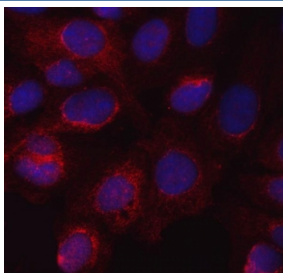


Nitric Oxide Synthase 3 Antibody / NOS3 / eNOS (RQ7611)

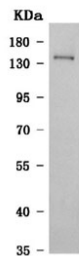
Catalog No.	Formulation	Size
RQ7611	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

Bulk quote request

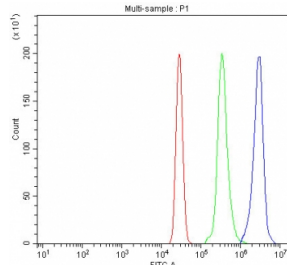
Availability	1-3 business days
Species Reactivity	Human
Format	Antigen affinity purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit IgG
Purity	Antigen affinity purified
Buffer	Lyophilized from 1X PBS with 2% Trehalose
UniProt	P29474
Localization	Cytoplasm, cell membrane
Applications	Western Blot : 0.5-1ug/ml Immunofluorescence : 5ug/ml Flow Cytometry : 1-3ug/million cells Direct ELISA : 0.1-0.5ug/ml
Limitations	This Nitric Oxide Synthase 3 antibody is available for research use only.



Immunofluorescent staining of FFPE human U-2 OS cells with Nitric Oxide Synthase 3 antibody (red) and DAPI nuclear stain (blue). HIER: steam section in pH6 citrate buffer for 20 min.



Western blot testing of human placenta tissue lysate with Nitric Oxide Synthase 3 antibody. Predicted molecular weight ~133 kDa.



Flow cytometry testing of human U937 cells with Nitric Oxide Synthase 3 antibody at 1ug/million cells (blocked with goat sera); Red=cells alone, Green=isotype control, Blue=Nitric Oxide Synthase 3 antibody.

Description

NOS3 (Nitric Oxide Synthase 3), also called eNOS, a nitric oxide synthase that generates NO in blood vessels and is involved with regulating vascular tone by inhibiting smooth muscle contraction and platelet aggregation. The NOS3 gene is mapped on 7q36.1. Variations in this gene are associated with susceptibility to coronary spasm. Fulton et al.(1999) concluded the eNOS is an AKT substrate linking signal transduction by AKT to the release of the gaseous second messenger nitric oxide. AKT mediates the activation of eNOS, leading to increased nitric oxide production. Inhibition of the PI3K AKT pathway or mutation of the AKT site on eNOS protein at serine-1177 attenuated the serine phosphorylation and prevented the activation of eNOS. RT-PCR analysis showed that expression of NOS3 in human umbilical vein endothelial cells (HUVECs) and human aortic vascular smooth muscle cells (HAOVSMCs) was inversely proportional to that of NOS3AS.

Application Notes

Optimal dilution of the Nitric Oxide Synthase 3 antibody should be determined by the researcher.

Immunogen

E. coli-derived recombinant human protein (amino acids P34-Q1153) was used as the immunogen for the Nitric Oxide Synthase 3 antibody.

Storage

After reconstitution, the Nitric Oxide Synthase 3 antibody can be stored for up to one month at 4°C. For long-term, aliquot and store at -20°C. Avoid repeated freezing and thawing.