

### NTRK3 Antibody

Purified Mouse Monoclonal Antibody Catalog # AO1312a

### Specification

# NTRK3 Antibody - Product Information

Application Primary Accession Reactivity Host Clonality Isotype Calculated MW **Description**  WB, IHC, E <u>016288</u> Human Mouse Monoclonal IgG1 94kDa KDa

NTRK3 (neurotrophic tyrosine kinase, receptor, type 3), it is a member of the neurotrophic tyrosine receptor kinase (NTRK) family and plays an important role in the development and maintenance of neural tissues. This kinase is a membrane-bound receptor that, upon neurotrophin binding, phosphorylates itself and members of the MAPK pathway. Signalling through this kinase leads to cell differentiation and may play a role in the development of proprioceptive neurons that sense body position. Mutations in this gene have been associated with medulloblastomas, secretory breast carcinomas and other cancers.

Immunogen

Purified recombinant extracellular fragment of human NTRK3 (aa32-429) fused with hIgGFc tag expressed in HEK293 cells.

**Formulation** Ascitic fluid containing 0.03% sodium azide.

### NTRK3 Antibody - Additional Information

Gene ID 4916

**Other Names** NT-3 growth factor receptor, 2.7.10.1, GP145-TrkC, Trk-C, Neurotrophic tyrosine kinase receptor type 3, TrkC tyrosine kinase, NTRK3, TRKC

Dilution WB~~1/500 - 1/2000 IHC~~1/200 - 1/1000 E~~N/A

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

#### Precautions

NTRK3 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.



# NTRK3 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** Widely expressed but mainly in nervous tissue. Isoform 2 is expressed at higher levels in adult brain than in fetal brain

## NTRK3 Antibody - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>
- NTRK3 Antibody Images

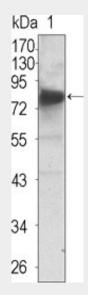


Figure 1: Western blot analysis using NTRK3 mouse mAb against extracellular domain of human



# NTRK3 (aa32-429).

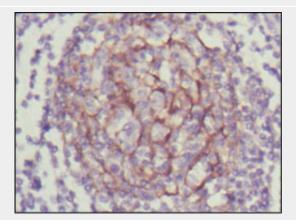


Figure 2: Immunohistochemical analysis of paraffin-embedded human lymph node using NTRK3 mouse mAb with DAB staining.

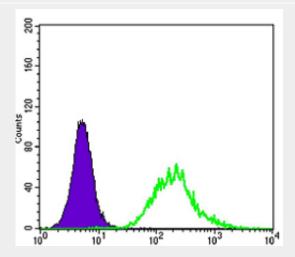


Figure 2: Flow cytometric analysis of K562 cells using MATK mouse mAb (green) and negative control (purple).

## **NTRK3 Antibody - References**

1. BMC Cancer. 2007 Oct 31;7:202. 2. J Pathol. 2002 Aug;197(5):661-7.