SNF2L (H-3): sc-518199



The Power to Question

BACKGROUND

SNF2L, also known as SMARCA1 (SWI/SNF related, matrix associated, Actin dependent regulator of chromatin, subfamily a, member 1), SWI or ISWI, is a 1,054 amino acid protein that localizes to the nucleus and contains one helicase C-terminal domain, one helicase ATP-binding domain and two SANT domains. Expressed as multiple alternatively spliced isoforms, SNF2L exists as a component of the nucleosome-remodeling factor (NURF) complex where it helps to facilitate the ATP-dependent perturbation of chromatin structure and may also be involved in brain development and neurite outgrowth. The gene encoding SNF2L maps to human chromosome X, which contains nearly 153 million base pairs and houses over 1,000 genes.

REFERENCES

- Okabe, I., et al. 1992. Cloning of human and bovine homologs of SNF2/ SWI2: a global activator of transcription in yeast *S. cerevisiae*. Nucleic Acids Res. 20: 4649-4655.
- Lazzaro, M.A. and Picketts, D.J. 2001. Cloning and characterization of the murine Imitation Switch (ISWI) genes: differential expression patterns suggest distinct developmental roles for SNF2H and SNF2L. J. Neurochem. 77: 1145-1156.
- 3. Barak, O., et al. 2003. Isolation of human NURF: a regulator of Engrailed gene expression. EMBO J. 22: 6089-6100.
- 4. Barak, O., et al. 2004. A tissue-specific, naturally occurring human SNF2L variant inactivates chromatin remodeling. J. Biol. Chem. 279: 45130-45138.
- Wang, F., et al. 2004. Roles of Brahma and Brahma/SWI2-related gene 1 in hypoxic induction of the erythropoietin gene. J. Biol. Chem. 279: 46733-46741.
- Banting, G.S., et al. 2005. CECR2, a protein involved in neurulation, forms a novel chromatin remodeling complex with SNF2L. Hum. Mol. Genet. 14: 513-524.

CHROMOSOMAL LOCATION

Genetic locus: SMARCA1 (human) mapping to Xq25.

SOURCE

SNF2L (H-3) is a mouse monoclonal antibody specific for an epitope mapping between amino acids 866-890 of SNF2L of human origin.

PRODUCT

Each vial contains 200 μg lgG_1 kappa light chain in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

SNF2L (H-3) is available conjugated to agarose (sc-518199 AC), 500 μ g/ 0.25 ml agarose in 1 ml, for IP; to HRP (sc-518199 HRP), 200 μ g/ml, for WB, IHC(P) and ELISA; to either phycoerythrin (sc-518199 PE), fluorescein (sc-518199 FITC), Alexa Fluor* 488 (sc-518199 AF488), Alexa Fluor* 546 (sc-518199 AF546), Alexa Fluor* 594 (sc-518199 AF594) or Alexa Fluor* 647 (sc-518199 AF647), 200 μ g/ml, for WB (RGB), IF, IHC(P) and FCM; and to either Alexa Fluor* 680 (sc-518199 AF680) or Alexa Fluor* 790 (sc-518199 AF790), 200 μ g/ml, for Near-Infrared (NIR) WB, IF and FCM.

APPLICATIONS

SNF2L (H-3) is recommended for detection of SNF2L of human origin by Western Blotting (starting dilution 1:100, 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).

Suitable for use as control antibody for SNF2L siRNA (h): sc-76532, SNF2L shRNA Plasmid (h): sc-76532-SH and SNF2L shRNA (h) Lentiviral Particles: sc-76532-V.

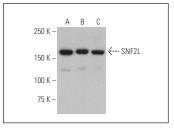
Molecular Weight of SNF2L: 123 kDa.

Positive Controls: HT-1080 whole cell lysate: sc-364183, PANC-1 whole cell lysate: sc-364380 or A549 cell lysate: sc-2413.

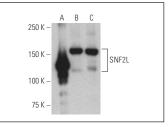
RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support reagents are recommended: 1) Western Blotting: use m-lgG κ BP-HRP: sc-516102 or m-lgG κ BP-HRP (Cruz Marker): sc-516102-CM (dilution range: 1:1000-1:10000), Cruz MarkerTM Molecular Weight Standards: sc-2035, UltraCruz* Blocking Reagent: sc-516214 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 m-lgG κ BP-FITC: sc-516140 or m-lgG κ BP-PE: sc-516141 (dilution range: 1:50-1:200) with UltraCruz* Mounting Medium: sc-24941 or UltraCruz* Hard-set Mounting Medium: sc-359850.

DATA







SNF2L (H-3): sc-518199. Western blot analysis of human recombinant SNF2L ($\bf A$) and SNF2L expression in HT-1080 ($\bf B$) and PANC-1 ($\bf C$) whole cell lysates. Detection reagent used: m-lgG₁ BP-HRP: sc-525408.

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 for detailed protocols and support products.

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