SANTA CRUZ BIOTECHNOLOGY, INC.

NNMT (H-68): sc-134603



BACKGROUND

Nicotinamide N-methyltransferase (NNMT) catalyzes the N-methylation of nicotin-amide and other pyridines. NNMT activity in the human liver has a bimodal frequency distribution, indicating that its enzyme activity may be modulated through a genetic polymorphism, which could have functional implications for individual differences in drug and xenobiotic toxicity. The gene that encodes human NNMT is approximately 16.5 kb in length, consists of three exons and two introns and maps to 11q23.2. NNMT isolated from the human liver was determined to be 969 nucleotides in length, with a 792 nucleotide open reading frame that encodes a 264 amino acid protein. The NNMT gene is presumed to be a significant genetic determinant of plasma homocysteine levels in Spanish families, since it encodes an enzyme involved in homocysteine synthesis.

CHROMOSOMAL LOCATION

Genetic locus: NNMT (human) mapping to 11q23.2; Nnmt (mouse) mapping to 9 A5.3.

SOURCE

NNMT (H-68) is a rabbit polyclonal antibody raised against amino acids 191-258 mapping near the C-terminus of NNMT of human origin.

PRODUCT

Each vial contains 200 μ g lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin. Also available as TransCruz reagent for Gel Supershift and ChIP applications, sc-134603 X, 200 μ g/0.1 ml.

STORAGE

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

APPLICATIONS

NNMT (H-68) is recommended for detection of NNMT 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).

NNMT (H-68) is also recommended for detection of NNMT in additional species, including porcine.

Suitable for use as control antibody for NNMT siRNA (h): sc-61213, NNMT siRNA (m): sc-61214, NNMT shRNA Plasmid (h): sc-61213-SH, NNMT shRNA Plasmid (m): sc-61214-SH, NNMT shRNA (h) Lentiviral Particles: sc-61213-V and NNMT shRNA (m) Lentiviral Particles: sc-61214-V.

NNMT (H-68) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

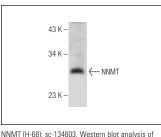
Molecular Weight of NNMT: 30 kDa.

Positive Controls: Hep G2 cell lysate: sc-2227 or human liver extract: sc-363766.

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



NNMT expression in human liver tissue extract.

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 Satisfation Guaranteed

Try **NNMT (G-4): sc-376048**, our highly recommended monoclonal alternative to NNMT (H-68).