

FOXN2 (V-20): sc-67493

BACKGROUND

The forkhead domain-containing gene family (Fox) comprises over 20 members in mammals and is defined by a conserved 110 amino-acid motif containing a winged helix structure DNA-binding domain. The members of this gene family have been implicated as key regulators of embryogenesis, cell cycling, cell lineage restriction and cancer. As such, FOXN2 contains a domain with homology to the forkhead DNA binding domain. FOXN2, or Human T-cell leukemia virus enhancer factor, is a 341 amino acid protein mapping to human gene FOXN2, which has been localized to human chromosome 2p16.3. This protein, encoded by a 1239-bp cDNA isolated from the Jurkat cDNA library, is capable of binding to a region of the human T-cell leukemia virus long terminal repeat (HTLV-I LTR) located between amino acids 155 and 117. This purine-rich region is important in the regulation of gene expression by the Ets family of transcription factors. FOXN2 is a unique cellular gene that may function in the transcriptional regulation of HTLV-I LTR.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: Foxn2 (mouse) mapping to 17 E4.

SOURCE

FOXN2 (V-20) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of FOXN2 of mouse origin.

STORAGE

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

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-67493 P, (100 µg 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-67493 X, 200 µg/0.1 ml.

APPLICATIONS

FOXN2 (V-20) is recommended for detection of FOXN2 of mouse and rat 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).

FOXN2 (V-20) is also recommended for detection of FOXN2 in additional species, including bovine.

Suitable for use as control antibody for FOXN2 siRNA (m): sc-62342, FOXN2 shRNA Plasmid (m): sc-62342-SH and FOXN2 shRNA (m) Lentiviral Particles: sc-62342-V.

FOXN2 (V-20) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

Molecular Weight of FOXN2: 37 kDa.

Positive Controls: NIH/3T3 nuclear extract: sc-2138 or RAW 264.7 nuclear extract: sc-24961.

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.

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.