

NEFH Antibody

Purified Mouse Monoclonal Antibody Catalog # AO1768a

Specification

NEFH Antibody - Product Information

Application WB, IHC, E
Primary Accession P12036
Reactivity Human
Host Mouse
Clonality Monoclonal
Isotype IgG1

Calculated MW 112.4kDa KDa

Description

Neurofilaments are type IV intermediate filament heteropolymers composed of light, medium, and heavy chains. Neurofilaments comprise the axoskeleton and functionally maintain neuronal caliber. They may also play a role in intracellular transport to axons and dendrites. This gene encodes the heavy neurofilament protein. This protein is commonly used as a biomarker of neuronal damage and susceptibility to amyotrophic lateral sclerosis (ALS) has been associated with mutations in this gene.

Immunogen

Purified recombinant fragment of human NEFH (AA: 968-1020) expressed in E. Coli.

Formulation

Purified antibody in PBS with 0.05% sodium azide

NEFH Antibody - Additional Information

Gene ID 4744

Other Names

Neurofilament heavy polypeptide, NF-H, 200 kDa neurofilament protein, Neurofilament triplet H protein, NEFH, KIAA0845, NFH

Dilution

WB~~1/500 - 1/2000 IHC~~1/200 - 1/1000 E~~1/10000

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

NEFH Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

NEFH Antibody - Protein Information



Name NEFH

Synonyms KIAA0845, NFH

Function

Neurofilaments usually contain three intermediate filament proteins: NEFL, NEFM, and NEFH which are involved in the maintenance of neuronal caliber. NEFH has an important function in mature axons that is not subserved by the two smaller NF proteins. May additionally cooperate with the neuronal intermediate filament proteins PRPH and INA to form neuronal filamentous networks (By similarity).

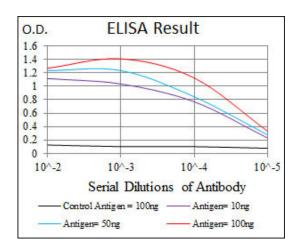
Cellular Location

Cytoplasm, cytoskeleton. Cell projection, axon {ECO:0000250|UniProtKB:P19246}

NEFH Antibody - Protocols

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

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





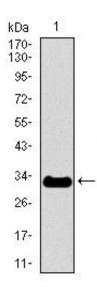


Figure 1: Western blot analysis using NEFH mAb against human NEFH recombinant protein. (Expected MW is 31.2 kDa)

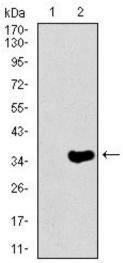


Figure 2: Western blot analysis using NEFH mAb against HEK293 (1) and NEFH (AA: 968-1020)-hlgGFc transfected HEK293 (2) cell lysate.

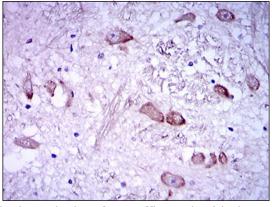


Figure 3: Immunohistochemical analysis of paraffin-embedded medulla oblongata tissues using NEFH mouse mAb with DAB staining.

NEFH Antibody - References

1.J Neurol Sci. 2011 May 15;304(1-2):117-21. 2.Neurochem Res. 2011 Dec;36(12):2287-91.



