

Polyclonal Antibody to NDEL - Serum

Alternate names:	EOPA, MITAP1, NUDEL, Nuclear distribution protein nudE-like 1
Catalog No.:	AP32375SU-N
Quantity:	0.1 ml
Background:	NudE nuclear distribution gene E homolog (A. nidulans)-like 1 (NUDEL), also known as NDEL1, is a human gene. This gene encodes a thiol-activated peptidase that is phosphorylated in M phase of the cell cycle. Phosphorylation regulates the cell cycle-dependent distribution of this protein, with a fraction of the protein bound strongly to centrosomes in interphase and localized to mitotic spindles in early M phase. This protein plays a role in nervous system development and is linked to LIS-1, the disease gene for a form of lissencephaly, a disorder of cortical development. Alternate transcriptional splice variants, encoding different isoforms, have been characterized.
Uniprot ID:	Q78PB6
NCBI:	NP_579854.1
GeneID:	170845
Host:	Mouse
Immunogen:	Synthetic Linear Peptide.
Format:	State: Liquid Serum Preservatives: 0.05% Sodium Azide
Applications:	Western Blot: 1/5000. <i>Control:</i> Brain Lysate. Other applications not tested. Optimal dilutions are dependent on conditions and should be determined by the user.
Molecular Weight:	~38 kDa
Specificity:	Recognizes Rat NUDEL. Other species not tested.
Storage:	Store undiluted (in aliquots) at -20°C. Avoid repeated freezing and thawing. Shelf life: one year from despatch.
General Readings:	1. Hayashi, M. et al. (2005) PNAS. 10: 3828-3833
Protocols:	Western Blot 1. Mix the samples (organ membranes: 50 µg/lane; transfected cells: 500,000 cells/lane) with sample-buffer X 2, and heat 10 min at 70°C. 2. 5-50 µL applied to Minigel lane (0.75-1.5 mm width) and run at standard conditions. (60 mA for 2 1.5 mm Minigel gels, 1.4 h). It is suggested that you run 5-15% acrylamide (37.5:1 acrylamide:bisacrylamide) minigel (1.5 mm width) at 30 mA/gel ~1-1.5 hours.

3. Transfer in semi-dry system under standard conditions (3 h 100 mA for two minigel gels)
4. Stain the transferred bands with Millipore BLOT-FastStain.
5. Destain with deionized water.
6. Block with 5% non-fat milk (Marvel or Carnation) in PBS, and 0.025 % sodium azide, overnight at 2-8°C. The non-fat milk should be dissolved freshly, centrifuged 10,000 rpm for 10 min, and filtered through glass filter (Gelman Acrodisc).
7. Incubation with first antibody 2 h at room temperature or overnight at 4°C in blocking solution. The antibody preparation should be centrifuged before use (10,000 g for 5 min.). Optimal working dilutions and incubation time will need to be determined by the end user.
8. Wash 4 x 10 min. with PBS-0.1% Tween 20. From this stage, azide should be omitted.
9. Incubation with the secondary antibody (HRP-conjugated goat anti-rabbit antibody, diluted appropriately) 1 h at room temperature.
10. Wash 4 x 10 min. with PBS-0.1% tween 20.
11. Perform ECL with commercial kits.

Pictures:

Western Blot Analysis: NDEL Antibody Cat.-No AP32375SU-N can detect NUDEL at 1/5000 dilutions in Rat brain cytosol Lysate.

