

# CHST1 antibody - N-terminal region

Rabbit Polyclonal Antibody Catalog # AI12583

#### **Product Information**

Application WB, IHC Primary Accession 043916

Other Accession NM 003654, NP 003645

**Reactivity** Human, Mouse, Rat, Rabbit, Pig, Dog, Guinea Pig, Bovine

**Predicted** Human, Mouse, Rat, Rabbit, Dog, Bovine

Host Rabbit
Clonality Polyclonal
Calculated MW 46715

## **Additional Information**

Gene ID 8534

Alias Symbol C6ST, KS6ST, KSGal6ST, KSST, GST-1
Other Names Carbohydrate sulfotransferase 1, 2.8.2.21,

Galactose/N-acetylglucosamine/N-acetylglucosamine 6-O-sulfotransferase 1, GST-1, Keratan sulfate Gal-6 sulfotransferase, KS6ST, KSGal6ST, KSST, CHST1

Format Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium

azide and 2% sucrose.

**Reconstitution & Storage** Add 100 ul of distilled water. Final anti-CHST1 antibody concentration is 1

mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at

20°C. Avoid repeat freeze-thaw cycles.

**Precautions** CHST1 antibody - N-terminal region is for research use only and not for use in

diagnostic or therapeutic procedures.

## **Protein Information**

Name CHST1 ( HGNC:1969)

**Function** Sulfotransferase that utilizes 3'-phospho-5'-adenylyl sulfate (PAPS) as

sulfonate donor to catalyze the transfer of sulfate to position 6 of internal galactose (Gal) residues of keratan. Cooperates with B4GALT4 and B3GNT7 glycosyltransferases and CHST6 sulfotransferase to construct and elongate disulfated disaccharide unit [->3(6- sulfoGalbeta)1->4(6-sulfoGlcNAcbeta)1->] within keratan sulfate polymer (PubMed:10642612, PubMed:17690104, PubMed:9405439). Has a preference for sulfating keratan sulfate, but it also transfers sulfate to the unsulfated polymer (PubMed:9405439). Involved in biosynthesis of phosphacan, a major keratan sulfate proteoglycan in the

developing brain (By similarity). Involved in biosynthesis of 6-sulfoGalbeta-containing O-linked glycans in high endothelial venules of lymph nodes. May act in a synergistic manner with CHST4 to generate sialyl 6',6- disulfo Lewis X motif, a recognition determinant for immune cell receptors implicated in leukocyte trafficking (PubMed:10330415). Catalyzes sulfation of N-acetyllactosamine (LacNAc) oligosaccharides with highest efficiency for sialylated LacNAc structures (PubMed:10642612).

**Cellular Location** Golgi apparatus membrane; Single- pass type II membrane protein

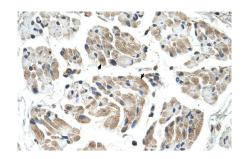
**Tissue Location** Widely expressed at low level. Expressed in brain and skeletal muscle.

Expressed by high endothelial cells (HEVs) and leukocytes.

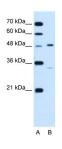
#### References

Yamada, T., Biochem. J. 384 (PT3), 567-575 (2004) Reconstitution and Storage: For short termuse, store at 2-8 Cupto 1 week. For long terms to rage, store at 2-20 Cinsmall aliquots to prevent freeze-thaw cycles.

# **Images**



Human Muscle



WB Suggested Anti-CHST1 Antibody Titration: 1.25 µg/ml Positive Control: Jurkat cell lysate

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.