

XAF1 (L-16): sc-19193

BACKGROUND

X-linked inhibitor of apoptosis protein (XIAP)-associated factor 1 (XAF1) is a zinc finger protein that blocks the anti-apoptotic activity of XIAP. XIAP is a member of the family of intrinsic inhibitors of apoptosis proteins (IAPs), which suppress apoptosis through the inhibition of caspases. In the presence of XAF1, XIAP protein redistributes from the cytosol to the nucleus. XAF1 transcripts (3.9-, 4.5-, 6.0- and 7.0-kb) are present at high levels in heart and ovary. Low expression of XAF1 mRNA is an indicator for certain cancers (WM164 melanoma, WM35 melanoma, U937 pro-monocytic leukemia and HT1080 fibrosarcoma), suggesting that low levels of XAF1 transcript may enhance cancer cell-survival through the relative increase in XIAP anti-apoptotic function. IFN- α and IFN- β activate the human XAF1 gene, which maps to chromosome 17p13.2.

REFERENCES

1. Fong, W.G., et al. 2000. Expression and genetic analysis of XIAP-associated factor 1 (XAF1) in cancer cell lines. *Genomics* 70: 113-122.
2. Holcik, M., et al. 2001. XIAP: apoptotic brake and promising therapeutic target. *Apoptosis* 6: 253-261.
3. Liston, P., et al. 2001. Identification of XAF1 as an antagonist of XIAP anti-caspase activity. *Nat. Cell Biol.* 3: 128-133.
4. Perrelet, D., et al. 2002. IAPs are essential for GDNF-mediated neuro-protective effects in injured motor neurons *in vivo*. *Nat. Cell Biol.* 4: 175-179.
5. Leaman, D.W., et al. 2002. Identification of X-linked inhibitor of apoptosis-associated factor-1 as an interferon-stimulated gene that augments TRAIL Apo2_L-induced apoptosis. *J. Biol. Chem.* 277: 28504-28511.

CHROMOSOMAL LOCATION

Genetic locus: XAF1 (human) mapping to 17p13.2.

SOURCE

XAF1 (L-16) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of XAF1 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.

Blocking peptide available for competition studies, sc-19193 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

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.

APPLICATIONS

XAF1 (L-16) is recommended for detection of XAF1 of 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 XAF1 siRNA (h): sc-37511, XAF1 shRNA Plasmid (h): sc-37511-SH and XAF1 shRNA (h) Lentiviral Particles: sc-37511-V.

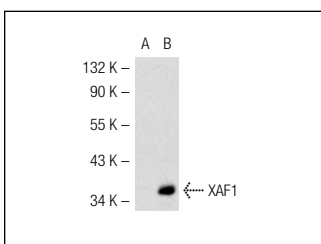
Molecular Weight of XAF1: 35 kDa.

Positive Controls: XAF1 (h): 293T Lysate: sc-111450.

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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) 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.

DATA



XAF1 (L-16): sc-19193. Western blot analysis of XAF1 expression in non-transfected: sc-117752 (A) and human XAF1 transfected: sc-111450 (B) 293T whole cell lysates.

SELECT PRODUCT CITATIONS

1. Valdez, B.C., et al. 2009. 5-Aza-2'-deoxycytidine sensitizes busulfan-resistant myeloid leukemia cells by regulating expression of genes involved in cell cycle checkpoint and apoptosis. *Leuk. Res.* 34: 364-372.



Try **XAF1 (A-11): sc-374020** or **XAF1 (B-5): sc-398012**, our highly recommended monoclonal alternatives to XAF1 (L-16).