

Datasheet for ABIN7554738 NOS2 Protein (AA 1-1153) (His tag)



Overview

Quantity:	1 mg
Target:	NOS2
Protein Characteristics:	AA 1-1153
Origin:	Human
Source:	HEK-293 Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This NOS2 protein is labelled with His tag.

Product Details

Purpose:	Custom-made recombinant NOS2 Protein expressed in mammalian cells.
Sequence:	MACPWKFLFK TKFHQYAMNG EKDINNNVEK APCATSSPVT QDDLQYHNLS KQQNESPQPL
	VETGKKSPES LVKLDATPLS SPRHVRIKNW GSGMTFQDTL HHKAKGILTC RSKSCLGSIM
	TPKSLTRGPR DKPTPPDELL PQAIEFVNQY YGSFKEAKIE EHLARVEAVT KEIETTGTYQ
	LTGDELIFAT KQAWRNAPRC IGRIQWSNLQ VFDARSCSTA REMFEHICRH VRYSTNNGNI
	RSAITVFPQR SDGKHDFRVW NAQLIRYAGY QMPDGSIRGD PANVEFTQLC IDLGWKPKYG
	RFDVVPLVLQ ANGRDPELFE IPPDLVLEVA MEHPKYEWFR ELELKWYALP AVANMLLEVG
	GLEFPGCPFN GWYMGTEIGV RDFCDVQRYN ILEEVGRRMG LETHKLASLW KDQAVVEINI
	AVLHSFQKQN VTIMDHHSAA ESFMKYMQNE YRSRGGCPAD WIWLVPPMSG SITPVFHQEM
	LNYVLSPFYY YQVEAWKTHV WQDEKRRPKR REIPLKVLVK AVLFACMLMR KTMASRVRVT
	ILFATETGKS EALAWDLGAL FSCAFNPKVV CMDKYRLSCL EEERLLLVVT STFGNGDCPG
	NGEKLKKSLF MLKELNNKFR YAVFGLGSSM YPRFCAFAHD IDQKLSHLGA SQLTPMGEGD
	ELSGQEDAFR SWAVQTFKAA CETFDVRGKQ HIQIPKLYTS NVTWDPHHYR LVQDSQPLDL

SKALSSMHAK NVFTMRLKSR QNLQSPTSSR ATILVELSCE DGQGLNYLPG EHLGVCPGNQ
PALVQGILER VVDGPTPHQT VRLEALDESG SYWVSDKRLP PCSLSQALTY FLDITTPPTQ
LLLQKLAQVA TEEPERQRLE ALCQPSEYSK WKFTNSPTFL EVLEEFPSLR VSAGFLLSQL
PILKPRFYSI SSSRDHTPTE IHLTVAVVTY HTRDGQGPLH HGVCSTWLNS LKPQDPVPCF
VRNASGFHLP EDPSHPCILI GPGTGIAPFR SFWQQRLHDS QHKGVRGGRM TLVFGCRRPD
EDHIYQEEML EMAQKGVLHA VHTAYSRLPG KPKVYVQDIL RQQLASEVLR VLHKEPGHLY
VCGDVRMARD VAHTLKQLVA AKLKLNEEQV EDYFFQLKSQ KRYHEDIFGA VFPYEAKKDR
VAVQPSSLEM SAL Sequence without tag. The proposed Purification-Tag is based on
experiences with the expression system, a different complexity of the protein could make
another tag necessary. In case you have a special request, please contact us.

Specificity:

If you are looking for a specific domain and are interested in a partial protein or a different isoform, please contact us regarding an individual offer.

Characteristics:

Key Benefits:

- Made to order protein from design to production by highly experienced protein experts.
- · Protein expressed in mammalian cells and purified in one-step affinity chromatography
- The optimized expression system ensures reliability for intracellular, secreted and transmembrane proteins.
- · State-of-the-art algorithm used for plasmid design (Gene synthesis).

This protein is a made-to-order protein and will be made for the first time for your order. Our experts in the lab try to ensure that you receive soluble protein.

If you are not interested in a full length protein, please contact us for individual protein fragments.

The big advantage of ordering our made-to-order proteins in comparison to ordering custom made proteins from other companies is that there is no financial obligation in case the protein cannot be expressed or purified.

Purity:

> 90 % as determined by Bis-Tris PAGE, anti-tag ELISA, Western Blot and analytical SEC (HPLC)

Grade:

custom-made

Target Details

Target:	NOS2
Alternative Name:	NOS2 (NOS2 Products)
Background:	Nitric oxide synthase, inducible (EC 1.14.13.39) (Hepatocyte NOS) (HEP-NOS) (Inducible NO

synthase) (Inducible NOS) (INOS) (NOS type II) (Peptidyl-cysteine S-nitrosylase NOS2),FUNCTION: Produces nitric oxide (NO) which is a messenger molecule with diverse functions throughout the body (PubMed:7531687, PubMed:7544004, PubMed:7682706, PubMed:7504305). In macrophages, NO mediates tumoricidal and bactericidal actions. Also has nitrosylase activity and mediates cysteine S-nitrosylation of cytoplasmic target proteins such PTGS2/COX2 (By similarity). As component of the iNOS-S100A8/9 transnitrosylase complex involved in the selective inflammatory stimulus-dependent S-nitrosylation of GAPDH on 'Cys-247' implicated in regulation of the GAIT complex activity and probably multiple targets including ANXA5, EZR, MSN and VIM (PubMed:25417112). Involved in inflammation, enhances the synthesis of pro-inflammatory mediators such as IL6 and IL8 (PubMed:19688109). (ECO:0000250|UniProtKB:P29477, ECO:0000269|PubMed:19688109, ECO:0000269|PubMed:25417112, ECO:0000269|PubMed:7504305, ECO:0000269|PubMed:7531687, ECO:0000269|PubMed:7544004, ECO:0000269|PubMed:7682706}.

Molecular Weight:

131.1 kDa

UniProt:

P35228

Pathways:

Retinoic Acid Receptor Signaling Pathway, Cellular Response to Molecule of Bacterial Origin,

Inscrital Metabolic Process. Pagulation of Leukaguta Mediated Immunity, Pagility Regulation of

Inositol Metabolic Process, Regulation of Leukocyte Mediated Immunity, Positive Regulation of Immune Effector Process

Application Details

Application Notes: We expect the protein to work for functional studies. As the protein has not been tested for functional studies yet we cannot offer a guarantee though.

Restrictions: For Research Use only

Handling

Format:

Buffer:
The buffer composition is at the discretion of the manufacturer.

Handling Advice:
Avoid repeated freeze-thaw cycles.

Storage:
-80 °C

Storage Comment:
Store at -80°C.

Expiry Date:
12 months