SANTA CRUZ BIOTECHNOLOGY, INC.

JAZF1 (FL-243): sc-98505



BACKGROUND

JAZF1 (juxtaposed with another zinc finger protein 1), also known as TIP27 (TAK1-interacting protein 27) or ZNF802 (zinc finger protein 802), is a 243 amino acid protein that localizes to the nucleus and contains 3 C_2H_2 -type zinc fingers. Existing as multiple alternatively spliced isoforms, JAZF1 interacts with the nuclear orphan receptor TR4 and is thought to function as a transcriptional repressor, effectively down-regulation the expression of TR4. Chromosomal aberrations in the gene encoding JAZF1 are associated with the pathogenesis of endometrial stromal tumors, suggesting a role for JAZF1 in carcinogenesis. The JAZF1 gene maps to human chromosome 7, which houses over 1,000 genes and comprises nearly 5% of the human genome. Defects in some of the genes localized to chromosome 7 have been linked to osteogenesis imperfecta, Williams-Beuren syndrome, Pendred syndrome, Lissencephaly, Citrullinemia and Shwachman-Diamond syndrome.

REFERENCES

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- 2. Huang, H.Y., et al. 2004. Molecular detection of JAZF1-JJAZ1 gene fusion in endometrial stromal neoplasms with classic and variant histology: evidence for genetic heterogeneity. Am. J. Surg. Pathol. 28: 224-232.
- 3. Nakajima, T., et al. 2004. TIP27: a novel repressor of the nuclear orphan receptor TAK1/TR4. Nucleic Acids Res. 32: 4194-4204.
- 4. Micci, F., et al. 2006. Consistent rearrangement of chromosomal band 6p21 with generation of fusion genes JAZF1/PHF1 and EPC1/PHF1 in endometrial stromal sarcoma. Cancer Res. 66: 107-112.
- Nucci, M.R., et al. 2007. Molecular analysis of the JAZF1-JJAZ1 gene fusion by RT-PCR and fluorescence *in situ* hybridization in endometrial stromal neoplasms. Am. J. Surg. Pathol. 31: 65-70.
- Li, H., et al. 2007. Effects of rearrangement and allelic exclusion of JJAZ1/SUZ12 on cell proliferation and survival. Proc. Natl. Acad. Sci. USA 104: 20001-20006.
- 7. Panagopoulos, I., et al. 2008. An endometrial stromal sarcoma cell line with the JAZF1/PHF1 chimera. Cancer Genet. Cytogenet. 185: 74-77.
- Johansson, A., et al. 2009. Common variants in the JAZF1 gene associated with height identified by linkage and genome-wide association analysis. Hum. Mol. Genet. 18: 373-380.

CHROMOSOMAL LOCATION

Genetic locus: JAZF1 (human) mapping to 7p15.2; Jazf1 (mouse) mapping to 6 B3.

SOURCE

JAZF1 (FL-243) is a rabbit polyclonal antibody raised against amino acids 1-243 representing full length JAZF1 of human origin.

STORAGE

Store at 4° C, **D0 NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PRODUCT

Each vial contains 200 μ g IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin. Also available as TransCruz reagent for Gel Supershift and ChIP applications, sc-98505 X, 200 μ g/0.1 ml.

APPLICATIONS

JAZF1 (FL-243) is recommended for detection of JAZF1 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ 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).

JAZF1 (FL-243) is also recommended for detection of JAZF1 in additional species, including bovine and avian.

Suitable for use as control antibody for JAZF1 siRNA (h): sc-75355, JAZF1 siRNA (m): sc-75356, JAZF1 shRNA Plasmid (h): sc-75355-SH, JAZF1 shRNA Plasmid (m): sc-75356-SH, JAZF1 shRNA (h) Lentiviral Particles: sc-75356-V and JAZF1 shRNA (m) Lentiviral Particles: sc-75356-V.

JAZF1 (FL-243) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

Molecular Weight of JAZF1: 27 kDa.

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.

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.

MONOS Satisfation Guaranteed

Try **JAZF1 (C-11):** sc-376503, our highly recommended monoclonal alternative to JAZF1 (FL-243).