BACKGROUND

TSSK 2 (testis-specific serine kinase 2), also known as DGS-G (DiGeorge syndrome protein G), SPOGA2 or STK22B (serine/threonine-protein kinase 22B), is a testis-specific serine/threonine kinase that belongs to the CAMK serine/threonine-protein kinase family. Localizing to the cytoplasm, TSSK 2 contains one protein kinase domain and is believed to play a role in the late stages of spermatogenesis. TSSK 2 shares 83% amino acid identity with the related protein kinase TSSK 1. Specifically, TSSK 2 uses magnesium as a cofactor and catalyzes the transfer of a phosphate from ATP to a target protein, such as SPAG16. Loss of TSSK 2 due to chromosomal deletion has been implicated in velocardiofacial/DiGeorge syndrome (VCFS/DGS), a disorder of development that is characterized by palate anomalies, facial anomalies, immunodeficiency, conotruncal cardiac malformations and hypocalcemia.

REFERENCES


CHROMOSOMAL LOCATION

Genetic locus: TSSK2 (human) mapping to 22q11.21.

SOURCE

TSSK 2 (S-09) is a mouse monoclonal antibody raised against recombinant TSSK 2 of human origin.

PRODUCT

Each vial contains 50 µg IgG1 in 0.5 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

TSSK 2 (S-09) is recommended for detection of TSSK 2 of 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), immunohistochemistry (including paraffin-embedded sections) (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1.30-1:3000).

Suitable for use as control antibody for TSSK 2 siRNA (h): sc-76768. TSSK 2 shRNA Plasmid (h): sc-76768-SH and TSSK 2 shRNA (h) Lentiviral Particles: sc-76768-V.

Molecular Weight of TSSK 2: 41 kDa.

Positive Controls: HeLa whole cell lysate: sc-2200.

DATA

TSSK 2 (S-09): sc-100437. Western blot analysis of TSSK 2 expression in HeLa whole cell lysate.

SELECT PRODUCT CITATIONS


STORAGE

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

RESEARCH USE

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

PROTOCOLS

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