

ZCCHC17 (Q-12): sc-160936

BACKGROUND

Zinc-finger proteins contain DNA-binding domains and have a wide variety of functions, most of which encompass some form of transcriptional activation or repression. ZCCHC17 (zinc finger, CCHC domain containing 17), also known as PS1D (putative S1 RNA-binding domain protein), Pnn (Pinin)-interacting nucleolar protein or pNO40, is a 241 amino acid protein that associates with both Pinin and the 60S ribosomal subunit. Localizing to nucleolus, ZCCHC17 is ubiquitously expressed and has been suggested to play a role in ribosome maturation and biogenesis. ZCCHC17 contains one CCHC-type zinc finger, a S1 motif domain and exists as two alternatively spliced isoforms that map to human chromosome 1p35.2. Human chromosome 1 spans 260 million base pairs, contains over 3,000 genes, comprises nearly 8% of the human genome and houses a large number of disease-associated genes, including those that are involved in Stickler syndrome, Parkinson's disease, Gaucher disease and Usher syndrome.

REFERENCES

1. Eudy, J.D., et al. 1998. Mutation of a gene encoding a protein with extracellular matrix motifs in Usher syndrome type IIa. *Science* 280: 1753-1757.
2. Lau, E.K., et al. 1999. Two novel polymorphic sequences in the glucocerebrosidase gene region enhance mutational screening and founder effect studies of patients with Gaucher disease. *Hum. Genet.* 104: 293-300.
3. Zhang, Q.H., et al. 2000. Cloning and functional analysis of cDNAs with open reading frames for 300 previously undefined genes expressed in CD34⁺ hematopoietic stem/progenitor cells. *Genome Res.* 10: 1546-1560.
4. Gueydan, C., et al. 2002. Identification of ribosomal proteins specific to higher eukaryotic organisms. *J. Biol. Chem.* 277: 45034-45040.
5. Chang, W.L., et al. 2003. Molecular characterization of a novel nucleolar protein, pNO40. *Biochem. Biophys. Res. Commun.* 307: 569-577.
6. Betarbet, R., et al. 2008. FAS-associated factor 1 and Parkinson's disease. *Neurobiol. Dis.* 31: 309-315.

CHROMOSOMAL LOCATION

Genetic locus: ZCCHC17 (human) mapping to 1p35.2; Zcchc17 (mouse) mapping to 4 D2.2.

SOURCE

ZCCHC17 (Q-12) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of ZCCHC17 of human origin.

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-160936 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

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

APPLICATIONS

ZCCHC17 (Q-12) is recommended for detection of ZCCHC17 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); non cross-reactive with other ZCCHC family members.

ZCCHC17 (Q-12) is also recommended for detection of ZCCHC17 in additional species, including equine, canine, bovine and avian.

Suitable for use as control antibody for ZCCHC17 siRNA (h): sc-88347, ZCCHC17 siRNA (m): sc-155475, ZCCHC17 shRNA Plasmid (h): sc-88347-SH, ZCCHC17 shRNA Plasmid (m): sc-155475-SH, ZCCHC17 shRNA (h) Lentiviral Particles: sc-88347-V and ZCCHC17 shRNA (m) Lentiviral Particles: sc-155475-V.

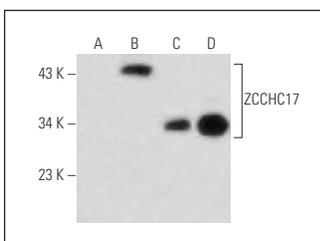
Molecular Weight of ZCCHC17: 28 kDa.

Positive Controls: ZCCHC17 (h3): 293T Lysate: sc-174489, NIH/3T3 nuclear extract: sc-2138 or LADMAC whole cell lysate: sc-364189.

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



ZCCHC17 (Q-12): sc-160936. Western blot analysis of ZCCHC17 expression in non-transfected 293T: sc-117752 (A), human ZCCHC17 transfected 293T: sc-174489 (B) and LADMAC (C) whole cell lysates and NIH/3T3 nuclear extract (D).

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.