HOOK3 (C-20): sc-49981



The Power to Question

BACKGROUND

Microtubules mediate the spatial organization of diverse membrane-trafficking systems. The Hook proteins, HOOK1, HOOK2 and HOOK3, comprise a family of cytosolic coiled-coil proteins that contain conserved N-terminal domains, which attach to microtubules, and more divergent C-terminal domains, which mediate binding to organelles. HOOK3 participates in the organization of the *cis*-Golgi compartment. It exists as a homodimer, most likely mediated through its central coiled-coil domain.

REFERENCES

- Walenta, J.H., Didier, A.J., Liu, X. and Kramer, H. 2001. The Golgi-associated hook3 protein is a member of a novel family of microtubule-binding proteins. J. Cell Biol. 152: 923-934.
- Shotland, Y., Kramer, H. and Groisman, E.A. 2003. The Salmonella SpiC protein targets the mammalian HOOK3 protein function to alter cellular trafficking. Mol. Microbiol. 49: 1565-1576.
- 3. Kaiser, F., et al. 2004. IIGP, a member of the IFN inducible and microbial defense mediating 47 kDa GTPase family, interacts with the microtubule binding protein H00K3. J. Cell Sci. 117: 1747-1756.

CHROMOSOMAL LOCATION

Genetic locus: HOOK3 (human) mapping to 8p11.21; Hook3 (mouse) mapping to 8 A2.

SOURCE

HOOK3 (C-20) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the C-terminus of HOOK3 of human 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-49981 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

HOOK3 (C-20) is recommended for detection of HOOK3 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).

HOOK3 (C-20) is also recommended for detection of HOOK3 in additional species, including equine, canine and bovine.

Suitable for use as control antibody for HOOK3 siRNA (h): sc-60800, HOOK3 siRNA (m): sc-60801, HOOK3 shRNA Plasmid (h): sc-60800-SH, HOOK3 shRNA Plasmid (m): sc-60801-SH, HOOK3 shRNA (h) Lentiviral Particles: sc-60800-V and HOOK3 shRNA (m) Lentiviral Particles: sc-60801-V.

Molecular Weight of HOOK3: 83 kDa.

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.

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.



Try **HOOK3 (C-10):** sc-398924, our highly recommended monoclonal alternative to HOOK3 (C-20).

Santa Cruz Biotechnology, Inc. 1.800.457.3801 831.457.3801 Fax 831.457.3801 Europe +00800 4573 8000 49 6221 4503 0 www.scbt.com