# SANTA CRUZ BIOTECHNOLOGY, INC.

# ZNF588 (G-12): sc-104787



# 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. The majority of zinc-finger proteins contain a Krüppel-type DNA binding domain and a KRAB domain, which is thought to interact with KAP1, thereby recruiting histone modifying proteins. As a member of the krueppel  $C_2H_2$ -type zinc-finger protein family, ZNF588 (zinc finger 588), also known as Y8, ZFD25, smap-7 or ZNF107, is a 783 amino acid nuclear protein expressed in brain, heart, skeletal muscle, kidney and pancreas. ZNF588 contains twenty-five  $C_2H_2$ -type zinc fingers that may be involved in transcriptional regulation. ZNF588 is encoded by a gene located on human chromosome 7, which houses over 1,000 genes and comprises nearly 5% of the human genome.

# REFERENCES

- Payre, F. and Vincent, A. 1988. Finger proteins and DNA-specific recognition: distinct patterns of conserved amino acids suggest different evolutionary modes. FEBS Lett. 234: 245-250.
- 2. Thiesen, H.J. 1990. Multiple genes encoding zinc finger domains are expressed in human T cells. New Biol. 2: 363-374.
- Rosenfeld, R. and Margalit, H. 1993. Zinc fingers: conserved properties that can distinguish between spurious and actual DNA-binding motifs. J. Biomol. Struct. Dyn. 11: 557-570.
- Laity, J.H., Lee, B.M. and Wright, P.E. 2001. Zinc finger proteins: new insights into structural and functional diversity. Curr. Opin. Struct. Biol. 11: 39-46.
- Edelstein, L.C. and Collins, T. 2005. The SCAN domain family of zinc finger transcription factors. Gene. 359: 1-17.

# CHROMOSOMAL LOCATION

Genetic locus: ZNF107 (human) mapping to 7q11.21.

## SOURCE

ZNF588 (G-12) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the C-terminus of ZNF588 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.

Blocking peptide available for competition studies, sc-104787 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

Available as TransCruz reagent for Gel Supershift and ChIP applications, sc-104787 X, 200  $\mu$ g/0.1 ml.

# **STORAGE**

Store at 4° C, \*\*D0 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.

#### **APPLICATIONS**

ZNF588 (G-12) is recommended for detection of ZNF588 of 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 ZNF588 siRNA (h): sc-89509, ZNF588 shRNA Plasmid (h): sc-89509-SH and ZNF588 shRNA (h) Lentiviral Particles: sc-89509-V.

ZNF588 (G-12) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

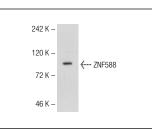
Molecular Weight of ZNF588: 91 kDa.

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

# **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.





ZNF588 (G-12): sc-104787. Western blot analysis of ZNF588 expression in HeLa whole cell lysate.

# PROTOCOLS

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

MONOS Satisfation Guaranteed Try ZNF588 (F-11): sc-514985, our highly recommended monoclonal alternative to ZNF588 (G-12).