# AtNOS1 (E-12): sc-136590



The Power to Question

#### **BACKGROUND**

Representing approximately 6% of the human genome, chromosome 4 contains nearly 900 genes. Notably, the Huntingtin gene, which is found to encode an expanded glutamine tract in cases of Huntington's disease, is on chromosome 4. FGFR-3 is also encoded on chromosome 4 and has been associated with thanatophoric dwarfism, achondroplasia, Muenke syndrome and bladder cancer. Chromosome 4 is also tied to Ellis-van Creveld syndrome, methylmalonic acidemia and polycystic kidney disease. Chromosome 4 reportedly contains the largest gene deserts (regions of the genome with no protein encoding genes) and has one of the two lowest recombination frequencies of the human chromosomes. The AtNOS1 gene product has been provisionally designated AtNOS1 pending further characterization.

## **REFERENCES**

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## CHROMOSOMAL LOCATION

Genetic locus: NOA1 (human) mapping to 4q12; Noa1 (mouse) mapping to  $5\ C3.3$ .

#### **SOURCE**

AtNOS1 (E-12) is an affinity purified rabbit polyclonal antibody raised against a peptide mapping within an internal region of AtNOS1 of human origin.

#### **PRODUCT**

Each vial contains 100  $\mu g$  lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-136590 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

#### **APPLICATIONS**

AtNOS1 (E-12) is recommended for detection of AtNOS1 of mouse and human origin by Western Blotting (starting dilution 1:100, dilution range 1:50-1:500), immunofluorescence (starting dilution 1:25, dilution range 1:25-1:250) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

AtNOS1 (E-12) is also recommended for detection of AtNOS1 in additional species, including bovine.

Suitable for use as control antibody for AtNOS1 siRNA (h): sc-89175, AtNOS1 siRNA (m): sc-141331, AtNOS1 shRNA Plasmid (h): sc-89175-SH, AtNOS1 shRNA Plasmid (m): sc-141331-SH, AtNOS1 shRNA (h) Lentiviral Particles: sc-89175-V and AtNOS1 shRNA (m) Lentiviral Particles: sc-141331-V.

### **RECOMMENDED SECONDARY REAGENTS**

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

## **STORAGE**

Store at 4° C, \*\*DO NOT FREEZE\*\*. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

## **RESEARCH USE**

For research use only, not for use in diagnostic procedures.

## **PROTOCOLS**

See our web site at www.scbt.com or our catalog for detailed protocols and support products.

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