

## TRAF3 Antibody (C-term) Blocking peptide - Protein Information

Name TRAF3 (HGNC:12033)

### **Function**

Cytoplasmic E3 ubiquitin ligase that regulates various signaling pathways, such as the NF-kappa-B, mitogen-activated protein kinase (MAPK) and interferon regulatory factor (IRF) pathways, and thus controls a lot of biological processes in both immune and non-immune cell types (PubMed:<a href="http://www.uniprot.org/citations/33148796" target="\_blank">33148796</a>, PubMed:<a href="http://www.uniprot.org/citations/33608556" target="\_blank">33608556</a>). In TLR and RLR signaling pathways, acts as an E3 ubiquitin ligase promoting the synthesis of 'Lys-63'-linked polyubiquitin chains on several substrates such as ASC that lead to the activation of the type I interferon response or the inflammasome (PubMed:<a

href="http://www.uniprot.org/citations/25847972" target="\_blank">25847972</a>, PubMed:<a href="http://www.uniprot.org/citations/27980081" target="\_blank">27980081</a>). Following the activation of certain TLRs such as TLR4, acts as a negative NF-kappa-B regulator, possibly to avoid unregulated inflammatory response, and its degradation via 'Lys-48'-linked polyubiquitination is





required for MAPK activation and production of inflammatory cytokines. Alternatively, when TLR4 orchestrates bacterial expulsion, TRAF3 undergoes 'Lys-33'- linked polyubiquitination and subsequently binds to RALGDS, mobilizing the exocyst complex to rapidly expel intracellular bacteria back for clearance (PubMed: <a href="http://www.uniprot.org/citations/27438768" target=" blank">27438768</a>). Acts also as a constitutive negative regulator of the alternative NF-kappa-B pathway, which controls B-cell survival and lymphoid organ development. Required for normal antibody isotype switching from IgM to IgG. Plays a role T-cell dependent immune responses. Down-regulates proteolytic processing of NFKB2, and thereby inhibits non-canonical activation of NF-kappa-B. Promotes ubiquitination and proteasomal degradation of MAP3K14.

### **Cellular Location**

Cytoplasm. Endosome {ECO:0000250|UniProtKB:Q60803} Mitochondrion. Note=Undergoes endocytosis together with TLR4 upon LPS signaling (By similarity). Co-localized to mitochondria with TRIM35 (PubMed:32562145) {ECO:0000250|UniProtKB:Q60803, ECO:0000269|PubMed:32562145}

## TRAF3 Antibody (C-term) Blocking peptide - Protocols

Provided below are standard protocols that you may find useful for product applications.

### Blocking Peptides

TRAF3 Antibody (C-term) Blocking peptide - Images

# TRAF3 Antibody (C-term) Blocking peptide - Background

The protein encoded by this gene is a member of the TNFreceptor associated factor (TRAF) protein family. TRAF proteins associate with, and mediate the signal transduction from, members of the TNF receptor (TNFR) superfamily. This protein participates in the signal transduction of CD40, a TNFR family member important for the activation of the immune response. This protein is found tobe a critical component of the lymphotoxin-beta receptor (LTbetaR)signaling complex, which induces NF-kappaB activation and celldeath initiated by LTbeta ligation. Epstein-Barr virus encodedlatent infection membrane protein-1 (LMP1) can interact with thisand several other members of the TRAF family, which may be ssential for the oncogenic effects of LMP1. Three alternatively spliced transcript variants encoding two distinct isoforms have been reported.

### TRAF3 Antibody (C-term) Blocking peptide - References

Bailey, S.D., et al. Diabetes Care 33(10):2250-2253(2010)Song, Y.J., et al. Virus Genes 41(2):174-180(2010)Perez de Diego, R., et al. Immunity 33(3):400-411(2010)del Rio-Espinola, A., et al. Pharmacogenomics 11(6):763-772(2010)Sanjo, H., et al. J. Biol. Chem. 285(22):17148-17155(2010)