

NSUN5 (L-13): sc-104468

BACKGROUND

NSUN5 (NOL1/NOP2/Sun domain family, member 5), also known as NOL1, p120 or NOL1R, is a 429 amino acid protein that belongs to the methyl-transferase superfamily and exists as multiple alternatively spliced isoforms. Expressed ubiquitously with higher expression in heart, placenta and skeletal muscle, NSUN5 is thought to function as an S-adenosyl-L-methionine-dependent methyl-transferase whose absence may be associated with the pathogenesis of Williams syndrome. NSUN5 is subject to post-translational phosphorylation, probably by ATM or ATR. The gene encoding NSUN5 maps to human chromosome 7, which houses over 1,000 genes and comprises nearly 5% of the human genome. Defects in some of the genes localized to chromosome 7 have been linked to osteogenesis imperfecta, Williams syndrome, Pendred syndrome, lissencephaly, citrullinemia and Shwachman-Diamond syndrome.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: NSUN5 (human) mapping to 7q11.23; Nsun5 (mouse) mapping to 5 G2.

SOURCE

NSUN5 (L-13) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of NSUN5 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-104468 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

NSUN5 (L-13) is recommended for detection of NSUN5 of mouse, rat and 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); non cross-reactive with other NSUN family members.

NSUN5 (L-13) is also recommended for detection of NSUN5 in additional species, including equine, porcine and avian.

Suitable for use as control antibody for NSUN5 siRNA (h): sc-89751, NSUN5 siRNA (m): sc-106312, NSUN5 shRNA Plasmid (h): sc-89751-SH, NSUN5 shRNA Plasmid (m): sc-106312-SH, NSUN5 shRNA (h) Lentiviral Particles: sc-89751-V and NSUN5 shRNA (m) Lentiviral Particles: sc-106312-V.

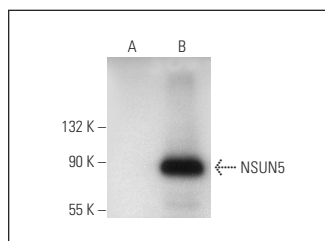
Molecular Weight of NSUN5: 47 kDa.

Positive Controls: NSUN5 (h): 293T Lysate: sc-173607.

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



NSUN5 (L-13): sc-104468. Western blot analysis of NSUN5 expression in non-transfected: sc-117752 (A) and human NSUN5 transfected: sc-173607 (B) 293T whole cell lysates.

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.