SANTA CRUZ BIOTECHNOLOGY, INC.

VPS18 (I-13): sc-104756



BACKGROUND

Vacuolar sorting proteins (VPSs) are required for proper trafficking of endocytic and biosynthetic proteins to the vacuole and play an important role in the budding process of cells. VPS18 (vacuolar protein sorting 18), also known as PEP3 or hVPS18, is a 973 amino acid peripheral membrane protein that localizes to late endosomes and belongs to the VPS family. Expressed ubiquitously with highest expression in heart and lowest expression in lung, VPS18 is thought to play a role in membrane docking reactions of late endosomes and may also function in vesicle-mediated protein trafficking to lysosomal compartments. VPS18 contains one clathrin repeat and one RING-type zinc-finger and exists in a large hetero-oligomeric complex with other VPS proteins, including VPS11 and VPS16. Two isoforms of VPS18 exist due to alternative splicing events.

CHROMOSOMAL LOCATION

Genetic locus: VPS18 (human) mapping to 15q15.1; Vps18 (mouse) mapping to 2 E5.

SOURCE

VPS18 (I-13) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the N-terminus of VPS18 of human origin.

PRODUCT

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

Blocking peptide available for competition studies, sc-104756 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

Store at 4° C, **D0 NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

APPLICATIONS

VPS18 (I-13) is recommended for detection of VPS18 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g 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).

VPS18 (I-13) is also recommended for detection of VPS18 in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for VPS18 siRNA (h): sc-89965, VPS18 siRNA (m): sc-106696, VPS18 shRNA Plasmid (h): sc-89965-SH, VPS18 shRNA Plasmid (m): sc-106696-SH, VPS18 shRNA (h) Lentiviral Particles: sc-89965-V and VPS18 shRNA (m) Lentiviral Particles: sc-106696-V.

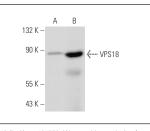
Molecular Weight of VPS18: 110 kDa.

Positive Controls: RAW 264.7 whole cell lysate: sc-2211, mouse brain extract: sc-2253 or mouse heart extract: sc-2254.

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



VPS18 (I-13): sc-104756. Western blot analysis of VPS18 expression in mouse brain (A) and mouse heart (B) tissue extracts.

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.

