abcam

Product datasheet

Anti-NDEL1 antibody ab25959

1 Abreviews 6 References 3 Images

Overview

Product name	Anti-NDEL1 antibody
Description	Rabbit polyclonal to NDEL1
Host species	Rabbit
Specificity	ab25959 recognises NDEL1.
Tested applications	**Suitable for:** ICC/IF, WB
Species reactivity	**Reacts with:** Human
Immunogen	Synthetic peptide corresponding to Human NDEL1. (Peptide available as **ab39840**)
General notes	The Life Science industry has been in the grips of a reproducibility crisis for a number of years. Abcam is leading the way in addressing this with our range of recombinant monoclonal antibodies and knockout edited cell lines for gold-standard validation. Please check that this product meets your needs before purchasing. If you have any questions, special requirements or concerns, please send us an inquiry and/or contact our Support team ahead of purchase. Recommended alternatives for this product can be found below, along with publications, customer reviews and Q&As

Properties

Form	Liquid
Storage instructions	Shipped at 4°C. Store at +4°C.
Storage buffer	pH: 7.2 Preservative: 0.02% Sodium azide Constituent: PBS
Purity	Immunogen affinity purified
Clonality	Polyclonal
Isotype	IgG

Applications

The Abpromise guarantee	Our **Abpromise guarantee** covers the use of ab25959 in the following tested applications.

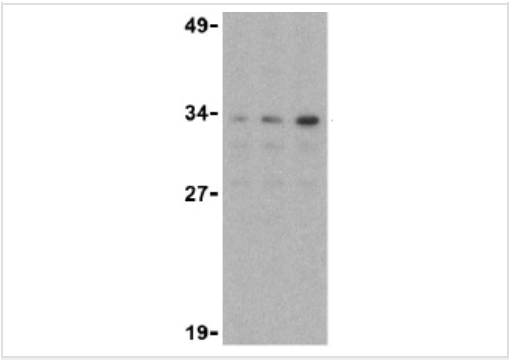
The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Application	Abreviews	Notes
ICC/IF	★★★★☆ (1)	Use a concentration of 2 µg/ml.
WB		Use a concentration of 0.5 - 1 µg/ml. Predicted molecular weight: 38 kDa.

Target

Function	Required for organization of the cellular microtubule array and microtubule anchoring at the centrosome. May regulate microtubule organization at least in part by targeting the microtubule severing protein KATNA1 to the centrosome. Also positively regulates the activity of the minus-end directed microtubule motor protein dynein. May enhance dynein-mediated microtubule sliding by targeting dynein to the microtubule plus ends. Required for several dynein- and microtubule-dependent processes such as the maintenance of Golgi integrity, the centripetal motion of secretory vesicles and the coupling of the nucleus and centrosome. Also required during brain development for the migration of newly formed neurons from the ventricular/subventricular zone toward the cortical plate. Plays a role, together with DISC1, in the regulation of neurite outgrowth. Required for mitosis in some cell types but appears to be dispensible for mitosis in cortical neuronal progenitors, which instead requires NDE1. Facilitates the polymerization of neurofilaments from the individual subunits NEFH and NEFL.
Tissue specificity	Expressed in brain, heart, kidney, liver, lung, pancreas, placenta and skeletal muscle.
Sequence similarities	Belongs to the nudE family.
Developmental stage	Expression peaks in mitosis.
Post-translational modifications	Phosphorylated in mitosis. Can be phosphorylated by CDK1, CDK5 and MAPK1. Phosphorylation by CDK5 promotes interaction with KATNA1 and YWHAE.
Cellular localization	Cytoplasm > cytoskeleton. Cytoplasm > cytoskeleton > centrosome. Chromosome > centromere > kinetochore. Cytoplasm > cytoskeleton > spindle. Localizes to the cell body of the motor neurons and colocalizes with assembled neurofilaments within axonal processes. Localizes to the microtubules of the manchette in elongated spermatids. Colocalizes with DISC1 in the perinuclear region, including the centrosome (By similarity). Localizes to the interphase centrosome and the mitotic spindle. Localizes to the kinetochore in a CENPF-dependent manner.

Images

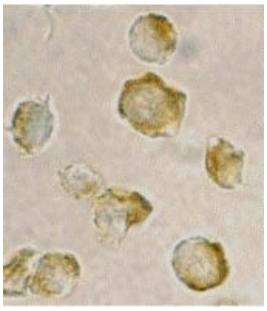


Western blot - Anti-NDEL1 antibody (ab25959)

Lane 1 : Anti-NDEL1 antibody (ab25959) at 0.5 µg/ml
Lane 2 : Anti-NDEL1 antibody (ab25959) at 1 µg/ml
Lane 3 : Anti-NDEL1 antibody (ab25959) at 2 µg/ml

All lanes : Jurkat whole cell lysate.

Predicted band size: 38 kDa
Observed band size: 34 kDa



Immunocytochemistry/ Immunofluorescence - Anti-NDEL1 antibody (ab25959)

ab25959 at 2µg/ml staining NDEL1 in Jurkat cells by ICC/IF

Immunocytochemistry/ Immunofluorescence - Anti-NDEL1 antibody (ab25959)

Immunofluorescence of NDEL1 in Jurkat cells using ab25959 at 10 ug/ml.

Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet
- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit **https://www.abcam.com/abpromise** or contact our technical team.

Terms and conditions

- Guarantee only valid for products bought direct from Abcam or one of our authorized distributors