# SANTA CRUZ BIOTECHNOLOGY, INC.

# TSNAXIP1 (H-198): sc-292015



The Power to Question

## BACKGROUND

TSNAXIP1 (translin-associated factor X-interacting protein 1) is a 658 amino acid gene product believed to interact with TSNAX (translin-associated factor X). TSNAX, a translin family protein, is often found as a sumoylated perinuclear association factor. The TSNAX gene is located immediately upstream of DISC1 (disrupted-in-Schizophrenia-1) and together are candidate genes in relation to psychiatric illness, as one transcript variation may result from intergenic splicing to encode a novel TSNAX-DISC1 fusion protein. The gene encoding TSNAXIP1 is located on chromosome 16 which encodes over 900 genes in approximately 90 million base pairs, makes up nearly 3% of human cellular DNA and is associated with a variety of genetic disorders. The GAN gene is located on chromosome 16 and, with mutation, may lead to giant axonal neuropathy, a nervous system disorder characterized by increasing malfunction with growth. The rare disorder Rubinstein-Taybi syndrome is also associated with chromosome 16, though through the CREBBP gene which encodes a critical CREB binding protein.

# REFERENCES

- 1. Williams, J.M., et al. 2009. A 1q42 deletion involving DISC1, DISC2, and TSNAX in an autism spectrum disorder. Am. J. Med. Genet. A 149A: 1758-1762.
- 2. Lluis, M., et al. 2010. Analysis of nucleic acid binding by a recombinant translin-trax complex. Biochem. Biophys. Res. Commun. 396: 709-713.
- 3. Jaendling, A., et al. 2010. Biological roles of translin and translin-associated factor-X: RNA metabolism comes to the fore. Biochem. J. 429: 225-234.
- Schosser, A., et al. 2010. Association of DISC1 and TSNAX genes and affective disorders in the depression case-control (DeCC) and bipolar affective case-control (BACCS) studies. Mol. Psychiatry 15: 844-849.
- Okuda, A., et al. 2010. Translin-associated factor X gene (TSNAX) may be associated with female major depressive disorder in the Japanese population. Neuromolecular Med. 12: 78-85.

## CHROMOSOMAL LOCATION

Genetic locus: TSNAXIP1 (human) mapping to 16q22.1; Tsnaxip1 (mouse) mapping to 8 D3.

# SOURCE

TSNAXIP1 (H-198) is a rabbit polyclonal antibody raised against amino acids 63-260 mapping within an internal region of TSNAXIP1 of human origin.

#### PRODUCT

Each vial contains 200  $\mu g$  lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Available as TransCruz reagent for Gel Supershift and ChIP applications, sc-292015 X, 200  $\mu g/0.1$  ml.

# **STORAGE**

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

## APPLICATIONS

TSNAXIP1 (H-198) is recommended for detection of TSNAXIP1 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2  $\mu$ g per 100-500  $\mu$ g 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).

Suitable for use as control antibody for TSNAXIP1 siRNA (h): sc-93031, TSNAXIP1 siRNA (m): sc-154722, TSNAXIP1 shRNA Plasmid (h): sc-93031-SH, TSNAXIP1 shRNA Plasmid (m): sc-154722-SH, TSNAXIP1 shRNA (h) Lentiviral Particles: sc-93031-V and TSNAXIP1 shRNA (m) Lentiviral Particles: sc-154722-V.

TSNAXIP1 (H-198) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

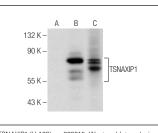
Molecular Weight of TSNAXIP1: 76 kDa.

Positive Controls: TSNAXIP1 (h2): 293T Lysate: sc-111820 or mouse lung extract: sc-2390.

## **RECOMMENDED SECONDARY REAGENTS**

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (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 goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

#### DATA



TSNAXIP1 (H-198): sc-292015. Western blot analysis of TSNAXIP1 expression in non-transfected: sc-111752 (A) and human TSNAXIP1 transfected: sc-111820 (B) 293T whole cell lysates and mouse lung tissue extract (C).

# **RESEARCH USE**

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

#### PROTOCOLS

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