SANTA CRUZ BIOTECHNOLOGY, INC.

LHX9 (E-14): sc-19350

SANTA CRUZ BIOTECHNOLOGY

The Power to Question

BACKGROUND

During development, genetically distinct subtypes of motor neurons express unique combinations of LIM-type homeodomain factors, which regulate cell migration and guide motor axons to establish the fidelity of a binary choice in axonal trajectory. The LIM gene family encodes a set of gene products, which carry the LIM domain, a unique cysteine-rich zinc-binding domain. At least 40 members of this family have been identified in vertebrates and invertebrates, and are distributed into 4 groups according to the number of LIM domains and to the presence of homeodomains and kinase domains. The human LHX9 gene maps to chromosome 1q31.3 and encodes a 388 amino acid protein. LHX9 is closely related to LHX2 and is expressed in the developing central nervous system. LHX9 influences the control of cell differentiation of several neural cell types and may act in a combinatorial manner with other LIM-homeodomain factors expressed in overlapping patterns.

CHROMOSOMAL LOCATION

Genetic locus: LHX9 (human) mapping to 1q31.3; Lhx9 (mouse) mapping to 1 F.

SOURCE

LHX9 (E-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of LHX9 of human origin.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-19350 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

Available as TransCruz reagent for Gel Supershift and ChIP applications, sc-19350 X, 200 µg/0.1 ml.

APPLICATIONS

LHX9 (E-14) is recommended for detection of LHX9 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).

LHX9 (E-14) is also recommended for detection of LHX9 in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for LHX9 siRNA (h): sc-38719, LHX9 siRNA (m): sc-38720, LHX9 shRNA Plasmid (h): sc-38719-SH, LHX9 shRNA Plasmid (m): sc-38720-SH, LHX9 shRNA (h) Lentiviral Particles: sc-38719-V and LHX9 shRNA (m) Lentiviral Particles: sc-38720-V.

LHX9 (E-14) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

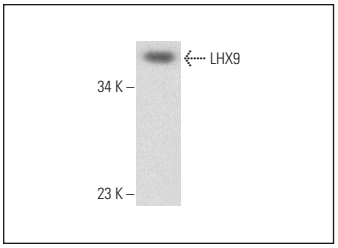
Molecular Weight of LHX9: 44 kDa.

Positive Controls: HeLa nuclear extract: sc-2120 or Jurkat whole cell lysate: sc-2204.

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.

DATA



LHX9 (E-14): sc-19350. Western blot analysis of LHX9 expression in HeLa nuclear extract.

SELECT PRODUCT CITATIONS

1. Yang, M., et al. 2010. Identification of cerebellin2 in chick and its preferential expression by subsets of developing sensory neurons and their targets in the dorsal horn. J. Comp. Neurol. 518: 2818-2840.

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.