

HOOK3 Antibody (Center) Blocking Peptide

Synthetic peptide Catalog # BP13225c

Specification

HOOK3 Antibody (Center) Blocking Peptide - Product Information

Primary Accession

Q86VS8

HOOK3 Antibody (Center) Blocking Peptide - Additional Information

Gene ID 84376

Other Names

Protein Hook homolog 3, h-hook3, hHK3, HOOK3

Target/Specificity

The synthetic peptide sequence used to generate the antibody AP13225c was selected from the Center region of HOOK3. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

HOOK3 Antibody (Center) Blocking Peptide - Protein Information

Name HOOK3 (HGNC:23576)

Function

Acts as an adapter protein linking the dynein motor complex to various cargos and converts dynein from a non-processive to a highly processive motor in the presence of dynactin. Facilitates the interaction between dynein and dynactin and activates dynein processivity (the ability to move along a microtubule for a long distance without falling off the track). Predominantly recruits 2 dyneins, which increases both the force and speed of the microtubule motor (PubMed:25035494, PubMed:33734450, Component of the FTS/Hook/FHIP complex (FHF complex). The FHF complex may function to promote vesicle trafficking and/or fusion via the homotypic vesicular protein sorting complex (the HOPS complex). May regulate clearance of endocytosed receptors such as MSR1. Participates in defining the architecture and localization of the Golgi complex. FHF complex promotes the distribution of AP-4 complex to the perinuclear area of the cell (PubMed:32073997).



Cellular Location

Cytoplasm, cytoskeleton. Golgi apparatus. Note=Enriched at the cis-face of the Golgi complex. Localizes to microtubule asters in prophase (PubMed:11238449). Localizes to the manchette in elongating spermatids (By similarity). {ECO:0000250|UniProtKB:Q8BUK6, ECO:0000269|PubMed:11238449}

HOOK3 Antibody (Center) Blocking Peptide - Protocols

Provided below are standard protocols that you may find useful for product applications.

Blocking Peptides

HOOK3 Antibody (Center) Blocking Peptide - Images

HOOK3 Antibody (Center) Blocking Peptide - Background

Hook proteins are cytosolic coiled-coil proteins that contain conserved N-terminal domains, which attach to microtubules, and more divergent C-terminal domains, which mediate binding toorganelles. The Drosophila Hook protein is a component of the endocytic compartment.

HOOK3 Antibody (Center) Blocking Peptide - References

Ge, X., et al. Neuron 65(2):191-203(2010)Xu, L., et al. Mol. Biol. Cell 19(12):5059-5071(2008)Ciampi, R., et al. Endocr. Relat. Cancer 14(2):445-452(2007)Sano, H., et al. J. Biol. Chem. 282(11):7973-7981(2007)Beausoleil, S.A., et al. Nat. Biotechnol. 24(10):1285-1292(2006)