

NUDC (H-271): sc-135366

BACKGROUND

NUDC (nuclear distribution gene C homolog, *A. nidulans*), also known as HNUDC, MNUDC or NPD011, is a ubiquitously expressed protein that is conserved from fungus to human. Highly expressed in proliferating cells, NUDC localizes to the cytoplasm and nucleus, contains a CS domain and participates in neurogenesis, mitosis, nuclear migration and cytokinesis. At the onset of mitosis, NUDC is phosphorylated by Plk. This modification of NUDC is required for proper mitotic spindle formation, chromosome separation during mitosis, cytokinesis and cell proliferation. In neurons and fibroblasts, NUDC forms a complex with LIS1 that localizes to the microtubule network and microtubule-organizing center and facilitates nuclear movement and transport in migrating neurons. In addition, the NUDC/LIS1 complex can associate with the minus-end directed Dynein/dynactin motor complex and, together, these complexes cooperate in the regulation of cytokinesis.

CHROMOSOMAL LOCATION

Genetic locus: NUDC (human) mapping to 1p36.11; Nudc (mouse) mapping to 4 D2.3.

SOURCE

NUDC (H-271) is a rabbit polyclonal antibody raised against amino acids 61-331 mapping at the C-terminus of NUDC of human origin.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

STORAGE

Store at 4° C, ****DO NOT FREEZE****. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

APPLICATIONS

NUDC (H-271) is recommended for detection of NUDC of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], 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).

NUDC (H-271) is also recommended for detection of NUDC in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for NUDC siRNA (h): sc-88034, NUDC siRNA (m): sc-150096, NUDC shRNA Plasmid (h): sc-88034-SH, NUDC shRNA Plasmid (m): sc-150096-SH, NUDC shRNA (h) Lentiviral Particles: sc-88034-V and NUDC shRNA (m) Lentiviral Particles: sc-150096-V.

Molecular Weight (predicted) of NUDC: 38 kDa.

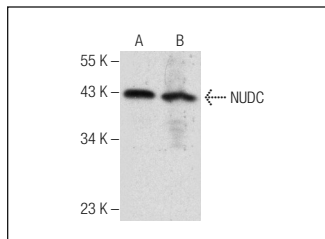
Molecular Weight (observed) of NUDC: 42 kDa.

Positive Controls: HeLa nuclear extract: sc-2120, HeLa whole cell lysate: sc-2200 or Hep G2 cell lysate: sc-2227.

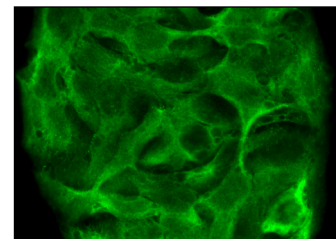
RECOMMENDED SECONDARY REAGENTS

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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) 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.

DATA



NUDC (H-271): sc-135366. Western blot analysis of NUDC expression in HeLa (A) and Hep G2 (B) nuclear extracts.



NUDC (H-271): sc-135366. Immunofluorescence staining of formalin-fixed Hep G2 cells showing cytoplasmic localization.

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.


 MONOS
Satisfaction
Guaranteed

Try **NUDC (C-3): sc-365782** or **NUDC (JT-9): sc-100794**, our highly recommended monoclonal alternatives to NUDC (H-271).