SANTA CRUZ BIOTECHNOLOGY, INC.

ZNF224 (G-16): sc-102190

SANTA CRUZ BIOTECHNOLOGY

The Power to Question

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. Zinc-finger protein 224 (ZNF224), also known as BMZF2, KOX22, ZNF233, ZNF255 or ZNF27, is a 707 amino acid member of the Krüppel C_2H_2-type zinc-finger protein family. Localized to the nucleus, ZNF224 contains eighteen C_2H_2-type zinc-fingers and one KRAB domain through which it is thought to be involved in DNA-binding and transcriptional regulation. Expressed mainly in fatal tissues, ZNF224 interacts with and interferes with the transactivation of Wilms tumor 1 (WT1).

REFERENCES

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2. Rousseau-Merck, M.F., et al. 1993. Chromosomal localization of 9 KOX zinc-finger genes: physical linkages suggest clustering of KOX genes on chromosomes 12, 16, and 19. Hum. Genet. 92: 583-587.
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4. Han, Z.G., et al. 1999. Molecular cloning of six novel Krüppel-like zinc-finger genes from hematopoietic cells and identification of a novel transregulatory domain KRNB. J. Biol. Chem. 274: 35741-35748.
5. 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.
6. Lee, T.H., et al. 2002. Inhibition of Wilms tumor 1 transactivation by bone marrow zinc-finger 2, a novel transcriptional repressor. J. Biol. Chem. 277: 44826-44837.
7. Online Mendelian Inheritance in Man, OMIM™. 2002. Johns Hopkins University, Baltimore, MD. MIM Number: 194555. World Wide Web URL: http://www.ncbi.nlm.nih.gov/omim/
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CHROMOSOMAL LOCATION

Genetic locus: ZNF224 (human) mapping to 19q13.31.

SOURCE

ZNF224 (G-16) is a purified rabbit polyclonal antibody raised against ZNF224 of human origin.

PRODUCT

Each vial contains 100 µg IgG in 1.0 ml PBS with < 0.1% sodium azide, 0.1% gelatin and < 0.02% sucrose.

APPLICATIONS

ZNF224 (G-16) is recommended for detection of ZNF224 of 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)] and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for ZNF224 siRNA (h): sc-97807, ZNF224 shRNA Plasmid (h): sc-97807-SH and ZNF224 shRNA (h) Lentiviral Particles: sc-97807-V.

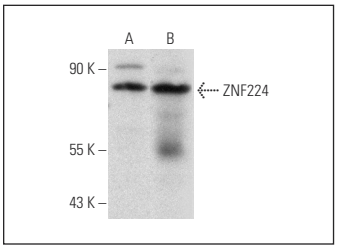
Molecular Weight of ZNF224: 82 kDa.

Positive Controls: HL-60 nuclear extract: sc-2147 or Jurkat whole cell lysate: sc-2204.

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).

DATA



ZNF224 (G-16): sc-102190. Western blot analysis of ZNF224 expression in Jurkat whole cell lysate (**A**) and HL-60 nuclear extract (**B**).

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.