Doublecortin (N-19): sc-8067

**BACKGROUND**

Lissencephaly (smooth brain) is an abnormality of brain development characterized by incomplete neuronal migration and a smooth cerebral surface, resulting in severe mental retardation. Genetic analysis identified two proteins that are mutated in some cases of lissencephaly, designated lissencephaly-1 protein (LIS1) and doublecortin. LIS1 shows sequence homology to β-subunits of heterotrimeric G proteins. Doublecortin contains a consensus Abl phosphorylation site, and it has some sequence homology to a predicted kinase protein. Both proteins are highly expressed in developing brain, suggesting that they may be involved in a signal transduction pathway that is crucial to brain development.

**CHROMOSOMAL LOCATION**

Genetic locus: DCX (human) mapping to Xq23; Dcx (mouse) mapping to X F2.

**SOURCE**

Doublecortin (N-19) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the N-terminus of Doublecortin of human origin.

**PRODUCT**

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

Blocking peptide available for competition studies, sc-8067 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

**APPLICATIONS**

Doublecortin (N-19) is recommended for detection of Doublecortin of mouse, rat and 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]), 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).

Doublecortin (N-19) is also recommended for detection of Doublecortin in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for Doublecortin siRNA (h): sc-35214, Doublecortin siRNA (m): sc-35215, Doublecortin shRNA Plasmid (h): sc-35214-SH, Doublecortin shRNA Plasmid (m): sc-35215-SH, Doublecortin shRNA (h) Lentiviral Particles: sc-35214-V and Doublecortin shRNA (m) Lentiviral Particles: sc-35215-V.

Molecular Weight of Doublecortin: 40 kDa.

Positive Controls: SK-N-SH cell lysate: sc-2410, mouse embryonic extract: sc-364239 or Doublecortin (h): 293T Lysate: sc-114231.

**RESEARCH USE**

For research use only, not for use in diagnostic procedures.

**PROTOCOLS**

See our website at www.scbt.com or our catalog for detailed protocols and support products.

**STORAGE**

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

**DATA**


**SELECT PRODUCT CITATIONS**

Try Doublecortin (E-6): sc-271390 or Doublecortin (E-5): sc-390645, our highly recommended monoclonal antibodies to Doublecortin (N-19). Also, for AC, HRP, FITC, PE, Alexa Fluor® 488 and Alexa Fluor® 647 conjugates, see Doublecortin (E-6): sc-271390.