

Goat anti-GP91-PHOX / NOX2 Antibody

Peptide-affinity purified goat antibody

Catalog # AF4526a

Product Information

Application	WB, Pep-ELISA
Primary Accession	P04839
Other Accession	NP_000388.2
Reactivity	Human, Mouse, Rat, Pig, Dog, Bovine
Host	Goat
Clonality	Polyclonal
Clone Names	CYBB
Calculated MW	65336

Additional Information

Gene ID	1536
Other Names	CYBB; cytochrome b-245, beta polypeptide; CGD; GP91-1; GP91-PHOX; GP91PHOX; NOX2; p91-PHOX; CGD91-phox; NADPH oxidase 2; cytochrome b(558) subunit beta; cytochrome b-245 heavy chain; cytochrome b558 subunit beta; heme-binding membrane glycoprotein gp91pho
Dilution	WB~~1:1000 Pep-ELISA~~N/A
Format	Supplied at 0.5 mg/ml in Tris saline, 0.02% sodium azide, pH7.3 with 0.5% bovine serum albumin. Aliquot and store at -20°C. Minimize freezing and thawing.
Storage	Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.
Precautions	Goat anti-GP91-PHOX / NOX2 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	CYBB (HGNC:2578)
Synonyms	NOX2
Function	Catalytic subunit of the phagocyte NADPH oxidase complex that mediates the transfer of electrons from cytosolic NADPH to O ₂ to produce the superoxide anion (O ₂ ⁻) (PubMed: 15338276 , PubMed: 36241643 , PubMed: 36413210 , PubMed: 38355798). In the activated complex, electrons are first transferred from NADPH to flavin adenine dinucleotide (FAD) and

subsequently transferred via two heme molecules to molecular oxygen, producing superoxide through an outer-sphere reaction (Probable) (PubMed:[38355798](#)). Activation of the NADPH oxidase complex is initiated by the assembly of cytosolic subunits of the NADPH oxidase complex with the core NADPH oxidase complex to form a complex at the plasma membrane or phagosomal membrane (PubMed:[19028840](#), PubMed:[38355798](#)). This activation process is initiated by phosphorylation dependent binding of the cytosolic NCF1/p47-phox subunit to the C-terminus of CYBA/p22-phox (By similarity). NADPH oxidase complex assembly is impaired through interaction with NRROS (By similarity).

Cellular Location

Cell membrane; Multi-pass membrane protein. Note=As unassembled monomer may localize to the endoplasmic reticulum

Tissue Location

Detected in neutrophils (at protein level).

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