TEX13A (P-14): sc-169564



The Power to Question

BACKGROUND

TEX13A (Testis-expressed sequence 13A) is a 409 amino acid protein that is expressed specifically in the testis. One of two human orthologs of the mouse Tex13 protein, TEX13A contains one RanBP2-type zinc finger domain; a motif that is thought to be involved in nucleocytoplasmic transport. Like its mouse counterpart, the gene encoding TEX13A is located on chromosome X, suggesting a possible role in the pre-meiotic stages of mammalian spermatogenesis. Translocations in the chromosomal region in which the TEX13A gene is located may be involved in the pathogenesis of azoospermia, a condition characterized by a complete absence of sperm in male semen. Chromosome X contains nearly 153 million base pairs and houses over 1,000 genes. In conjunction with chromosome Y, chromosome X is responsible for sex determination. There are a number of conditions related to an abnormal number and combination of sex chromosomes, some of which include Turner's syndrome, color blindness, hemophilia and Duchenne muscular dystrophy.

REFERENCES

- Givens, J.R., Wilroy, R.S., Summitt, R.L., Andersen, R.N., Wiser, W.L. and Fish, S.A. 1975. Features of Turner's syndrome in women with polycystic ovaries. Obstet. Gynecol. 45: 619-624.
- Patzak, D., Zhuchenko, O., Lee, C.C. and Wehnert, M. 1999. Identification, mapping, and genomic structure of a novel X-chromosomal human gene (SMPX) encoding a small muscular protein. Hum. Genet. 105: 506-512.
- 3. Wang, P.J., McCarrey, J.R., Yang, F. and Page, D.C. 2001. An abundance of X-linked genes expressed in spermatogonia. Nat. Genet. 27: 422-426.
- Online Mendelian Inheritance in Man, OMIM™. 2002. Johns Hopkins University, Baltimore, MD. MIM Number: 300312. World Wide Web URL: http://www.ncbi.nlm.nih.gov/omim/
- Lee, S., Lee, S.H., Chung, T.G., Kim, H.J., Yoon, T.K., Kwak, I.P., Park, S.H., Cha, W.T., Cho, S.W. and Cha, K.Y. 2003. Molecular and cytogenetic characterization of two azoospermic patients with X-autosome translocation. J. Assist. Reprod. Genet. 20: 385-389.
- Wang, P.J., Page, D.C. and McCarrey, J.R. 2005. Differential expression of sex-linked and autosomal germ-cell-specific genes during spermatogenesis in the mouse. Hum. Mol. Genet. 14: 2911-2918.

CHROMOSOMAL LOCATION

Genetic locus: Tex13a (mouse) mapping to X F1.

SOURCE

TEX13A (P-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of TEX13A of mouse origin.

PRODUCT

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

Blocking peptide available for competition studies, sc-169564 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

TEX13A (P-14) is recommended for detection of TEX13A of mouse 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); non cross-reactive with TEX13B.

Suitable for use as control antibody for TEX13A siRNA (m): sc-154212, TEX13A shRNA Plasmid (m): sc-154212-SH and TEX13A shRNA (m) Lentiviral Particles: sc-154212-V.

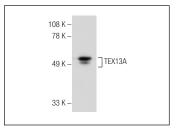
Molecular Weight of TEX13A: 46 kDa.

Positive Controls: mouse testis extract: sc-2405.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

DATA



TEX13A (P-14): sc-169564. Western blot analysis of TEX13A expression in mouse testis tissue extract.

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.



Try **TEX13A (F-7): sc-390891**, our highly recommended monoclonal alternative to TEX13A (P-14).