

Anti-NOX1 Antibody

Catalog # ABO11047

Specification

Anti-NOX1 Antibody - Product Information

ApplicationWB, IHC-PPrimary AccessionQ9Y5S8HostRabbitReactivityHumanClonalityPolyclonalFormatLyophilizedDescriptionRabbit IgG polyclonal antibody for NADPH oxidase 1(NOX1) detection. Tested with WB, IHC-P in Human.

Reconstitution Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-NOX1 Antibody - Additional Information

Gene ID 27035

Other Names NADPH oxidase 1, NOX-1, 1.-.-, Mitogenic oxidase 1, MOX-1, NADH/NADPH mitogenic oxidase subunit P65-MOX, NOH-1, NOX1, MOX1, NOH1

Calculated MW 64871 MW KDa

Application Details Immunohistochemistry(Paraffin-embedded Section), 0.5-1 μg/ml, Human, By Heat
Western blot, 0.1-0.5 μg/ml, Human

Subcellular Localization Cell projection, invadopodium membrane ; Multi-pass membrane protein .

Tissue Specificity NOH-1L is detected in colon, uterus, prostate, and colon carcinoma, but not in peripheral blood leukocytes. NOH- 1S is detected only in colon and colon carcinoma cells.

Protein Name NADPH oxidase 1(NOX-1)

Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg Thimerosal, 0.05mg NaN3.

Immunogen

A synthetic peptide corresponding to a sequence in the middle region of human NOX1(354-374aa, HIRAAGDWTENLIRAFEQQYS).



Purification Immunogen affinity purified.

Cross Reactivity No cross reactivity with other proteins

Storage

At -20°C for one year. After r°Constitution, at 4°C for one month. It°Can also be aliquotted and stored frozen at -20°C for a longer time.Avoid repeated freezing and thawing.

Sequence Similarities Contains 1 FAD-binding FR-type domain.

Anti-NOX1 Antibody - Protein Information

Name NOX1 (HGNC:7889)

Synonyms MOX1, NOH1

Function

NADPH oxidase that catalyzes the generation of superoxide from molecular oxygen utilizing NADPH as an electron donor.

Cellular Location Cell projection, invadopodium membrane; Multi-pass membrane protein. Cell membrane; Multi-pass membrane protein

Tissue Location [Isoform NOH-1L]: Detected in colon, uterus, prostate, and colon carcinoma, but not in peripheral blood leukocytes

Anti-NOX1 Antibody - 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>

Anti-NOX1 Antibody - Images





Anti-NOX1 antibody, ABO11047, IHC(P)IHC(P): Human Lung Cancer Tissue



Anti-NOX1 antibody, ABO11047, Western blottingAll lanes: Anti NOX1 (ABO11047) at 0.5ug/mlLane 1: HELA Whole Cell Lysate at 40ugLane 2: MCF-7 Whole Cell Lysate at 40ugPredicted bind size: 65KDObserved bind size: 65KD

Anti-NOX1 Antibody - Background

NOX1(NADPH OXIDASE 1), also known as NOH1, MOX1 or GP91-2, is an enzyme that in humans is encoded by the NOX1 gene. It is also a homolog of the catalytic subunit of the superoxide-generating NADPH oxidase of phagocytes, gp91phox. The NOX1 gene is mapped to Xq22.1. NOX1 was expressed in colon, prostate, uterus, and vascular smooth muscle, but not in peripheral blood leukocytes. The deduced 564-amino acid NOX1 protein, which is 58% identical to CYBB, contains 6 membrane-spanning regions, conserved flavin and pyridine nucleotide-binding sites, and histidines possibly involved in heme ligation. Overexpression of MOX1 in NIH 3T3 cells increased superoxide generation and cell growth. Cells expressing MOX1 had a transformed appearance, showed anchorage-independent growth, and produced tumors in athymic mice. Disruption of either Nox1 or Nox2 significantly delayed progression of motor neuron disease in these mice. However, 50% survival rates were enhanced significantly more by Nox2 deletion than Nox1 deletion.