# IP3KB (h): 293T Lysate: sc-373437



The Power to Question

# **BACKGROUND**

Inositol 1,4,5-trisphosphate (Ins(1,4,5)P3) regulates the level of calcium within the cell by releasing calcium from intracellular stores. Ins(1,4,5)P3 is phosphorylated by inositol 1,4,5-trisphosphate 3-kinase (IP3K) to form inositol 1,3,4,5-tetrakisphosphate (Ins(1,4,5)P4), which is is thought to regulate the influx of calcium across the plasma membrane. IP3K exists as three isoforms, IP3KA, B, and C. IP3KA, the most highly characterized isoform, is expressed in rat brain and testis. IP3KB is expressed in various rat tissues such as lung, thymus, testis, brain, and heart. IP3K activity is stimulated in the presence of calmodulin via phosphorylation by cAMP-dependent protein kinase, protein kinase C, or calcium/calmodulin dependent protein kinase II and, subsequently, mediates the inositol phosphate signaling pathways.

# **REFERENCES**

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# **CHROMOSOMAL LOCATION**

Genetic locus: ITPKB (human) mapping to 1q42.12.

# **PRODUCT**

IP3KB (h): 293T Lysate represents a lysate of human IP3KB transfected 293T cells and is provided as 100  $\mu$ g protein in 200  $\mu$ l SDS-PAGE buffer.

#### **STORAGE**

Store at -20° C. Repeated freezing and thawing should be minimized. Sample vial should be boiled once prior to use. Non-hazardous. No MSDS required.

# **RESEARCH USE**

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

# **APPLICATIONS**

IP3KB (h): 293T Lysate is suitable as a Western Blotting positive control for human reactive IP3KB antibodies. Recommended use: 10-20 µl per lane.

Control 293T Lysate: sc-117752 is available as a Western Blotting negative control lysate derived from non-transfected 293T cells.

# **PROTOCOLS**

See our web site at www.scbt.com for detailed protocols and support products.

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