

Datasheet for 600-401-EU4**SPT1 Antibody****Overview**

Description:	Anti-SPT1 (RABBIT) Antibody - 600-401-EU4
Item No.:	600-401-EU4
Size:	100 µg
Applications:	ELISA, IHC, WB
Reactivity:	Human
Host Species:	Rabbit

Product Details

Background:	Serine palmitoyltransferase, which consists of two different subunits, is the key enzyme in sphingolipid biosynthesis. It converts L-serine and palmitoyl-CoA to 3-oxosphinganine with pyridoxal 5'-phosphate as a cofactor. SPT1 is the long chain base subunit 1 of mammalian serine palmitoyltransferase. SPT1 is not catalytically active but is necessary for the stabilization of the SPT2 subunit and anchoring the holoenzyme to the cytosolic face of the endoplasmic reticulum. Missense mutations in this gene have been identified in patients with hereditary sensory neuropathy type 1 (HSAN1). These mutations induce a shift in the substrate specificity of the holoenzyme, leading to the formation and accumulation of two neurotoxic sphingolipids.
Synonyms:	SPT1 Antibody, HSN1, LBC1, LCB1, SPT1, SPTI, HSAN1, Serine palmitoyltransferase 1, Long chain base biosynthesis protein 1, LCB 1
Host Species:	Rabbit
Clonality:	Polyclonal
Format:	IgG

Target Details

Gene Name:	SPTLC1
Reactivity:	Human
Immunogen Type:	Conjugated Peptide
Immunogen:	Anti-SPT1 antibody was prepared from whole rabbit serum produced by repeated immunizations with a 17 amino acid synthetic peptide near the C-terminus of human SPT1.

Purity/Specificity: Anti-SPT1 Antibody was affinity purified from monospecific antiserum by immunoaffinity chromatography. At least two isoforms of SPT1 are known to exist; this antibody will detect only isoform a. SPT1 antibody is predicted to not cross-react with SPT2.

Relevant Links:

- [UniProtKB - O15269](#)
- [GeneID - 10558](#)
- [NCBI - NP_001268232.1](#)

Application Details

Tested Applications: ELISA, IHC, WB

Application Note: Anti-SPT1 Antibody has been tested for use in ELISA, Western Blotting, and Immunohistochemistry. Specific conditions for reactivity should be optimized by the end user. Expect a band at approximately 53 kDa in Western Blots of specific cell lysates and tissues.

Assay Dilutions: All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.

ELISA: 1:10,000

IHC: 5 µg/mL

WB: 1 µg/mL

Formulation

Physical State: Liquid (sterile filtered)

Concentration: 1 mg/mL by UV absorbance at 280 nm

Buffer: 0.01 M Sodium Phosphate, 0.25 M Sodium Chloride, pH 7.2

Preservative: 0.02% (w/v) Sodium Azide

Stabilizer: None

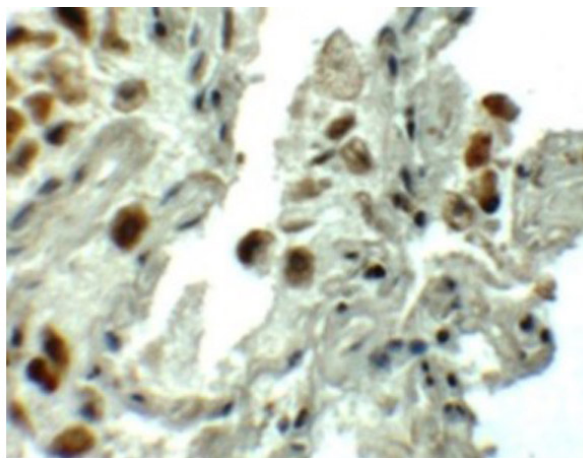
Shipping & Handling

Shipping Condition: Dry Ice

Storage Condition: Store vial at -20° C prior to opening. Aliquot contents and freeze at -20° C or below for extended storage. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. This product is stable for several weeks at 4° C as an undiluted liquid. Dilute only prior to immediate use.

Expiration: Expiration date is one (1) year from date of receipt.

Images

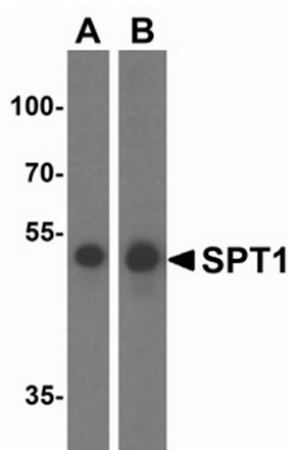


Immunohistochemistry

Immunohistochemistry of SPT1.

Tissue: human lung tissue.

Primary Antibody: SPT1 antibody at 5 µg/mL.



Western Blot

Western blot analysis of SPT1.

Load: (A) A549 and (B) HeLa cell lysate.

Primary Antibody: SPT1 antibody at 1 µg/mL.

Disclaimer

This product is for research use only and is not intended for therapeutic or diagnostic applications. Please contact a technical service representative for more information. All products of animal origin manufactured by Rockland Immunochemicals are derived from starting materials of North American origin. Collection was performed in United States Department of Agriculture (USDA) inspected facilities and all materials have been inspected and certified to be free of disease and suitable for exportation. All properties listed are typical characteristics and are not specifications. All suggestions and data are offered in good faith but without guarantee as conditions and methods of use of our products are beyond our control. All claims must be made within 30 days following the date of delivery. The prospective user must determine the suitability of our materials before adopting them on a commercial scale. Suggested uses of our products are not recommendations to use our products in violation of any patent or as a license under any patent of Rockland Immunochemicals, Inc. If you require a commercial license to use this material and do not have one, then return this material, unopened to: Rockland Inc., P.O. BOX 5199, Limerick, Pennsylvania, USA.