

RFX1 (H-230): sc-48809

BACKGROUND

EP is a regulatory enhancer element found in several promoters on viral genes, and similar sites are also present in cellular genes, including the MIF-1 binding site (MIE) of the human c-myc gene, the X box of MHC class II promoters and a binding site in the proliferating cell nuclear antigen promoter. The EP sites present in the X box of MHC class II promoters are distinctly nonpalindromic sequences that contain only a single EP-homologous half-site. The EP element is bound by a ubiquitous nuclear protein complex that consists of homo- and heterodimers involving the RFX1, RFX2 and RFX3 proteins. The RFX proteins represent an essential class II transcription factor family that shares several conserved regions, including the centrally located DNA-binding domain (DBD) and the D region found in the C-terminal part of these proteins which facilitates dimerization. RFX complexes can activate the enhancer elements of several HBV genes and also promote the induction of MHC class II genes in response to interferon- γ stimulation. Two additional subunits, RFX5, RFX-B/Ank, are also involved in the RFX complexes, yet they bind additional elements in the X1 half of the X box.

REFERENCES

1. Dikstein, R., et al. 1990. Functional organization of the hepatitis B virus enhancer. *Mol. Cell. Biol.* 10: 3682-3689.
2. Fontes, J.D., et al. 1997. Assembly of functional regulatory complexes on MHC class II promoters *in vivo*. *J. Mol. Biol.* 270: 336-345.
3. Katan, Y., et al. 1997. The transcriptional activation and repression domains of RFX1, a context-dependent regulator, can mutually neutralize their activities. *Nucleic Acids Res.* 25: 3621-3628.

CHROMOSOMAL LOCATION

Genetic locus: RFX1 (human) mapping to 19p13.12; Rfx1 (mouse) mapping to 8 C3.

SOURCE

RFX1 (H-230) is a rabbit polyclonal antibody raised against amino acids 61-290 mapping near the N-terminus of RFX1 of human origin.

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-48809 X, 200 μ g/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.

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.

APPLICATIONS

RFX1 (H-230) is recommended for detection of RFX1 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).

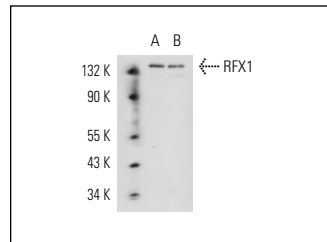
Suitable for use as control antibody for RFX1 siRNA (h): sc-37741, RFX1 siRNA (m): sc-37742, RFX1 shRNA Plasmid (h): sc-37741-SH, RFX1 shRNA Plasmid (m): sc-37742-SH, RFX1 shRNA (h) Lentiviral Particles: sc-37741-V and RFX1 shRNA (m) Lentiviral Particles: sc-37742-V.

RFX1 (H-230) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

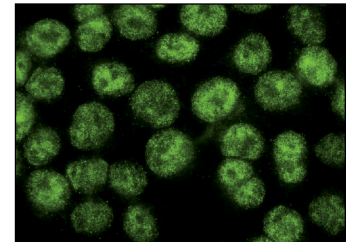
Molecular Weight of RFX1: 130 kDa.

Positive Controls: HeLa nuclear extract: sc-2120, K-562 nuclear extract: sc-2130 or Jurkat nuclear extract: sc-2132.

DATA



RFX1 (H-230): sc-48809. Western blot analysis of RFX1 expression in K-562 (A) and HeLa (B) nuclear extracts.



RFX1 (H-230): sc-48809. Immunofluorescence staining of methanol-fixed HeLa cells showing nuclear localization.

SELECT PRODUCT CITATIONS

1. Lanz, R.B., et al. 2010. Global characterization of transcriptional impact of the SRC-3 coregulator. *Mol. Endocrinol.* 24: 859-872.


 MONOS
Satisfaction
Guaranteed

Try **RFX1 (F-6): sc-374270** or **RFX1 (H-2): sc-376041**, our highly recommended monoclonal alternatives to RFX1 (H-230).