SANTA CRUZ BIOTECHNOLOGY, INC.

LASS6 (Q-13): sc-65127



BACKGROUND

The LASS (longevity assurance homolog) family members are highly conserved from yeasts to mammals. Six members of this family of proteins have been characterized (LASS1, LASS2, LASS3, LASS4, LASS5 and LASS6) and they all are involved in sphingolipid synthesis. LASS6 is a widely expressed 384 amino acid endoplasmic reticulum, multi-pass membrane protein. On the luminal side of the endoplasmic reticulum membrane, the N-terminal asparagine residue is glycosylated. In cells deficient for CLN9, LASS6 corrects growth and apoptosis, and increases the levels of short ceramide species, such as C14:0- and C16:0-ceramides.

REFERENCES

- Weinmann, A., Galle, P.R. and Teufel, A. 2005. LASS6, an additional member of the longevity assurance gene family. Int. J. Mol. Med. 16: 905-910.
- Mizutani, Y., Kihara, A. and Igarashi, Y. 2005. Mammalian LASS6 and its related family members regulate synthesis of specific ceramides. Biochem. J. 390: 263-271.
- Schulz, A., Mousallem, T., Venkataramani, M., Persaud-Sawin, D.A., Zucker, A., Luberto, C., Bielawska, A., Bielawski, J., Holthuis, J.C., Jazwinski, S.M., Kozhaya, L., Dbaibo, G.S. and Boustany, R.M. 2006. The CLN9 protein, a regulator of dihydroceramide synthase. J. Biol. Chem. 281: 2784-2794.
- Mizutani, Y., Kihara, A. and Igarashi, Y. 2006. LASS3 (longevity assurance homologue 3) is a mainly testis-specific (dihydro)ceramide synthase with relatively broad substrate specificity. Biochem. J. 398: 531-538.

CHROMOSOMAL LOCATION

Genetic locus: CERS6 (human) mapping to 2q24.3; Lass6 (mouse) mapping to 2 C2.

SOURCE

LASS6 (Q-13) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of LASS6 of human origin.

PRODUCT

Each vial contains 200 μ g lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin. Also available as TransCruz reagent for Gel Supershift and ChIP applications, sc-65127 X, 200 μ g/0.1 ml.

Blocking peptide available for competition studies, sc-65127 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.

PROTOCOLS

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

APPLICATIONS

LASS6 (0-13) is recommended for detection of LASS6 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).

LASS6 (Q-13) is also recommended for detection of LASS6 in additional species, including equine, bovine, porcine and avian.

Suitable for use as control antibody for LASS6 siRNA (h): sc-62553, LASS6 siRNA (m): sc-62554, LASS6 shRNA Plasmid (h): sc-62553-SH, LASS6 shRNA Plasmid (m): sc-62554-SH, LASS6 shRNA (h) Lentiviral Particles: sc-62553-V and LASS6 shRNA (m) Lentiviral Particles: sc-62554-V.

LASS6 (Q-13) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

Molecular Weight of LASS6: 45 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) Immunofluo-rescence: 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.



Try LASS6 (L-18): sc-100554, our highly recommended monoclonal alternative to LASS6 (Q-13).