

Anti-TrkCT1 (RABBIT) Antibody

TrkCT1 Antibody Catalog # ASR5392

Specification

Anti-TrkCT1 (RABBIT) Antibody - Product Information

Host Rabbit

Conjugate Unconjugated **Target Species** Mouse

Reactivity Human, Mouse

Clonality **Polyclonal**

WB, E, IP, I, LCI Application **Application Note** This affinity purified antibody has been

tested for use in ELISA, IP, and western blotting. Specific conditions for reactivity should be optimized by the end user.

While the predicted molecular weight for TrkCT1 is approximately 68 kDa, the protein has been reported to migrate at about 95 kDa on western blots. The molecular weight noted for TrkCT1

depends somewhat upon the cell lysate or extract used for western blotting, and this

variation may be due to post-translational

modifications of the protein.

Physical State Liquid (sterile filtered) Buffer

0.02 M Potassium Phosphate, 0.15 M

Sodium Chloride, pH 7.2

Immunogen This affinity purified antibody was prepared from whole rabbit serum

> produced by repeated immunizations with a synthetic peptide corresponding to amino acids near the carboxyl terminus of

mouse TrkCT1 protein.

Preservative 0.01% (w/v) Sodium Azide

Anti-TrkCT1 (RABBIT) Antibody - Additional Information

Gene ID 18213

Other Names 18213

Purity

This affinity purified antibody is directed against mouse TrkCT1 protein. The product was affinity purified from monospecific antiserum by immunoaffinity chromatography. A BLAST analysis was used to suggest cross-reactivity with TrkCT1 protein from human, mouse and rat based on 100% homology with the immunizing sequence. Reactivity against homologues from other sources is not known.



Storage Condition

Store vial at -20° C prior to opening. Aliquot contents and freeze at -20° C or below for extended storage. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. This product is stable for several weeks at 4° C as an undiluted liquid. Dilute only prior to immediate use.

Precautions Note

This product is for research use only and is not intended for therapeutic or diagnostic applications.

Anti-TrkCT1 (RABBIT) Antibody - Protein Information

Name Ntrk3

Synonyms TrkC

Function

Receptor tyrosine kinase involved in nervous system and probably heart development. Upon binding of its ligand NTF3/neurotrophin-3, NTRK3 autophosphorylates and activates different signaling pathways, including the phosphatidylinositol 3-kinase/AKT and the MAPK pathways, that control cell survival and differentiation.

Cellular Location

Membrane; Single-pass type I membrane protein

Tissue Location

Isoform 2 expression is restricted to specific areas in adult brain. Isoform 3 transcripts are readily detected early during embryogenesis and are expressed predominantly in adult brain and gonads.

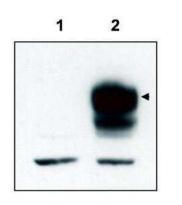
Anti-TrkCT1 (RABBIT) Antibody - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Anti-TrkCT1 (RABBIT) Antibody - Images





Western blot using Rockland's affinity purified anti-TrkCT1 to detect over-expressed TrkCT1 in HEK293 cells (Lane 2, arrowhead). Lane 1 is a non-transfected control. Cell extracts were resolved by electrophoresis and transferred to nitrocellulose. The membrane was probed with the primary antibody at a 1:3,000 dilution. Personal Communication, V. Coppola, CCR-NCI, Frederick, MD.

Anti-TrkCT1 (RABBIT) Antibody - Background

This antibody is designed, produced, and validated as part of a collaboration between Rockland and the National Cancer Institute (NCI) and is suitable for Cancer, Immunology and Nuclear Signaling research. TrkCT1, also named neurotrophic tyrosine kinase receptor type 3 (Ntrk3) non-catalytic isoform 2, is a non-catalytic isoform of TrkC, the high affinity receptor for Neurotrophin-3 (NT-3). This isoform lacks the kinase domain that is responsible for signaling by the full-length isoform. TrkCT1 is the product of an alternative splicing of Ntrk3 that leaves the extracellular and transmembrane domains intact but includes a shorter intracellular domain encoded by exons 13b and 14b. Recent studies indicate that the short cytoplasmic tail binds the scaffold protein Tamalin in a ligand-dependent manner and further activates the Arf6-Rac1 signaling pathway. Isoform 3 transcripts are readily detected early during embryogenesis and are expressed predominantly in adult brain and gonads.