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DYNC1I2 Rabbit pAb

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Catalog # AP54270

Product Information

Application	IHC-P, IHC-F, IF
Primary Accession	Q13409
Reactivity	Rat, Pig, Rabbit, Dog, Horse
Host	Rabbit
Clonality	Polyclonal
Calculated MW	71457
Physical State	Liquid
Immunogen	KLH conjugated synthetic peptide derived from human DYNC1I2
Epitope Specificity	61-160/638
Isotype	IgG
Purity	affinity purified by Protein A
Buffer	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.
SUBCELLULAR LOCATION	Cytoplasm, cytoskeleton.
SIMILARITY	Belongs to the dynein intermediate chain family. Contains 7 WD repeats.
SUBUNIT	Homodimer. The cytoplasmic dynein 1 complex consists of two catalytic heavy chains (HCs) and a number of non-catalytic subunits presented by intermediate chains (ICs), light intermediate chains (LICs) and light chains (LCs); the composition seems to vary in respect to the IC, LIC and LC composition. The heavy chain homodimer serves as a scaffold for the probable homodimeric assembly of the respective non-catalytic subunits. The ICs and LICs bind directly to the HC dimer and the LCs assemble on the IC dimer. Interacts with DYNLT1 and DYNLT3. Interacts with DCNT1. Interacts with human adenovirus 5 hexon protein; this interaction probably allows virus intracellular transport.
Post-translational modifications	The phosphorylation status of Ser-90 appears to be involved in dynactin-dependent target binding.
Important Note	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
Background Descriptions	The inner- and outer-arm dyneins, which bridge between the doublet microtubules in axonemes, are the force-generating proteins responsible for the sliding movement in axonemes. The intermediate and light chains, thought to form the base of the dynein arm, help mediate attachment and may also participate in regulating dynein activity. This gene encodes an intermediate chain dynein, belonging to the large family of motor proteins. Mutations in this gene result in abnormal ciliary ultrastructure and function associated with primary ciliary dyskinesia (PCD) and Kartagener syndrome. [provided by RefSeq, Jul 2008].

Additional Information

Gene ID	1781

Other Names	Cytoplasmic dynein 1 intermediate chain 2, Cytoplasmic dynein intermediate chain 2, Dynein intermediate chain 2, cytosolic, DH IC-2, DYNC1I2 (HGNC:2964), DNCI2, DNCIC2
Dilution	IHC-P=1:100-500,IHC-F=1:100-500,IF=1:100-500
Storage	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

Protein Information

Name	DYNC1I2 (HGNC:2964)
Synonyms	DNCI2, DNCIC2
Function	Acts as one of several non-catalytic accessory components of the cytoplasmic dynein 1 complex that are thought to be involved in linking dynein to cargos and to adapter proteins that regulate dynein function (PubMed:31079899). Cytoplasmic dynein 1 acts as a motor for the intracellular retrograde motility of vesicles and organelles along microtubules (PubMed:31079899). The intermediate chains mediate the binding of dynein to dynactin via its 150 kDa component (p150-glued) DCTN1 (By similarity). Involved in membrane-transport, such as Golgi apparatus, late endosomes and lysosomes (By similarity).
Cellular Location	Cytoplasm, cytoskeleton. Cytoplasm {ECO:0000250|UniProtKB:O88487}. Note=Detected in the cytoplasm of pachytene spermatocytes. Localizes to the manchette in elongating spermatids. {ECO:0000250|UniProtKB:O88487}

Background

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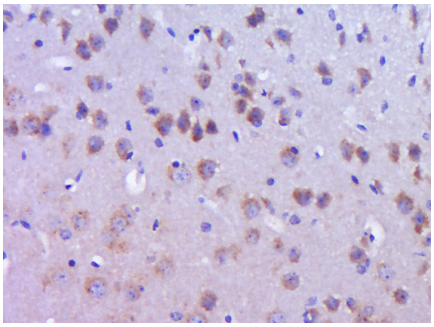
Images



Paraformaldehyde-fixed, paraffin embedded (Mouse brain); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (DYNC1I2) Polyclonal Antibody, Unconjugated (AP54270) at 1:400 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructionsand DAB staining.