**BACKGROUND**

NaS-1, also known as SLC13A1 (solute carrier family 13 (sodium/sulfates transporters), member 1), renal sodium/sulfate cotransporter, hNaSi-1 or NAS1, is a 595 amino acid multi-pass membrane protein that is highly expressed in kidney, where it regulates sulfate reabsorption. A member of the SLC13A transporter (TC 2.A.47) family and NADC subfamily, NaS-1 is encoded by a gene that maps to human chromosome 7q31.32. Chromosome 7 houses over 1,000 genes and comprises nearly 5% of the human genome. Chromosome 7 has been linked to osteogenesis imperfecta, Pendred syndrome, lissencephaly, citrullinemia and Schwachman-Diamond syndrome. The deletion of a portion of the q arm of chromosome 7 is associated with Williams-Beuren syndrome, a condition characterized by mild mental retardation, an unusual comfort and friendliness with strangers and an elfin appearance. Deletions of portions of the q arm of chromosome 7 are also seen in a number of myeloid disorders including cases of acute myelogenous leukemia and myelodysplasia.

**REFERENCES**


**CHROMOSOMAL LOCATION**

Genetic locus: SLC13A1 (human) mapping to 7q31.32.

**SOURCE**

NaS-1 (C-13) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the C-terminus of NaS-1 of human origin.

**PRODUCT**

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-160563 P,(100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

**APPLICATIONS**

NaS-1 (C-13) is recommended for detection of NaS-1 of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation (1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)), immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000). Suitable for use as control antibody for NaS-1 siRNA (h): sc-89635, NaS-1 shRNA Plasmid (h): sc-89635-SH and NaS-1 shRNA (h) Lentiviral Particles: sc-89635-V.

Molecular Weight of NaS-1: 66 kDa.
Positive Controls: Caki-1 cell lysate: sc-2224.

**RECOMMENDED SECONDARY REAGENTS**

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (dilation 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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

**DATA**

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

**STORAGE**

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.