10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

Anti-HSN1 Antibody
Rabbit polyclonal antibody to HSN1
Catalog # AP60688

Specification

Anti-HSN1 Antibody - Product Information

Application	**WB**
Primary Accession	O15269
Other Accession	O35704
Reactivity	**Human, Mouse, Rat, Bovine**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**52744**

Anti-HSN1 Antibody - Additional Information

Gene ID 10558

Other Names
LCB1; Serine palmitoyltransferase 1; Long chain base biosynthesis protein 1; LCB 1; Serine-palmitoyl-CoA transferase 1; SPT 1; SPT1

Target/Specificity
Recognizes endogenous levels of HSN1 protein.

Dilution
WB~~WB (1/500 - 1/1000)

Format
Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.09% (W/V) sodium azide.

Storage
Store at -20 °C.Stable for 12 months from date of receipt

Anti-HSN1 Antibody - Protein Information

Name SPTLC1

Synonyms LCB1

Function
Component of the serine palmitoyltransferase multisubunit enzyme (SPT) that catalyzes the initial and rate-limiting step in sphingolipid biosynthesis by condensing L-serine and activated acyl-CoA (most commonly palmitoyl-CoA) to form long-chain bases. The SPT complex is also composed of SPTLC2 or SPTLC3 and SPTSSA or SPTSSB. Within this complex, the heterodimer with SPTLC2 or SPTLC3 forms the catalytic core (PubMed:19416851, PubMed:<a href="http://www.uniprot.org/citations/36170811"

target="_blank">36170811, PubMed:33558762). The composition of the serine palmitoyltransferase (SPT) complex determines the substrate preference (PubMed:19416851, PubMed:33558762). The SPTLC1-SPTLC2-SPTSSA complex shows a strong preference for C16-CoA substrate, while the SPTLC1-SPTLC3-SPTSSA isozyme uses both C14-CoA and C16-CoA as substrates, with a slight preference for C14-CoA (PubMed:19648650, PubMed:19416851). The SPTLC1-SPTLC2-SPTSSB complex shows a strong preference for C18-CoA substrate, while the SPTLC1-SPTLC3-SPTSSB isozyme displays an ability to use a broader range of acyl-CoAs, without apparent preference (PubMed:19648650, PubMed:19416851, PubMed:33558761, PubMed:33558762). Required for adipocyte cell viability and metabolic homeostasis (By similarity).

Cellular Location
Endoplasmic reticulum membrane; Single-pass membrane protein {ECO:0000250|UniProtKB:O35704}

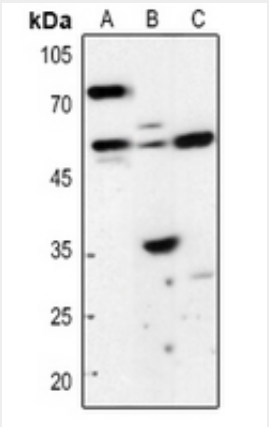
Tissue Location
Widely expressed. Not detected in small intestine.

Anti-HSN1 Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Anti-HSN1 Antibody - Images



10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

Western blot analysis of HSN1 expression in HEK293T (A), rat muscle (B), rat lung (C) whole cell lysates.

Anti-HSN1 Antibody - Background

KLH-conjugated synthetic peptide encompassing a sequence within the C-term region of human HSN1. The exact sequence is proprietary.