# SNX4 (N-17): sc-10620



The Power to Question

## **BACKGROUND**

Sorting nexin 1 (SNX1) is a member of a large family of hydrophilic proteins that interact with a variety of receptor types and are involved in intracellular trafficking. SNX1 and the related splice variant, SNX1A, bind the epidermal growth factor (EGF) receptor, facilitate its transport to lysosome, and thereby contribute to the degradation of the receptor. SNX2 and SNX4 share a high degree of amino acid similarity with SNX1, as they all contain a characteristic phox homology (PX) domain. These proteins are all partially associated with cellular membranes, and they, likewise, associate with EGF, PDGF and Insulin receptor tyrosine kinases. These nexins are widely expressed and yet have various tissue distribution patterns. Additionally, the sorting nexins can associate with each other and with a variety of other cellular proteins, suggesting that they exist as part of multisubunit complexes. The related protein, SNX3, comprises a distinct subgroup of nexins that share less sequence similarity outside of the PX domain and have dramatically different binding affinities for the tyrosine kinase receptors.

## **REFERENCES**

- Trowbridge, I.S., Collawn, J.F. and Hopkins, C.R. 1993. Signal-dependent membrane protein trafficking in the endocytic pathway. Annu. Rev. Cell Biol. 9: 129-161.
- Opresko, L.K., Chang, C.P., Will, B.H., Burke, P.M., Gill, G.N. and Wiley, H.S. 1995. Endocytosis and lysosomal targeting of epidermal growth factor receptors are mediated by distinct sequences independent of the tyrosine kinase domain. J. Biol. Chem. 270: 4325-4333.
- 3. Ponting, C.P. 1996. Novel domains in NADPH oxidase subunits, sorting nexins, and Ptdlns 3-kinases: binding partners of SH3 domains? Protein Sci. 5: 2353-2357.
- 4. Kurten, R.C., Cadena, D.L. and Gill, G.N. 1996. Enhanced degradation of EGF receptors by a sorting nexin, SNX1. Science 272: 1008-1010.

## CHROMOSOMAL LOCATION

Genetic locus: SNX4 (human) mapping to 3q21.2.

# **SOURCE**

SNX4 (N-17) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the N-terminus of SNX4 of human origin.

#### **PRODUCT**

Each vial contains 200  $\mu g$  lgG in 1.0 ml of PBS with <0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-10620 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

#### **STORAGE**

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

#### **APPLICATIONS**

SNX4 (N-17) is recommended for detection of SNX4 of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2  $\mu$ g per 100-500  $\mu$ g 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 SNX4 siRNA (h): sc-41353, SNX4 shRNA Plasmid (h): sc-41353-SH and SNX4 shRNA (h) Lentiviral Particles: sc-41353-V.

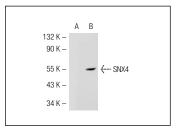
Molecular Weight of SNX4: 60 kDa.

Positive Controls: Jurkat whole cell lysate: sc-2204.

# **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 (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) 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



SNX4 (N-17): sc-10620. Western blot analysis of SNX4 expression in non-transfected: sc-117752 (A) and mouse SNX4 transfected: sc-123700 (B) 293T whole cell Ivsates.

## **RESEARCH USE**

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

MONOS Satisfation Guaranteed

Try **SNX4 (B-4):** sc-271147 or **SNX4 (E-2):** sc-393853, our highly recommended monoclonal alternatives to SNX4 (N-17).

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