

CAP (m): 293T Lysate: sc-118986

BACKGROUND

c-Cbl associated protein (CAP), also designated ponsin and SH3P12, interacts with c-Cbl and facilitates the tyrosine phosphorylation of c-Cbl in response to Insulin. CAP contains three adjacent Src homology-3 (SH3) domains in the carboxy terminus. It interacts with the focal adhesion kinase p125FAK and co-localizes with Actin stress fibers. CAP is expressed in 3T3-L1 adipocytes, but not in 3T3-L1 or NIH/3T3 fibroblasts. Expression of the CAP gene is stimulated by thiazolidinediones (TZDs) through activation of PPAR γ . In addition to its interaction with c-Cbl, CAP interacts with Sos through the same SH3 domain, and may facilitate protein-protein associations involved in cell structural changes.

REFERENCES

1. Ribon, V., et al. 1998. A novel, multifunctional c-Cbl binding protein in Insulin receptor signaling in 2T3-L1 adipocytes. *Mol. Cell Biol.* 18: 872-879.
2. Ribon, V., et al. 1998. A role for CAP, a novel, multifunctional Src homology 3 domain-containing protein in formation of Actin stress fibers and focal adhesions. *J. Biol. Chem.* 273: 4073-4080.
3. Ribon, V., et al. 1998. Thiazolidinediones and Insulin resistance: peroxisome proliferator-activated receptor γ activation stimulates expression of the CAP gene. *Proc. Natl. Acad. Sci. USA* 95: 14751-14756.
4. Kurakin, A., et al. 1998. Molecular recognition properties of the C-terminal SH3 domain of the Cbl associated protein, CAP. *J. Pept. Res.* 52: 331-337.
5. Baumann, C., A., et al. 2000. Cloning and characterization of a functional peroxisome proliferator activator receptor- γ -responsive element in the promoter of the CAP gene. *J. Biol. Chem.* 275: 9131-9135.

CHROMOSOMAL LOCATION

Genetic locus: Sorbs1 (mouse) mapping to 19 C3.

PRODUCT

CAP (m): 293T Lysate represents a lysate of mouse CAP transfected 293T cells and is provided as 100 μ g protein in 200 μ l SDS-PAGE buffer.

APPLICATIONS

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

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

CAP (G-3): sc-166903 is recommended as a positive control antibody for Western Blot analysis of enhanced mouse CAP expression in CAP transfected 293T cells (starting dilution 1:100, dilution range 1:100-1:1,000).

RECOMMENDED SUPPORT REAGENTS

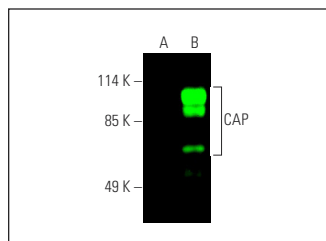
To ensure optimal results, the following support reagents are recommended:

1) Western Blotting: use m-IgG κ BP-HRP: sc-516102 or m-IgG κ 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.

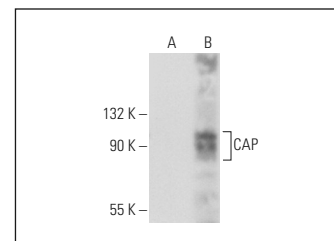
STORAGE

Store at -20 $^{\circ}$ C. Repeated freezing and thawing should be minimized. Sample vial should be boiled once prior to use. Non-hazardous. No MSDS required.

DATA



CAP (G-3): sc-166903. Near-infrared western blot analysis of CAP expression in non-transfected: sc-117752 (A) and mouse CAP transfected: sc-118986 (B) 293T whole cell lysates. Blocked with UltraCruz[®] Blocking Reagent: sc-516214. Detection reagent used: m-IgG κ BP-CFL 680: sc-516180.



CAP (G-3): sc-166903. Western blot analysis of CAP expression in non-transfected: sc-117752 (A) and mouse CAP transfected: sc-118986 (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.