**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. ZNF281, also known as GC-box-binding zinc finger protein 1, ZBP-99 or ZNP-99 (zinc finger DNA-binding protein 99), is a zinc finger protein that belongs to the Krüppel C2H2-type zinc finger protein family. It is expressed ubiquitously at low levels with predominant expression in kidney, liver, lymphocytes and placenta. ZNF281 localizes to the nucleus and contains four C2H2-type zinc fingers. ZNF281 plays a role in repressing the transcription of a variety of genes including gastrin and ODC (ornithine decarboxylase). In particular, ZNF281 functions by binding to the G-rich box in the enhancer region of the gene. Upon DNA damage, ZNF281 may become phosphorylated by Atm or ATR.

**REFERENCES**


**CHROMOSOMAL LOCATION**

Genetic locus: ZNF281 (human) mapping to 1q32.1; Zfp281 (mouse) mapping to 1 E4.

**SOURCE**

ZNF281 (G-9) is a mouse monoclonal antibody raised against amino acids 679-895 mapping at the C-terminus of ZNF281 of human origin.

**PRODUCT**

Each vial contains 200 µg IgGκ kappa light chain 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-137205 X, 200 µg/0.1 ml.

**STORAGE**

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

**APPLICATIONS**

ZNF281 (G-9) is recommended for detection of ZNF281 of mouse, rat and human origin by Western Blotting (starting dilution 1:100, 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).

Suitable for use as control antibody for ZNF281 siRNA (h): sc-88283, ZNF281 siRNA (m): sc-106714, ZNF281 shRNA Plasmid (h): sc-88283-SH, ZNF281 shRNA Plasmid (m): sc-106714-SH, ZNF281 shRNA (h) Lentiviral Particles: sc-88283-V and ZNF281 shRNA (m) Lentiviral Particles: sc-106714-V.

ZNF281 (G-9) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

**RECOMMENDED SUPPORT REAGENTS**

Molecular Weight of ZNF281: 99 kDa.

Positive Controls: ZNF281 (m) 293T Lysate: sc-124785, KNRK nuclear extract: sc-2141 or HeLa nuclear extract: sc-2120.

**DATA**

ZNF281 (G-9): sc-137205. Western blot analysis of ZNF281 expression in non-transfected: sc-117752 (A) and mouse ZNF281 transfected: sc-124785 (B) 293T whole cell lysates and KNRK nuclear extract (C).

ZNF281 (G-9): sc-137205. Immunofluorescence staining of formalin-fixed Hep G2 cells showing nuclear localization.

**SELECT PRODUCT CITATIONS**


**RESEARCH USE**

For research use only, not for use in diagnostic procedures.