

Recombinant Human NME1/NDKA Protein (His Tag)

Catalog No. PKSH030357

Note: Centrifuge before opening to ensure complete recovery of vial contents.

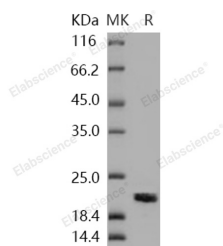
Description

Synonyms	Nucleoside Diphosphate Kinase A;NDK A;NDP Kinase A;Granzyme A-Activated DNase;GAAD;Metastasis Inhibition Factor nm23;Tumor Metastatic Process-Associated Protein;nm23-H1;NME1;NDPKA;NM23;AWD;GAAD;NB;NBS;NDK A;NDPK-A;NM23-H1
Species	Human
Expression Host	E.coli
Sequence	Ala 2-Glu 152
Accession	NP_000260.1
Calculated Molecular Weight	18.0 kDa
Observed molecular weight	21 kDa
Tag	N-His
Bioactivity	Not validated for activity

Properties

Purity	> 98 % as determined by reducing SDS-PAGE.
Endotoxin	Please contact us for more information.
Storage	Store at < -20°C, stable for 6 months. Please minimize freeze-thaw cycles.
Shipping	This product is provided as liquid. It is shipped at frozen temperature with blue ice/gel packs. Upon receipt, store it immediately at < - 20°C.
Formulation	Supplied as sterile solution of PBS, pH 7.4
Reconstitution	Not Applicable

Data



> 98 % as determined by reducing SDS-PAGE.

Background

NME1, also known as Nucleoside Diphosphate Kinase A (NDK-A), or NM23-H1, belongs to the NDK family. NM23-H1 is known to have a metastasis suppressive activity in many tumor cells. Recent studies have shown that the interacting proteins with NM23-H1 which mediate the cell proliferation, may act as modulators of the metastasis suppressor activity.

For Research Use Only

The interacting proteins with NM23-H1 can be classified into 3 groups. The first group of proteins can be classified as upstream kinases of NM23-H1 such as CKI and Aurora-A/STK15. The second group of proteins acts as downstream effectors for the regulation of specific gene transcriptions, GTP-binding protein functions, and signal transduction in Erk signal cascade. The third group of proteins can be classified as bi-directionally influencing binding partners of NM23-H1. As a result, the interactions with NM23-H1 and binding partners have implications in the biochemical characterization involved in metastasis and tumorigenesis. NDKA is increased in human postmortem cerebrospinal fluid (CSF), a model of global brain insult, suggesting that measurement in CSF and, more importantly, in plasma may be useful as a biomarker of stroke. Additionally, NM23-H1 significantly reduces metastasis without effects on primary tumor size and was the first discovered metastasis suppressor gene.