

Mena (K-16): sc-9467

BACKGROUND

The Wiskott-Aldrich syndrome (WAS) is characterized by thrombocytopenia, eczema, defects in cell-mediated and humoral immunity and a propensity for lymphoproliferative diseases. The syndrome is the result of a mutation in the gene encoding a proline-rich protein termed WASP. WASP is a down-stream effector of Cdc42 and has been implicated in actin polymerization and cytoskeletal organization. Distantly related proteins, VASP (vasodilator-stimulated phosphoprotein) and Mena (for mammalian enabled protein), are involved in the regulation of cytoskeletal dynamics. Both Mena and VASP accumulate at focal adhesions. Mena is highly expressed in the developing nervous system and may be involved in growth cone motility and axon guidance.

REFERENCES

1. Reinhard, M., Halbrugge, M., Scheer, U., Wiegand, C., Jockusch, B.M. and Walter, U. 1992. The 46/50 kDa phosphoprotein VASP purified from human platelets is a novel protein associated with actin filaments and focal contacts. *EMBO J.* 11: 2063-2070.
2. Remold-O'Donnell, E., Rosen, F.S. and Kenney, D.M. 1996. Defects in Wiskott-Aldrich syndrome blood cells. *Blood* 87: 2621-2631.
3. Stewart, D.M., Treiber-Held, S., Kurman, C.C., Facchetti, F., Notarangelo, L.D. and Nelson, D.L. 1996. Studies of the expression of the Wiskott-Aldrich syndrome protein. *J. Clin. Invest.* 97: 2627-2634.
4. Symons, M., Derry, J.M., Karlak, B., Jiang, S., Lemahieu, V., McCormick, F., Francke, U. and Abo, A. 1996. Wiskott-Aldrich syndrome protein, a novel effector for the GTPase CDC42Hs, is implicated in actin polymerization. *Cell* 84: 723-734.
5. Kolluri, R., Tolias, K.F., Carpenter, C.L., Rosen, F.S. and Kirchhausen, T. 1996. Direct interaction of the Wiskott-Aldrich syndrome protein with the GTPase Cdc42. *Proc. Natl. Acad. Sci. USA* 93: 5615-5618.

CHROMOSOMAL LOCATION

Genetic locus: ENAH (human) mapping to 1q42.12; Enah (mouse) mapping to 1 H5.

SOURCE

Mena (K-16) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of Mena of mouse origin.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-9467 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

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

APPLICATIONS

Mena (K-16) is recommended for detection of Mena of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), 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).

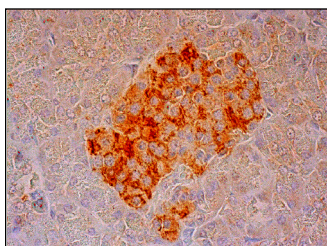
Suitable for use as control antibody for Mena siRNA (h): sc-43496, Mena siRNA (m): sc-43497, Mena shRNA Plasmid (h): sc-43496-SH, Mena shRNA Plasmid (m): sc-43497-SH, Mena shRNA (h) Lentiviral Particles: sc-43496-V and Mena shRNA (m) Lentiviral Particles: sc-43497-V.

Molecular Weight of Mena tissue specific isoforms: 80/88/140 kDa.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (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) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941. 3) Immunohistochemistry: use ImmunoCruz™: sc-2053 or ABC: sc-2023 goat IgG Staining Systems.

DATA



Mena (K-16): sc-9467. Immunoperoxidase staining of formalin fixed, paraffin-embedded human pancreas tissue showing cytoplasmic staining of Islets of Langerhans.

SELECT PRODUCT CITATIONS

1. Schick, B., Praetorius, M., Eigenthaler, M., Jung, V., Müller, M., Walter, U. and Knipper, M. 2004. Increased noise sensitivity and altered inner ear MENA distribution in VASP^{-/-} mice. *Cell Tissue Res.* 318: 493-502.

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.