

UST (S-12): sc-132489

BACKGROUND

Sulfotransferase enzymes catalyze the sulfate conjugation of many hormones, neurotransmitters, drugs, and xenobiotic compounds. These enzymes differ in their tissue distributions and substrate specificities, although the gene structure (number and length of exons) is similar among family members. UST (uronyl 2-sulfotransferase), also known as DS2ST or 2OST, is a 406 amino acid member of the sulfotransferase 3 family. Localized to the Golgi apparatus membrane, UST is a sulfotransferase that catalyzes the transfer of sulfate to the 2-position of uronyl residues, such as iduronyl residues in dermatan sulfate and glucuronyl residues of chondroitin sulfate. While UST has high activity with the aforementioned residues, it has no activity with desulfated N-resulfated heparin. UST is a single-pass type II membrane protein.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: UST (human) mapping to 6q25.1; Ust (mouse) mapping to 10 A1.

RESEARCH USE

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

SOURCE

UST (S-12) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of UST of human origin.

PRODUCT

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

Blocking peptide available for competition studies, sc-132489 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

UST (S-12) is recommended for detection of UST 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 UST6.

UST (S-12) is also recommended for detection of UST in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for UST siRNA (h): sc-95159, UST siRNA (m): sc-154949, UST shRNA Plasmid (h): sc-95159-SH, UST shRNA Plasmid (m): sc-154949-SH, UST shRNA (h) Lentiviral Particles: sc-95159-V and UST shRNA (m) Lentiviral Particles: sc-154949-V.

Molecular Weight of UST: 48 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.

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.