

ZFYVE28 (S-15): sc-241142

BACKGROUND

Zinc-finger proteins contain DNA-binding domains and have a wide variety of functions, most of which encompass some form of transcriptional activation or repression. ZFYVE28 (zinc finger FYVE domain-containing protein 28), also known as LST2 (lateral signaling target protein 2 homolog), is an 887 amino acid protein that contains one FYVE-type zinc finger, which mediates the interaction with PI3P (phosphatidylinositol 3-phosphate). ZFYVE28 functions as a negative regulator of EGFR (epidermal growth factor receptor) by promoting its degradation in endosomes when not monoubiquitinated on Lys 87. In the absence of monoubiquitination, ZFYVE28 localizes to the early endosome membrane, while it localizes to the cytosol when it is monoubiquitinated. There are five isoforms of ZFYVE28 that are produced as a result of alternative splicing events.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: ZFYVE28 (human) mapping to 4p16.3; Zfyve28 (mouse) mapping to 5 B2.

SOURCE

ZFYVE28 (S-15) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the C-terminus of ZFYVE28 of human origin.

STORAGE

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

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-241142 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

ZFYVE28 (S-15) is recommended for detection of ZFYVE28 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) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000); non cross-reactive with other ZFYVE family members.

ZFYVE28 (S-15) is also recommended for detection of ZFYVE28 in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for ZFYVE28 siRNA (h): sc-89030, ZFYVE28 siRNA (m): sc-155607, ZFYVE28 shRNA Plasmid (h): sc-89030-SH, ZFYVE28 shRNA Plasmid (m): sc-155607-SH, ZFYVE28 shRNA (h) Lentiviral Particles: sc-89030-V and ZFYVE28 shRNA (m) Lentiviral Particles: sc-155607-V.

Molecular Weight of ZFYVE28 isoforms 1-5: 96/93/88/85/83 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.

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.