

RNF23 (W-25): sc-133970

BACKGROUND

The RING-type zinc finger motif is present in a number of viral and eukaryotic proteins and is made of a conserved cysteine-rich domain that is able to bind two zinc atoms. Proteins that contain this conserved domain are generally involved in the ubiquitination pathway of protein degradation. RNF23 (RING finger protein 23), also known as tripartite motif-containing protein 39 (TRIM39) or testis-abundant finger protein, is a 518 amino acid protein belonging to the TRIM/RBCC family that is known to interact with MOAP1. Ubiquitously expressed and existing as two alternatively spliced isoforms, RNF23 is found at highest levels in spleen, testis, brain, kidney, liver, heart and skeletal muscle. RNF23 typically localizes to cytosol but shifts to mitochondria upon co-localization with MOAP1, a short-lived, pro-apoptotic protein which RNF23 prevents from becoming poly-ubiquitinated and degraded, thereby facilitating apoptosis. RNF23 contains one B box-type zinc finger, a B30.2/SPRY domain and a single RING-type zinc finger.

REFERENCES

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- Meroni, G., et al. 2005. TRIM/RBCC, a novel class of 'single protein RING finger' E3 ubiquitin ligases. *Bioessays* 27: 1147-1157.
- Roberts, J.D., et al. 2007. cGMP-dependent protein kinase I interacts with TRIM39R, a novel Rpp21 domain-containing TRIM protein. *Am. J. Physiol. Lung Cell Mol. Physiol.* 293: L903-L912.
- Fu, N.Y., et al. 2007. Inhibition of ubiquitin-mediated degradation of MOAP-1 by apoptotic stimuli promotes Bax function in mitochondria. *Proc. Natl. Acad. Sci. USA* 104: 10051-10056.
- Lee, S.S., et al. 2009. TRIM39 is a MOAP-1-binding protein that stabilizes MOAP-1 through inhibition of its poly-ubiquitination process. *Exp. Cell Res.* 315: 1313-1325.

CHROMOSOMAL LOCATION

Genetic locus: TRIM39 (human) mapping to 6p22.1.

SOURCE

RNF23 (W-25) is a Protein A purified rabbit polyclonal antibody raised against synthetic RNF23 peptide of human origin.

PRODUCT

Each vial contains 100 µg IgG in 1.0 ml PBS with < 0.1% sodium azide, 0.1% gelatin and < 0.02% sucrose.

STORAGE

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

APPLICATIONS

RNF23 (W-25) is recommended for detection of RNF23 of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)] and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

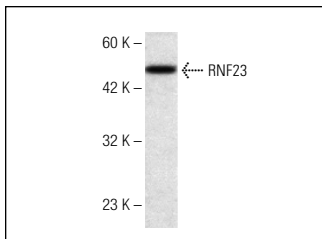
Suitable for use as control antibody for RNF23 siRNA (h): sc-76420, RNF23 shRNA Plasmid (h): sc-76420-SH and RNF23 shRNA (h) Lentiviral Particles: sc-76420-V.

Molecular Weight of RNF23 isoforms: 60/56 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).

DATA



RNF23 (W-25): sc-133970. Western blot analysis of RNF23 expression in Hep G2 whole cell lysate.

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.