SANTA CRUZ BIOTECHNOLOGY, INC.

ASC-1 (m): 293T Lysate: sc-118583

BACKGROUND

Activating signal cointegrator-1 (ASC-1, originally identified as TRIP4) is a transcriptional coactivator of nuclear receptors that associates with specific components of the RNA polymerase II complex and binds the basal transcription factors TBP and TFIIA. ASC-1 functions with the transcription integrators SRC-1 and CBP/p300 through its zinc-finger motif and is dependent on their ligand-dependent transactivation domain, AF2. Endogenous ASC-1 in HeLa cells is predominantly a nuclear protein. Under conditions of serum starvation, ASC-1 localizes to the cytoplasm. However, when serum starved in the presence of ligand or coexpressed CBP or SRC-1, ASC-1 remains in the nucleus. This behavior of ASC-1 suggests that it may play an important role in establishing distinct coactivator complexes under different cellular conditions.

REFERENCES

1. Lee, J.W., et al. 1995. Two classes of proteins dependent on either the presence or absence of thyroid hormone for interaction with the thyroid hormone receptor. Mol. Endocrinol. 9: 243-254.
2. Mangelsdorf, D.J., et al. 1995. The nuclear receptor superfamily: the second decade. Cell 83: 835-839.
3. Yao, T.P., et al. 1996. The nuclear hormone receptor coactivator SRC-1 is a specific target of p300. Proc. Natl. Acad. Sci. USA 93: 10626-10631.
4. Shibata, H., et al. 1997. Role of co-activators and co-repressors in the mechanism of steroid/thyroid receptor action. Recent Prog. Horm. Res. 52: 141-164.
5. Kim, H.J., et al. 1999. Activating signal cointegrator 1, a novel transcription coactivator of nuclear receptors, and its cytosolic localization under conditions of serum deprivation. Mol. Cell. Biol. 19: 6323-6332.

CHROMOSOMAL LOCATION

Genetic locus: Trip4 (mouse) mapping to 9 C.

PRODUCT

ASC-1 (m): 293T Lysate represents a lysate of mouse ASC-1 transfected 293T cells and is provided as 100 µg protein in 200 µl SDS-PAGE buffer.

STORAGE

Store at -20° C. Repeated freezing and thawing should be minimized. Sample vial should be boiled once prior to use. Non-hazardous. No MSDS required.

APPLICATIONS

ASC-1 (m): 293T Lysate is suitable as a Western Blotting positive control for mouse reactive ASC-1 antibodies. Recommended use: 10-20 µl per lane.

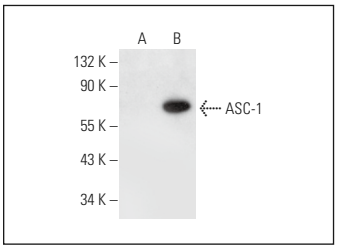
Control 293T Lysate: sc-117752 is available as a Western Blotting negative control lysate derived from non-transfected 293T cells.

ASC-1 (D-4): sc-365611 is recommended as a positive control antibody for Western Blot analysis of enhanced mouse ASC-1 expression in ASC-1 transfected 293T cells (starting dilution 1:100, dilution range 1:100-1:1,000).

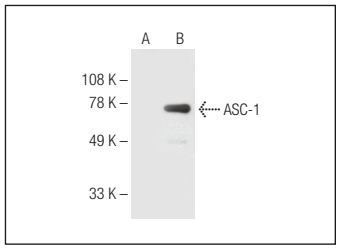
RECOMMENDED SUPPORT REAGENTS

To ensure optimal results, the following support reagents are recommended: 1) Western Blotting: use m-IgGκ BP-HRP: sc-516102 or m-IgGκ BP-HRP (Cruz Marker): sc-516102-CM (dilution range: 1:1000-1:10000), Cruz Marker™ Molecular Weight Standards: sc-2035, UltraCruz® Blocking Reagent: sc-516214 and Western Blotting Luminol Reagent: sc-2048.

DATA



ASC-1 (D-4): sc-365611. Western blot analysis of ASC-1 expression in non-transfected: sc-117752 (**A**) and mouse ASC-1 transfected: sc-118583 (**B**) 293T whole cell lysates.



ASC-1 (F-7): sc-376916. Western blot analysis of ASC-1 expression in non-transfected: sc-117752 (**A**) and mouse ASC-1 transfected: sc-118583 (**B**) 293T whole cell lysates.

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.