

SLC35A3 (V-14): sc-163382

BACKGROUND

SLC35A3 (solute carrier family 35 (UDP-N-acetylglucosamine (UDP-GlcNAc) transporter), member A3) is a 325 amino acid multi-pass membrane protein that belongs to the SLC35A subfamily of the nucleotide-sugar transporter (NST) family. Members of the NST family are transmembrane proteins that mediate the translocation of nucleotide-sugars from the cytosol to the inter- or lumen of the endoplasmic reticulum (ER) and the Golgi apparatus via an antiport mechanism, exchanging nucleoside monophosphates for nucleotide-sugars. This activity of NSTs is important for providing an available source of nucleotide-sugars for glycoconjugate synthesis. Localizing to the Golgi apparatus membrane, SLC35A3 functions as a monospecific UDP-GlcNAc transporter. In cattle, mutations in the gene encoding SLC35A3 can result in complex vertebral malformation (CMV), a lethal disorder that is defined by fused and misshapen vertebrae near the cervico-thoracic junction.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: SLC35A3 (human) mapping to 1p21.2; Slc35a3 (mouse) mapping to 3 G1.

SOURCE

SLC35A3 (V-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of SLC35A3 of human origin.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

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-163382 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

SLC35A3 (V-14) is recommended for detection of SLC35A3 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 SLC35A family members.

SLC35A3 (V-14) is also recommended for detection of SLC35A3 in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for SLC35A3 siRNA (h): sc-88392, SLC35A3 siRNA (m): sc-153529, SLC35A3 shRNA Plasmid (h): sc-88392-SH, SLC35A3 shRNA Plasmid (m): sc-153529-SH, SLC35A3 shRNA (h) Lentiviral Particles: sc-88392-V and SLC35A3 shRNA (m) Lentiviral Particles: sc-153529-V.

Molecular Weight of SLC35A3: 36 kDa.

Positive Controls: MCF7 whole cell lysate: sc-2206.

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.

STORAGE

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

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.