

nNOS(S1417) Antibody

Purified Rabbit Polyclonal Antibody (Pab)

Catalog # AP22421a

Product Information

Application	WB, E
Primary Accession	P29475
Reactivity	Human, Mouse
Host	Rabbit
Clonality	polyclonal
Isotype	Rabbit Ig
Clone Names	R04058NP
Calculated MW	160970

Additional Information

Gene ID	4842
Other Names	Nitric oxide synthase 1 {ECO:0000312 HGNC:HGNC:7872}, 1.14.13.39, Constitutive NOS, NC-NOS, NOS type I, Neuronal NOS, N-NOS, nNOS, Nitric oxide synthase, brain, bNOS, Peptidyl-cysteine S-nitrosylase NOS1, NOS1 (HGNC:7872)
Target/Specificity	This nNOS(S1417) antibody is generated from a rabbit immunized with a KLH conjugated synthetic peptide between amino acids from the human region of human nNOS(S1417).
Dilution	WB~~1:1000 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.05% (V/V) Proclin 300. This antibody is purified through a protein A column, followed by peptide affinity purification.
Storage	Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.
Precautions	nNOS(S1417) Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	NOS1 (HGNC:7872)
Function	Produces nitric oxide (NO) which is a messenger molecule with diverse functions throughout the body. In the brain and peripheral nervous system, NO displays many properties of a neurotransmitter. Probably has nitrosylase

activity and mediates cysteine S-nitrosylation of cytoplasmic target proteins such SRR.

Cellular Location

Cell membrane, sarcolemma {ECO:0000250|UniProtKB:Q9Z0J4}; Peripheral membrane protein. Cell projection, dendritic spine {ECO:0000250|UniProtKB:P29476}. Note=In skeletal muscle, it is localized beneath the sarcolemma of fast-twitch muscle fiber by associating with the dystrophin glycoprotein complex (By similarity) In neurons, enriched in dendritic spines (By similarity) {ECO:0000250|UniProtKB:P29476, ECO:0000250|UniProtKB:Q9Z0J4}

Tissue Location

Isoform 1 is ubiquitously expressed: detected in skeletal muscle and brain, also in testis, lung and kidney, and at low levels in heart, adrenal gland and retina. Not detected in the platelets. Isoform 3 is expressed only in testis. Isoform 4 is detected in testis, skeletal muscle, lung, and kidney, at low levels in the brain, but not in the heart and adrenal gland

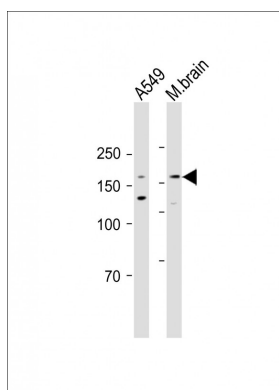
Background

Produces nitric oxide (NO) which is a messenger molecule with diverse functions throughout the body. In the brain and peripheral nervous system, NO displays many properties of a neurotransmitter. Probably has nitrosylase activity and mediates cysteine S-nitrosylation of cytoplasmic target proteins such SRR.

References

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Fujisawa H.,et al.J. Neurochem. 63:140-145(1994).
Nakane M.,et al.FEBS Lett. 316:175-180(1993).
Park C.-S.,et al.Cell. Mol. Neurobiol. 16:499-515(1996).
Wang Y.,et al.J. Biol. Chem. 272:11392-11401(1997).

Images



All lanes: Anti-nNOS(S1417) Antibody at 1:1000 dilution
Lane 1: A549 whole cell lysate Lane 2: Mouse brain lysate
Lysates/proteins at 20 µg per lane. Secondary: Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (ASP1615) at 1/15000 dilution. Observed band size: 161 KDa
Blocking/Dilution buffer: 5% NFDM/TBST.

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