

# CCDC83 (K-13): sc-138189

## BACKGROUND

The coiled-coil domain is a structural motif found in proteins that are involved in a diverse array of biological functions such as the regulation of gene expression, cell division, membrane fusion, and drug extrusion and delivery. CCDC83 (coiled-coil domain-containing protein 83), also known as HSD9, is 413 amino acid protein that exists as 3 alternatively spliced isoforms. The gene encoding CCDC83 maps to human chromosome 11, which houses over 1,400 genes and comprises nearly 4% of the human genome. Jervell and Lange-Nielsen syndrome, Jacobsen syndrome, Niemann-Pick disease, hereditary angioedema and Smith-Lemli-Opitz syndrome are associated with defects in genes that maps to chromosome 11.

## REFERENCES

1. Gilbert, F. 2000. Disease genes and chromosomes: disease maps of the human genome. *Genet. Test.* 4: 409-426.
2. Lee, S.Y., et al. 2003. Immunomic analysis of human sarcoma. *Proc. Natl. Acad. Sci. USA* 100: 2651-2656.
3. Mason, J.M., et al. 2004. Coiled coil domains: stability, specificity, and biological implications. *Chembiochem* 5: 170-176.
4. Wuyts, W., et al. 2004. Proximal 11p deletion syndrome (P11pDS): additional evaluation of the clinical and molecular aspects. *Eur. J. Hum. Genet.* 12: 400-406.
5. Taylor, T.D., et al. 2006. Human chromosome 11 DNA sequence and analysis including novel gene identification. *Nature* 440: 497-500.
6. Liu, J., et al. 2006. A seven-helix coiled coil. *Proc. Natl. Acad. Sci. USA* 103: 15457-15462.
7. Tang, L.Y., et al. 2007. Quantitative phosphoproteome profiling of Wnt3a-mediated signaling network: indicating the involvement of ribonucleoside-diphosphate reductase M2 subunit phosphorylation at residue serine 20 in canonical Wnt signal transduction. *Mol. Cell. Proteomics* 6: 1952-1967.

## CHROMOSOMAL LOCATION

Genetic locus: CCDC83 (human) mapping to 11q14.1.

## SOURCE

CCDC83 (K-13) is an affinity purified rabbit polyclonal antibody raised against a peptide mapping within an internal region of CCDC83 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-138189 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

CCDC83 (K-13) is recommended for detection of CCDC83 of human origin by Western Blotting (starting dilution 1:100, dilution range 1:50-1:500), immunofluorescence (starting dilution 1:25, dilution range 1:25-1:250) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000); non cross-reactive with other CCDC family members.

Suitable for use as control antibody for CCDC83 siRNA (h): sc-96674, CCDC83 shRNA Plasmid (h): sc-96674-SH and CCDC83 shRNA (h) Lentiviral Particles: sc-96674-V.

Molecular Weight of CCDC83 isoforms: 49/52/32 kDa.

## 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) 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.

## RESEARCH USE

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

## PROTOCOLS

See our web site at [www.scbt.com](http://www.scbt.com) or our catalog for detailed protocols and support products.