

TNIK Antibody (C-term) Blocking Peptide Synthetic peptide Catalog # BP7970b

Specification

TNIK Antibody (C-term) Blocking Peptide - Product Information

Primary Accession

<u>Q9UKE5</u>

TNIK Antibody (C-term) Blocking Peptide - Additional Information

Gene ID 23043

Other Names TRAF2 and NCK-interacting protein kinase, TNIK, KIAA0551

Target/Specificity

The synthetic peptide sequence used to generate the antibody AP7970b was selected from the C-term region of human TNIK . 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.

TNIK Antibody (C-term) Blocking Peptide - Protein Information

Name TNIK

Synonyms KIAA0551

Function

Serine/threonine kinase that acts as an essential activator of the Wnt signaling pathway. Recruited to promoters of Wnt target genes and required to activate their expression. May act by phosphorylating TCF4/TCF7L2. Appears to act upstream of the JUN N- terminal pathway. May play a role in the response to environmental stress. Part of a signaling complex composed of NEDD4, RAP2A and TNIK which regulates neuronal dendrite extension and arborization during development. More generally, it may play a role in cytoskeletal rearrangements and regulate cell spreading. Phosphorylates SMAD1 on Thr-322.

Cellular Location

Nucleus. Cytoplasm. Recycling endosome. Cytoplasm, cytoskeleton. Note=Associated with



recycling endosomes and the cytoskeletal fraction upon RAP2A overexpression

Tissue Location

Expressed ubiquitously. Highest levels observed in heart, brain and skeletal muscle. Expressed in normal colonic epithelia and colorectal cancer tissues.

TNIK Antibody (C-term) Blocking Peptide - Protocols

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

Blocking Peptides

TNIK Antibody (C-term) Blocking Peptide - Images

TNIK Antibody (C-term) Blocking Peptide - Background

Germinal center kinases (GCKs), such as TNIK, are characterized by an N-terminal kinase domain and a C-terminal GCK domain that serves a regulatory function (Fu et al., 1999 [PubMed 10521462]).[supplied by OMIM]

TNIK Antibody (C-term) Blocking Peptide - References

Blume-Jensen P, et al. Nature 2001. 411: 355.Cantrell D, J. Cell Sci. 2001. 114: 1439.Jhiang S Oncogene 2000. 19: 5590.Manning G, et al. Science 2002. 298: 1912.Moller, D, et al. Am. J. Physiol. 1994. 266: C351-C359.Robertson, S. et al. Trends Genet. 2000. 16: 368.Robinson D, et al. Oncogene 2000. 19: 5548.Van der Ven, P, et al. Hum. Molec. Genet. 1993. 2: 1889.Vanhaesebroeck, B, et al. Biochem. J. 2000. 346: 561.Van Weering D, et al. Recent Results Cancer Res. 1998. 154: 271.