SANTA CRUZ BIOTECHNOLOGY, INC.

hnRNP A/B (Y-24): sc-133664



BACKGROUND

Heterogeneous nuclear ribonucleoproteins (hnRNPs) constitute a set of polypeptides that contribute to pre-mRNA processing and transport, and also bind heterogeneous nuclear RNA (hnRNA), which are the transcripts produced by RNA polymerase II. The hnRNPs are associated with pre-mRNAs in the nucleus and appear to influence pre-mRNA processing and other aspects of mRNA metabolism and transport. hnRNP A/B (heterogeneous nuclear ribonucleoprotein A/B), also known as HNRNPAB, ABBP1 or HNRPAB, is a 332 amino acid nuclear protein that is ubiquitously expressed. hnRNP A/B binds single-stranded RNA and has a high affinity for G-rich and U-rich regions of hnRNA. hnRNP A/B contains two RRM (RNA recognition motif) domains and interacts with APOBEC1 (apolipoprotein B mRNA editing enzyme complex-1).

REFERENCES

- 1. Khan, F.A., et al. 1991. Cloning and sequence analysis of a human type A/B hnRNP protein. FEBS Lett. 290: 159-161.
- Lau, P.P., et al. 1997. Cloning of an Apobec-1-binding protein that also interacts with apolipoprotein B mRNA and evidence for its involvement in RNA editing. J. Biol. Chem. 272: 1452-1455.

CHROMOSOMAL LOCATION

Genetic locus: HNRNPAB (human) mapping to 5q35.3; Hnrnpab (mouse) mapping to 11 B1.3.

SOURCE

hnRNP A/B (Y-24) is a Protein A purified rabbit polyclonal antibody raised against synthetic hnRNP A/B peptide of human origin.

PRODUCT

Each vial contains 100 μg lgG in 1.0 ml PBS with < 0.1% sodium azide, 0.1% gelatin and < 0.02% sucrose.

APPLICATIONS

hnRNP A/B (Y-24) is recommended for detection of hnRNP A/B 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), immunohistochemistry (including paraffin-embedded sections) (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 hnRNP A/B siRNA (h): sc-75271, hnRNP A/B siRNA (m): sc-75272, hnRNP A/B shRNA Plasmid (h): sc-75271-SH, hnRNP A/B shRNA Plasmid (m): sc-75272-SH, hnRNP A/B shRNA (h) Lentiviral Particles: sc-75271-V and hnRNP A/B shRNA (m) Lentiviral Particles: sc-75272-V.

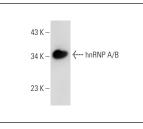
Molecular Weight of hnRNP A/B: 37 kDa.

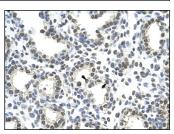
Positive Controls: HeLa whole cell lysate: sc-2200 or Daudi cell lysate: sc-2415.

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. 4) Immuno-histochemistry: use ImmunoCruz[™]: sc-2051 or ABC: sc-2018 rabbit IgG Staining Systems.

DATA





hnRNP A/B (Y-24): sc-133664. Western blot analysis of hnRNP A/B expression in HeLa whole cell lysate.

hnRNP A/B (Y-24): sc-133664. Immunoperoxidase staining of formalin-fixed, paraffin-embedded human heart tissue showing nuclear localization.

SELECT PRODUCT CITATIONS

 Hino, K., et al. 2013. Downregulation of Nipah virus N mRNA occurs through interaction between its 3' untranslated region and hnRNP D. J. Virol. 87: 6582-6588.

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.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.

