



## ZSCAN16 (E-12): sc-132607

### 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. Zinc finger and SCAN domain-containing protein 16 (ZSCAN16), also known as ZNF392 or ZNF435, is a 348 amino acid member of the Krüppel C<sub>2</sub>H<sub>2</sub>-type zinc finger protein family. Localized to the nucleus, ZSCAN16 contains four C<sub>2</sub>H<sub>2</sub>-type zinc fingers at the carboxy-terminus and one SCAN box domain, a leucine rich region of about 80 amino acids, at the amino-terminus through which it is thought to be involved in DNA-binding and transcriptional regulation. ZSCAN16 has been shown to repress reporter gene transcription, and overexpression of ZNF435 also suppressed the transcriptional activities of AP-1 $\mu$ . Because AP-1 $\mu$  is activated by MAPK-mediated phosphorylation, ZNF435 is thought to be involved in the MAPK pathway.

### REFERENCES

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5. Williams, A.J., Khachigian, L.M., Shows, T. and Collins, T. 1995. Isolation and characterization of a novel zinc finger protein with transcription repressor activity. *J. Biol. Chem.* 270: 22143-22152.
6. Walter, L. and Günther, E. 2000. Physical mapping and evolution of the centromeric class I gene-containing region of the rat MHC. *Immunogenetics* 51: 829-837.
7. Sander, T.L., Stringer, K.F., Maki, J.L., Szauter, P., Stone, J.R. and Collins, T. 2003. The SCAN domain defines a large family of zinc finger transcription factors. *Gene* 310: 29-38.
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### CHROMOSOMAL LOCATION

Genetic locus: ZSCAN16 (human) mapping to 6p22.1.

### 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.

### SOURCE

ZSCAN16 (E-12) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of ZSCAN16 of human origin.

### PRODUCT

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

Blocking peptide available for competition studies, sc-132607 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

### APPLICATIONS

ZSCAN16 (E-12) is recommended for detection of ZSCAN16 of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), 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 ZSCAN family members.

Suitable for use as control antibody for ZSCAN16 siRNA (h): sc-95211, ZSCAN16 shRNA Plasmid (h): sc-95211-SH and ZSCAN16 shRNA (h) Lentiviral Particles: sc-95211-V.

Molecular Weight of ZSCAN16: 41 kDa.

### 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) 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.

### PROTOCOLS

See our web site at [www.scbt.com](http://www.scbt.com) or our catalog for detailed protocols and support products.