TBK1 (L-15): sc-9910



The Power to Question

BACKGROUND

The transcription factor NF κ B is retained in the cytoplasm in an inactive form by the inhibitory protein I κ B. Activation of NF κ B requires that I κ B be phosphorylated on specific serine residues, which results in targeted degradation of I κ B. I κ B kinase α (IKK α), previously designated CHUK, interacts with I κ B- α and specifically phosphorylates I κ B- α on the sites that trigger its degradation, serines 32 and 36. The functional IKK complex contains three subunits, IKK α , IKK β and IKK γ (also designated NEMO), and each appear to make essential contributions to I κ B phosphorylation. TANK binding kinase (TBK1), also designated T2K, is a novel IKK-related kinase that has been identified in murine and human tissues. TBK1 was shown to complex with TRAF2 and TANK in the NF κ B activation pathway. TBK1 shares homology with IKK α and IKK β in the amino-terminal half, which includes the kinase domain.

REFERENCES

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CHROMOSOMAL LOCATION.

Genetic locus: TBK1 (human) mapping to 12q14.2; Tbk1 (mouse) mapping to 10 D2.

SOURCE

TBK1 (L-15) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the C-terminus of TBK1 of mouse origin.

STORAGE

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PRODUCT

Each vial contains 200 μg IgG in 1.0 ml of PBS with <0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-9910 P, ($100 \mu g$ peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

TBK1 (L-15) is recommended for detection of TBK1 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

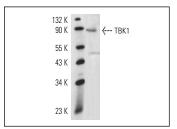
TBK1 (L-15) is also recommended for detection of TBK1 in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for TBK1 siRNA (h): sc-39058, TBK1 siRNA (m): sc-39059, TBK1 shRNA Plasmid (h): sc-39058-SH, TBK1 shRNA Plasmid (m): sc-39059-SH, TBK1 shRNA (h) Lentiviral Particles: sc-39058-V and TBK1 shRNA (m) Lentiviral Particles: sc-39059-V.

Molecular Weight of TBK1: 80 kDa.

Positive Controls: MCF7 whole cell lysate: sc-2206, Jurkat whole cell lysate: sc-2204 or RAW 264.7 whole cell lysate: sc-2211.

DATA



TBK1 (L-15): sc-9910. Western blot analysis of TBK1 expression in RAW 264.7 whole cell lysate.

SELECT PRODUCT CITATIONS

 Nociari, M., et al. 2009. Adenovirus induction of IRF3 occurs through a binary trigger targeting Jun N-terminal kinase and TBK1 kinase cascades and type I interferon autocrine signaling. J. Virol. 83: 4081-4091.

RESEARCH USE

For research use only, not for use in diagnostic procedures.



Try **TBK1 (A-6): sc-398366** or **TBK1 (6D603): sc-73115**, our highly recommended monoclonal alternatives to TBK1 (L-15).