

N-Shc (H-140): sc-28833

BACKGROUND

Src homology (SH2) domains are noncatalytic sequences that are conserved among a number of cytoplasmic signaling proteins. These signaling proteins are directly regulated by receptor tyrosine kinases and control the activation of mitogenic signal transduction pathways by such receptors. For instance, ligand-induced activation of the EGF and PDGF receptors induces dimerization, triggers receptor autophosphorylation on tyrosine residues and results in the binding of a number of cytoplasmic SH2 domain proteins such as PLC γ 1, Ras GAP and PI 3-kinase to the activated receptors. Another gene, Shc, encodes two proteins with a single SH2 domain. A Shc-related gene N-Shc (for neuronal Shc), encodes a protein that contains two phosphotyrosine domains (PTB), a single SH2 domain and is expressed exclusively in the brain. Neither Shc nor N-Shc have any identifiable catalytic activity, suggesting them to be members of an expanding class of proteins that function to couple activated growth factor receptors to downstream signaling

CHROMOSOMAL LOCATION

Genetic locus: SHC3 (human) mapping to 9q22.1; Shc3 (mouse) mapping to 13 A5.

SOURCE

N-Shc (H-140) is a rabbit polyclonal antibody raised against amino acids 191-330 mapping within an internal region of N-Shc of human origin.

PRODUCT

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

STORAGE

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

APPLICATIONS

N-Shc (H-140) is recommended for detection of N-Shc p52 and p64 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ 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).

N-Shc (H-140) is also recommended for detection of N-Shc p52 and p64 in additional species, including equine, canine and bovine.

Suitable for use as control antibody for N-Shc siRNA (h): sc-40975, N-Shc siRNA (m): sc-40976, N-Shc shRNA Plasmid (h): sc-40975-SH, N-Shc shRNA Plasmid (m): sc-40976-SH, N-Shc shRNA (h) Lentiviral Particles: sc-40975-V and N-Shc shRNA (m) Lentiviral Particles: sc-40976-V.

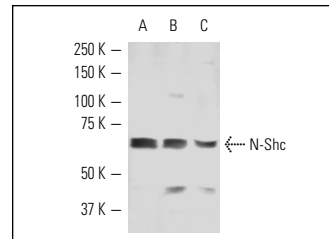
Molecular Weight of N-Shc: 66 kDa.

Positive Controls: SK-N-MC nuclear extract: sc-2154, SH-SY5Y cell lysate: sc-3812 or H4 cell lysate: sc-2408.

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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

DATA



N-Shc (H-140): sc-28833. Western blot analysis of N-Shc expression in SK-N-SH nuclear extract (A) and SH-SY5Y (B) and H4 (C) whole cell lysates.

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.

MONOS
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Try **N-Shc (H-7): sc-365598** or **N-Shc (23): sc-135996**, our highly recommended monoclonal alternatives to N-Shc (H-140).