

# Anti-NSE gamma Antibody

Mouse Monoclonal Antibody Catalog # AH13194

#### **Product Information**

**Application** WB, IHC-P, IF, FC

Primary Accession P09104
Other Accession 511915

**Reactivity** Human, Mouse, Rat

Host Mouse
Clonality Monoclonal
Isotype Mouse / IgG2b
Clone Names ENO2/1375
Calculated MW 47269

#### **Additional Information**

**Gene ID** 2026

Other Names 2-phospho-D-glycerate hydrolyase; ENO2; ENOG; Enolase 2 gamma neuronal;

Enolase2; Gamma-enolase; Neural enolase; Neuron specific gamma enolase;

Neuron-specific enolase; NSE

**Application Note** Flow Cytometry (0.5-1ug/million cells); Immunofluorescence (1-2ug/ml);

,Western Blotting (0.5-1ug/ml); ,Immunohistology (Formalin-fixed)

(0.1-0.2ug/ml for 30 min at RT),(Staining of formalin-fixed tissues requires boiling tissue sections in 10mM Citrate Buffer, pH 6.0, for 10-20 min followed by cooling at RT for 20 minutes),Optimal dilution for a specific application

should be determined.

**Format** 200ug/ml of Ab purified from Bioreactor Concentrate by Protein A/G.

Prepared in 10mM PBS with 0.05% BSA & 0.05% azide. Also available

WITHOUT BSA & azide at 1.0mg/ml.

**Storage** Store at 2 to 8°C.Antibody is stable for 24 months.

**Precautions** Anti-NSE gamma Antibody is for research use only and not for use in

diagnostic or therapeutic procedures.

#### **Protein Information**

Name ENO2

**Function** Has neurotrophic and neuroprotective properties on a broad spectrum of

central nervous system (CNS) neurons. Binds, in a calcium- dependent manner, to cultured neocortical neurons and promotes cell survival (By

similarity).

**Cellular Location** 

Cytoplasm. Cell membrane. Note=Can translocate to the plasma membrane in either the homodimeric (alpha/alpha) or heterodimeric (alpha/gamma) form

**Tissue Location** 

The alpha/alpha homodimer is expressed in embryo and in most adult tissues. The alpha/beta heterodimer and the beta/beta homodimer are found in striated muscle, and the alpha/gamma heterodimer and the gamma/gamma homodimer in neurons

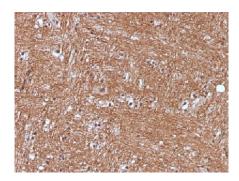
## **Background**

Recognizes a protein of about 50kDa, which is identified as gamma-enolase. Three isoenzymes of enolases are identified, alpha, beta and gamma. Alpha-isoform is expressed in most tissues, whereas beta-form is expressed predominantly in muscle tissue whereas gamma-enolase is found only in nervous tissue. These isoforms exist as both homodimers and heterodimers, and they play a role in converting phosphoglyceric acid to phosphenolpyruvic acid in the glycolytic pathway. NSE-gamma is a useful marker to identify peripheral nerves and tumors of neuro-endocrine origins, such as pheochromocytomas. It it be usually employed in combination with other markers such as Synaptophysin, Chromogranin A, and Neurofilament.

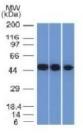
### **Images**



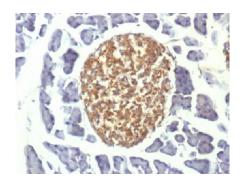
Formalin-fixed, paraffin-embedded Human Pheochromocytoma stained with NSE gamma Monoclonal Antibody (ENO2/1375).



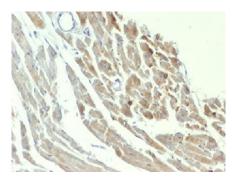
Formalin-fixed, paraffin-embedded Human Cerebellum stained with NSE gamma Monoclonal Antibody (ENO2/1375).



Western Blot of Y79, HeLa and HepG2 Cell Lysate using NSE, gamma Monoclonal Antibody (ENO2/1375).



Formalin-fixed, paraffin-embedded Mouse Pancreas stained with NSE gamma Monoclonal Antibody (ENO2/1375).



Formalin-fixed, paraffin-embedded Rat Heart stained with Formalin-fixed, paraffin-embedded Rat Heart stained with NSE gamma Monoclonal Antibody (ENO2/1375).

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.