

#### eNos Antibody (S1177)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP11828a

### Specification

## eNos Antibody (S1177) - Product Information

Application Primary Accession Other Accession

Reactivity Predicted Host Clonality Isotype Antigen Region IF, FC, WB,E <u>P29474</u> <u>O62600</u>, <u>O28969</u>, <u>P70313</u>, <u>P29473</u>, <u>NP\_001153582.1</u>, <u>NP\_000594.2</u>, <u>NP\_001153581.1</u>, <u>P79209</u> Human Bovine, Mouse, Pig, Rat, Sheep Rabbit Polyclonal Rabbit IgG 1156-1183

### eNos Antibody (S1177) - Additional Information

#### Gene ID 4846

**Other Names** 

Nitric oxide synthase, endothelial, Constitutive NOS, cNOS, EC-NOS, Endothelial NOS, eNOS, NOS type III, NOSIII, NOS3

#### Target/Specificity

This eNos antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 1156-1183 amino acids from human eNos.

**Dilution** IF~~1:10~50 FC~~1:10~50 WB~~1:1000 E~~Use at an assay dependent concentration.

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. 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

eNos Antibody (S1177) is for research use only and not for use in diagnostic or therapeutic procedures.

### eNos Antibody (S1177) - Protein Information



Name NOS3 (<u>HGNC:7876</u>)

**Function** Produces nitric oxide (NO) which is implicated in vascular smooth muscle relaxation through a cGMP-mediated signal transduction pathway (PubMed:<u>1378832</u>). NO mediates vascular endothelial growth factor (VEGF)-induced angiogenesis in coronary vessels and promotes blood clotting through the activation of platelets.

**Cellular Location** 

Cell membrane. Membrane, caveola. Cytoplasm, cytoskeleton. Golgi apparatus. Note=Specifically associates with actin cytoskeleton in the G2 phase of the cell cycle; which is favored by interaction with NOSIP and results in a reduced enzymatic activity

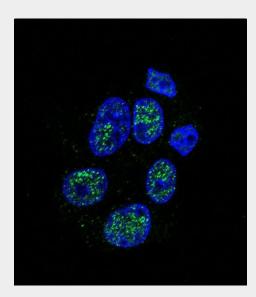
**Tissue Location** Platelets, placenta, liver and kidney.

## eNos Antibody (S1177) - Protocols

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

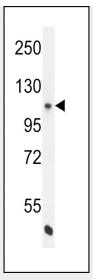
- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

eNos Antibody (S1177) - Images

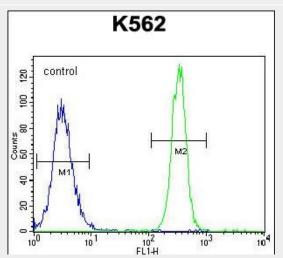


Confocal immunofluorescent analysis of eNos Antibody (S1177)(Cat#AP11828a) with HepG2 cell followed by Alexa Fluor 488-conjugated goat anti-rabbit IgG (green).DAPI was used to stain the cell nuclear (blue).





eNos Antibody (S1177) (Cat. #AP11828a) western blot analysis in K562 cell line lysates (35ug/lane).This demonstrates the eNos antibody detected the eNos protein (arrow).



eNos Antibody (S1177) (Cat. #AP11828a) flow cytometric analysis of K562 cells (right histogram) compared to a negative control cell (left histogram).FITC-conjugated goat-anti-rabbit secondary antibodies were used for the analysis.

# eNos Antibody (S1177) - Background

Nitric oxide is a reactive free radical which acts as a biologic mediator in several processes, including neurotransmission and antimicrobial and antitumoral activities. Nitric oxide is synthesized from L-arginine by nitric oxide synthases. Variations in this gene are associated with susceptibility to coronary spasm. Multiple transcript variants encoding different isoforms have been found for this gene.

# eNos Antibody (S1177) - References

Yanamandra, K., et al. Ophthalmic Genet. 31(4):173-177(2010) Bambha, K., et al. Mayo Clin. Proc. 85(9):814-820(2010) Shin, S.J., et al. Eur. J. Obstet. Gynecol. Reprod. Biol. 152(1):64-67(2010) Kim, S.M., et al. Kardiol Pol 68(8):920-926(2010) Dafni, C., et al. BMC Med. Genet. 11, 133 (2010) :

# eNos Antibody (S1177) - Citations

- <u>Cilostazol Induces eNOS and TM Expression via Activation with Sirtuin 1/Krüppel-like Factor</u> <u>2 Pathway in Endothelial Cells</u>
- KLF2 regulates eNOS uncoupling via Nrf2/HO-1 in endothelial cells under hypoxia and reoxygenation.
- The anti-inflammatory effect and potential mechanism of cardamonin in DSS-induced colitis.
- Activation of Krüppel-Like Factor 2 with Ginkgo Biloba Extract Induces eNOS Expression and Increases NO Production in Cultured Human Umbilical Endothelial Cells.