

DLK2 (H-125): sc-135133

BACKGROUND

DLK2 (δ homolog 2), also known as EGFL9 (epidermal growth factor-like protein 9), is a 383 amino acid single-pass transmembrane protein with 6 tandem EGF-like repeats in the putative extracellular domain, which is characteristic of the EGF-like protein family. DLK2 shares nearly identical structural features with DLK, suggesting that it may function in a similar way. Like DLK, DLK2 affects adipogenesis of 3T3-L1 preadipocytes and mesenchymal C3H10T1/2 cells, yet it does so in an opposite way to that of DLK. Also, expression of DLK and DLK2 are inversely correlated and changes in expression of one gene will affect the expression levels of the other. Therefore, it is likely that adipogenesis is modulated by the coordinated expression of DLK and DLK2. There are two isoforms of DLK2 that are produced as a result of alternative splicing events.

REFERENCES

- Garces, C., et al. 1999. Adipocyte differentiation is modulated by secreted δ -like (dlk) variants and requires the expression of membrane-associated dlk. *Differentiation* 64: 103-114.
- Cowherd, R.M., et al. 1999. Molecular regulation of adipocyte differentiation. *Semin. Cell Dev. Biol.* 10: 3-10.

CHROMOSOMAL LOCATION

Genetic locus: DLK2 (human) mapping to 6p21.1; Dlk2 (mouse) mapping to 17 C.

SOURCE

DLK2 (H-125) is a rabbit polyclonal antibody raised against amino acids 181-305 mapping within an N-terminal extracellular domain of DLK2 of human origin.

PRODUCT

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

APPLICATIONS

DLK2 (H-125) is recommended for detection of DLK2 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g 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).

DLK2 (H-125) is also recommended for detection of DLK2 in additional species, including equine, bovine and porcine.

Suitable for use as control antibody for DLK2 siRNA (h): sc-95621, DLK2 siRNA (m): sc-143055, DLK2 shRNA Plasmid (h): sc-95621-SH, DLK2 shRNA Plasmid (m): sc-143055-SH, DLK2 shRNA (h) Lentiviral Particles: sc-95621-V and DLK2 shRNA (m) Lentiviral Particles: sc-143055-V.

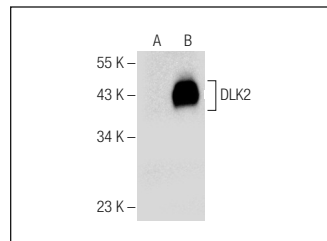
Molecular Weight of DLK2: 41 kDa.

Positive Controls: DLK2 (h): 293T Lysate: sc-111975.

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). 3) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

DATA



DLK2 (H-125): sc-135133. Western blot analysis of DLK2 expression in non-transfected: sc-117752 (A) and human DLK2 transfected: sc-111975 (B) 293T whole cell lysates.

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.

MONOS
Satisfaction
Guaranteed

Try **DLK2 (B-10): sc-376896** or **DLK2 (D-5): sc-514089**, our highly recommended monoclonal alternatives to DLK2 (H-125).