SANTA CRUZ BIOTECHNOLOGY, INC.

BS69 (H-265): sc-292571



BACKGROUND

The adenovirus E1A gene products are nuclear phosphoproteins with the ability to transactivate other adenovirus genes. BS69 specifically interacts with adenovirus 5 E1A and inhibits transactivation by the 289R E1A protein. BS69 interacts with the co-repressor N-CoR through an essential MYND domain in the carboxy terminus of N-CoR. BS69 also inhibits the transcriptional activity of c-Myb. During oncogenesis, this BS69/Myb regulatory circuit maybe be a target for disruption. Another ubiquitously expressed member of the Myb gene family, b-Myb, also interacts with BS69 and N-CoR to function as a transcriptional repressor. BRAM1, a splice variant of BS69, binds specifically to bone morphogenetic protein type IA receptor (BMPR-IA). BRAM1 localizes to the cytoplasm of mammalian cells, while BS69 localizes to the cell nucleus. Unlike BS69, BRAM1 is unable to repress transcription.

REFERENCES

- Hateboer, G., Gennissen, A., Ramos, Y.F., Kerkhoven, R.M., Sonntag-Buck, V., Stunnenberg, H.G. and Bernards, R. 1995. BS69, a novel adenovirus E1A-associated protein that inhibits E1A transactivation. EMBO J. 14: 3159-3169.
- Kurozumi, K., Nishita, M., Yamaguchi, K., Fujita, T., Ueno, N. and Shibuya, H. 1998. BRAM1, a BMP receptor-associated molecule involved in BMP signalling. Genes Cells 3:257-64.
- Masselink, H. and Bernards, R. 2000. The adenovirus E1A binding protein BS69 is a corepressor of transcription through recruitment of N-CoR. Oncogene 19: 1538-1546.
- Masselink, H., Vastenhouw, N. and Bernards, R. 2001. B-myb rescues rasinduced premature senescence, which requires its transactivation domain. Cancer Lett. 171: 87-101.
- Ladendorff, N.E., Wu, S. and Lipsick, J.S. 2001. BS69, an adenovirus E1Aassociated protein, inhibits the transcriptional activity of c-Myb. Oncogene 20: 125-132.

CHROMOSOMAL LOCATION

Genetic locus: ZMYND11 (human) mapping to 10p15.3; Zmynd11 (mouse) mapping to 13 A1.

SOURCE

BS69 (H-265) is a rabbit polyclonal antibody raised against amino acids 255-519 mapping near the C-terminus of BS69 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.

STORAGE

Store at 4° C, **D0 NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

APPLICATIONS

BS69 (H-265) is recommended for detection of BS69 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).

BS69 (H-265) is also recommended for detection of BS69 in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for BS69 siRNA (h): sc-106842, BS69 siRNA (m): sc-141760, BS69 shRNA Plasmid (h): sc-106842-SH, BS69 shRNA Plasmid (m): sc-141760-SH, BS69 shRNA (h) Lentiviral Particles: sc-106842-V and BS69 shRNA (m) Lentiviral Particles: sc-141760-V.

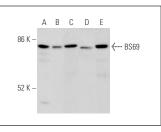
Molecular Weight of BS69: 66 kDa.

Positive Controls: HeLa whole cell lysate: sc-2200, NIH/3T3 whole cell lysate: sc-2210 or Hep G2 nuclear extract: sc-364819.

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



BS69 (H-265): sc-292571. Western blot analysis of BS69 expression in HeLa (A), RT-4 (B) and NIH/3T3 (C) whole cell lysates, mouse liver tissue extract (D) and Hep G2 nuclear extract (E).

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.