LI-cadherin (R-18): sc-6462



The Power to Question

BACKGROUND

The cadherins are a family of Ca^{2+} -dependent adhesion molecules that function to mediate cell-cell binding critical to the maintenance of tissue structure and morphogenesis. Cadherins each contain a large extracellular domain at the amino terminus, which is characterized by a series of five homologous repeats, the most distal of which is thought to be responsible for binding specificity. The relatively short carboxy terminal, intracellular domain interacts with a variety of cytoplasmic proteins, including catenin β , to regulate cadherin function. L1-cadherin (for liver-intestine-cadherin) expression is restricted to liver and intestine tissues and is specifically localized to the basolateral domain of hepatocytes and enterocytes.

REFERENCES

- Takeichi, M. 1988. The cadherins: cell-cell adhesion molecules controlling animal morphogenesis. Development 102: 639-655.
- 2. Hatta, M., et al. 1991. Genomic organization and chromosomal mapping of the mouse P-cadherin gene. Nucleic Acids Res. 19: 4437-4441.
- Koch, P.J. and Franke, W.W. 1994. Desmosomal cadherins: another growing multigene family of adhesion molecules. Curr. Opin. Cell Biol. 6: 682-687.
- 4. Ranscht, B. 1994. Cadherins and catenins: interactions and functions in embryonic development. Curr. Opin. Cell Biol. 6: 740-746.
- Hinck, L., et al. 1994. Dynamics of cadherin/catenin complex formation: novel protein interactions and pathways of complex assembly. J. Cell Biol. 125: 1327-1340.
- Berndorff, D., et al. 1994. Liver-intestine cadherin: molecular cloning and characterization of a novel Ca²⁺-dependent cell adhesion molecule expressed in liver and intestine. J. Cell Biol. 125: 1353-1369.
- Ayalon, O., et al. 1994. Spatial and temporal relationships between cadherins and PECAM-1 in cell-cell junctions of human endothelial cells. J. Cell Biol. 126: 247-258.

CHROMOSOMAL LOCATION

Genetic locus: Cdh17 (mouse) mapping to 4 A1.

SOURCE

LI-cadherin (R-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the C-terminus of LI-cadherin of rat origin.

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-6462 P, (100 µg 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.

APPLICATIONS

LI-cadherin (R-18) is recommended for detection of LI-cadherin of mouse and rat 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)], 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 LI-cadherin siRNA (m): sc-43014, LI-cadherin shRNA Plasmid (m): sc-43014-SH and LI-cadherin shRNA (m) Lentiviral Particles: sc-43014-V.

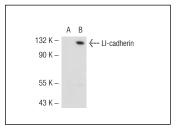
Molecular Weight of Ll-cadherin: 120 kDa.

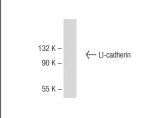
Positive Controls: Ll-cadherin (m): 293T Lysate: sc-125545 or rat small intestine extract: sc-364811.

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





Ll-cadherin (R-18): sc-6462. Western blot analysis of Ll-cadherin expression in non-transfected: sc-117752 (**A**) and mouse Ll-cadherin transfected: sc-125545 (**B**) 293T whole cell lysates.

LI-cadherin (R-18): sc-6462. Western blot analysis of LI-cadherin expression in rat intestine extract.

SELECT PRODUCT CITATIONS

1. Hinoi, T., et al. 2002. CDX2 regulates liver intestine-cadherin expression in normal and malignant colon epithelium and intestinal metaplasia. Gastroenterology 123: 1565-1577.

MONOS Satisfation Guaranteed

Try **LI-cadherin (CAEX3): sc-74209**, our highly recommended monoclonal alternative to LI-cadherin (R-18).