LRP130 (C-15): sc-33268



The Power to Question

BACKGROUND

The leucine-rich (LRR) repeat is a 20-30 amino acid motif that forms a hydrophobic α/β horseshoe fold, allowing it to accommodate several leucine residues within a tightly packed core. All LRR repeats contain a variable segment and a highly conserved segment, the latter of which accounts for 11 or 12 residues of the entire LRR motif. Leucine-rich protein (LRP130) is a cytoplasmic mRNA-binding protein likely to be involved in the processing of mitochondrial DNA transcripts. Defects in the LRPPRC gene that encodes LRP130 result in the French-Canadian type of Leigh syndrome, a severe neurological disorder characterized by lesions in the subcortical region of the brain. LRP130 also interacts with the low-affinity receptor for leukemia inhibitory factor to produce an intracelluar signal cascade.

REFERENCES

- Hou, J., et al. 1994. Molecular cloning and expression of the gene for a major leucine-rich protein from human hepatoblastoma cells (Hep G2). In vitro Cell. Dev. Biol. Anim. 30A: 111-114.
- 2. Scheffer, G.L., et al. 1995. The drug resistance-related protein LRP is the human major vault protein. Nat. Med. 1: 578-582.
- 3. Herrmann, C., et al. 1999. Recombinant major vault protein is targeted to neuritic tips of PC12 cells. J. Cell Biol. 144: 1163-1172.
- Scheffer, G.L., et al. 2000. Lung resistance-related protein/major vault protein and vaults in multidrug-resistant cancer. Curr. Opin. Oncol. 12: 550-556.
- Lange, C., et al. 2000. Cloning and initial analysis of the human multidrug resistance-related MVP/LRP gene promoter. Biochem. Biophys. Res. Commun. 278: 125-133.
- Takebayashi, Y., et al. 2001. Expression of multidrug resistance associated transporters (MDR1, MRP1, LRP and BCRP) in porcine oocyte. Int. J. Mol. Med. 7: 397-400.
- Holzmann, K., et al. 2001. A small upstream open reading frame causes inhibition of human major vault protein expression from a ubiquitous mRNA splice variant. FEBS Lett. 494: 99-104.
- 8. Mootha, V.K., et al. 2003. Identification of a gene causing human cytochrome c oxidase deficiency by integrative genomics. Proc. Natl. Acad. Sci. USA 100: 605-610.

CHROMOSOMAL LOCATION

Genetic locus: LRPPRC (human) mapping to 2p21; Lrpprc (mouse) mapping to 17 E4.

SOURCE

LRP130 (C-15) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the C-terminus of LRP130 of human 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 lgG in 1.0 ml of PBS with <0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-33268 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

LRP130 (C-15) is recommended for detection of LRP130 of mouse, rat and human 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).

Suitable for use as control antibody for LRP130 siRNA (h): sc-44734, LRP130 siRNA (m): sc-44735, LRP130 shRNA Plasmid (h): sc-44734-SH, LRP130 shRNA Plasmid (m): sc-44735-SH, LRP130 shRNA (h) Lentiviral Particles: sc-44734-V and LRP130 shRNA (m) Lentiviral Particles: sc-44734-V.

Molecular Weight of LRP130: 137 kDa.

Positive Controls: HeLa whole cell lysate: sc-2200.

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.



Try LRP130 (F-7): sc-166178 or LRP130 (G-10): sc-166177, our highly recommended monoclonal alternatives to LRP130 (C-15). Also, for AC, HRP, FITC, PE, Alexa Fluor® 488 and Alexa Fluor® 647 conjugates, see LRP130 (F-7): sc-166178.

Santa Cruz Biotechnology, Inc. 1.800.457.3801 831.457.3801 **Europe** +00800 4573 8000 49 6221 4503 0 **www.scbt.com**