

POMT1 (K-18): sc-48915

BACKGROUND

O-mannosylation is an essential protein modification in eukaryotes that is initiated by an evolutionarily conserved family of protein O-mannosyltransferases. The POMT1 (protein O-mannosyltransferase 1) protein consists of 725 amino acids. POMT1 contains seven to twelve presumed transmembrane regions and a C-terminal ER membrane retention signal; RT-PCR reveals several mRNA splice variants. RNA dot blot analysis indicates ubiquitous expression of POMT1, with maximum levels in testis and high levels in fetal brain and pituitary tissues. Walker-Warburg syndrome (WWS), a severe, recessive, congenital muscular dystrophy associated with defects in neuronal migration that produce complex brain and eye abnormalities, is caused by mutations in the POMT1 gene.

CHROMOSOMAL LOCATION

Genetic locus: POMT1 (human) mapping to 9q34.13; Pomt1 (mouse) mapping to 2 B.

SOURCE

POMT1 (K-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of POMT1 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.

Blocking peptide available for competition studies, sc-48915 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

POMT1 (K-18) is recommended for detection of POMT1 isoforms 1, 2 and 3 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, 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).

POMT1 (K-18) is also recommended for detection of POMT1 isoforms 1, 2 and 3 in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for POMT1 siRNA (h): sc-61379, POMT1 siRNA (m): sc-61380, POMT1 shRNA Plasmid (h): sc-61379-SH, POMT1 shRNA Plasmid (m): sc-61380-SH, POMT1 shRNA (h) Lentiviral Particles: sc-61379-V and POMT1 shRNA (m) Lentiviral Particles: sc-61380-V.

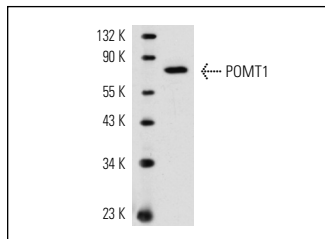
Molecular Weight of POMT1: 75 kDa.

Positive Controls: POMT1 (m): 293T Lysate: sc-127367, mouse testis extract: sc-2405 or rat testis extract: sc-2400.

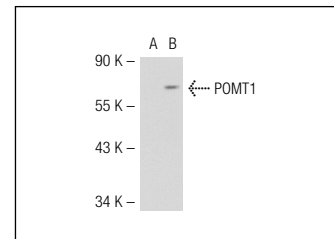
RECOMMENDED SECONDARY REAGENTS

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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) 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.

DATA



POMT1 (K-18): sc-48915. Western blot analysis of POMT1 expression in mouse testes tissue extract.



POMT1 (K-18): sc-48915. Western blot analysis of POMT1 expression in non-transfected: sc-117752 (A) and mouse POMT1 transfected: sc-127367 (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 or our catalog for detailed protocols and support products.

MONOS
Satisfaction
Guaranteed

Try **POMT1 (G-10): sc-390451**, our highly recommended monoclonal alternative to POMT1 (K-18).