

HIPK1 Antibody (clone 1D6)

Mouse Monoclonal Antibody Catalog # ALS13508

Specification

HIPK1 Antibody (clone 1D6) - Product Information

Application IHC
Primary Accession O86702
Reactivity Human
Host Mouse
Clonality Monoclonal
Calculated MW 131kDa KDa

HIPK1 Antibody (clone 1D6) - Additional Information

Gene ID 204851

Other Names

Homeodomain-interacting protein kinase 1, 2.7.11.1, Nuclear body-associated kinase 2, HIPK1, KIAA0630, MYAK, NBAK2

Reconstitution & Storage

Short term 4°C, long term aliquot and store at -20°C, avoid freeze thaw cycles.

Precautions

HIPK1 Antibody (clone 1D6) is for research use only and not for use in diagnostic or therapeutic procedures.

HIPK1 Antibody (clone 1D6) - Protein Information

Name HIPK1

Synonyms KIAA0630, MYAK, NBAK2

Function

Serine/threonine-protein kinase involved in transcription regulation and TNF-mediated cellular apoptosis. Plays a role as a corepressor for homeodomain transcription factors. Phosphorylates DAXX and MYB. Phosphorylates DAXX in response to stress, and mediates its translocation from the nucleus to the cytoplasm. Inactivates MYB transcription factor activity by phosphorylation. Prevents MAP3K5-JNK activation in the absence of TNF. TNF triggers its translocation to the cytoplasm in response to stress stimuli, thus activating nuclear MAP3K5-JNK by derepression and promoting apoptosis. May be involved in anti-oxidative stress responses. Involved in the regulation of eye size, lens formation and retinal lamination during late embryogenesis. Promotes angiogenesis and to be involved in erythroid differentiation. May be involved in malignant squamous cell tumor formation. Phosphorylates PAGE4 at 'Thr-51' which is critical for the ability of PAGE4 to potentiate the transcriptional activator activity of JUN (PubMed:24559171/a>).



Cellular Location

Nucleus. Cytoplasm. Nucleus speckle. Note=Predominantly nuclear Translocates from nucleus to cytoplasm in response to stress stimuli via SENP1-mediated desumoylation.

Tissue Location

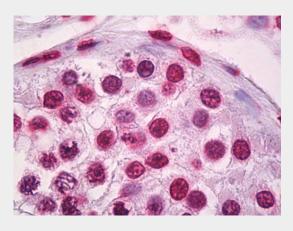
Ubiquitously expressed with highest levels in skeletal muscle and heart. Overexpressed in breast cancer cell lines Isoform 2 is highly expressed in testis. Expressed in both androgen-dependent and androgen-independent prostate cancer cells (PubMed:28289210).

HIPK1 Antibody (clone 1D6) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

HIPK1 Antibody (clone 1D6) - Images



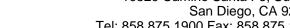
Anti-HIPK1 antibody IHC of human testis.

HIPK1 Antibody (clone 1D6) - Background

Serine/threonine-protein kinase involved in transcription regulation and TNF-mediated cellular apoptosis. Plays a role as a corepressor for homeodomain transcription factors. Phosphorylates DAXX and MYB. Phosphorylates DAXX in response to stress, and mediates its translocation from the nucleus to the cytoplasm. Inactivates MYB transcription factor activity by phosphorylation. Prevents MAP3K5-JNK activation in the absence of TNF. TNF triggers its translocation to the cytoplasm in response to stress stimuli, thus activating nuclear MAP3K5-JNK by derepression and promoting apoptosis. May be involved in anti- oxidative stress responses. Involved in the regulation of eye size, lens formation and retinal lamination during late embryogenesis. Promotes angiogenesis and to be involved in erythroid differentiation. May be involved in malignant squamous cell tumor formation.

HIPK1 Antibody (clone 1D6) - References







Miyata Y., et al. Submitted (AUG-2002) to the EMBL/GenBank/DDBJ databases. Gregory S.G., et al. Nature 441:315-321(2006). Mural R.J., et al. Submitted (JUL-2005) to the EMBL/GenBank/DDBJ databases. Bechtel S., et al. BMC Genomics 8:399-399(2007). Ishikawa K., et al. DNA Res. 5:169-176(1998).