

Datasheet for 600-401-C02**STIM1 Antibody****Overview**

Description:	Anti-STIM1 (RABBIT) Antibody - 600-401-C02
Item No.:	600-401-C02
Size:	100 µg
Applications:	ELISA, IF, IHC, WB
Reactivity:	Human, Mouse, Rat
Host Species:	Rabbit

Product Details

Background:	In T lymphocytes, the sole pathway for Ca ⁺⁺ entry following antigen-receptor binding is through store-operated Ca ⁺⁺ -release-activated Ca ⁺⁺ (CRAC) channels. These channels are made up of the pore-forming subunit ORAI1 and the stromal interaction molecule 1 (STIM1), a protein that functions as a Ca ⁺⁺ sensor and activates the CRAC channels, migrating to the plasma membrane from endoplasmic reticulum (ER)-like sites which act as the Ca ⁺⁺ store. A related molecule, STIM2, acts to inhibit the STIM1-mediated store-operated Ca ⁺⁺ entry, and can form complexes with STIM1, suggesting they may play a coordinated role in controlling Ca ⁺⁺ entry. Anti-STIM1 antibody is ideal for investigators involved in enzyme research.
Synonyms:	STIM1, Stromal interaction molecule 1, GOK
Host Species:	Rabbit
Clonality:	Polyclonal
Format:	IgG

Target Details

Gene Name:	STIM1
Reactivity:	Human, Mouse, Rat
Immunogen Type:	Conjugated Peptide
Immunogen:	STIM1 Antibody was produced from whole rabbit serum prepared by repeated immunizations with a peptide near the c-terminus of human STIM1.

Purity/Specificity: Anti-STIM1 Antibody was affinity purified from monospecific antiserum by immunoaffinity purification. At least two isoforms of human STIM1 protein are known to exist. This affinity purified antibody will detect only the larger of the two isoforms. This STIM1 antibody is predicted to have no cross-reactivity to STIM2. The STIM1 gene is conserved in chimpanzee, dog, cow, mouse, rat, zebrafish, fruit fly, mosquito, and C.elegans. This antibody reacts with STIM1 from human, mouse, and rat sources. Reactivity with STIM1 from other sources has not been determined.

Relevant Links:

- [UniProtKB - Q13586](#)
- [NCBI - NP_003147.2](#)
- [GeneID - 6786](#)

Application Details

Tested Applications:	ELISA, IF, IHC, WB
Application Note:	This A-STIM1 antibody has been tested for use in ELISA, WB, IF, and IHC. Specific conditions for reactivity should be optimized by the end user. Expect a band at ~74 kDa in size corresponding to STIM1 by western blotting in the appropriate cell lysate or extract. Mouse thymus tissue lysate or human spleen tissue lysate can be used as positive control.
Assay Dilutions:	All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.
ELISA:	1:10,000 - 1:40,000
IF:	User Optimized
IHC:	2.5 µg/mL
WB:	1.0 - 2.0 µg/mL

Formulation

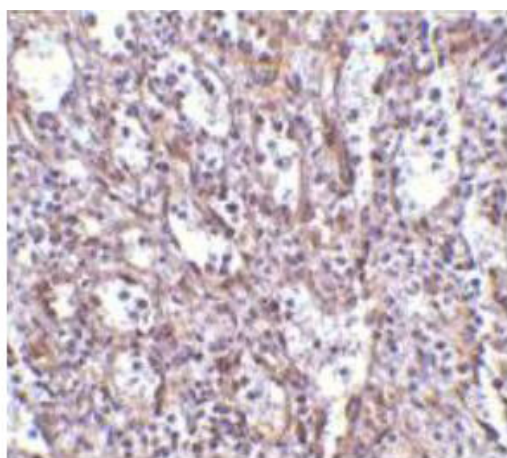
Physical State:	Liquid (sterile filtered)
Concentration:	1.0 mg/mL by UV absorbance at 280 nm
Buffer:	0.02 M Potassium Phosphate, 0.15 M Sodium Chloride, pH 7.2
Preservative:	0.02% (w/v) Sodium Azide
Stabilizer:	None

Shipping & Handling

Shipping Condition: Dry Ice

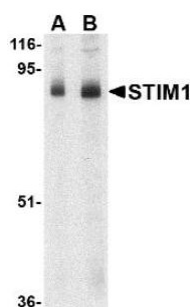
Storage Condition:	Store vial at -20° C prior to opening. Aliquot contents and freeze at -20° C or below for extended storage. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. This product is stable for several weeks at 4° C as an undiluted liquid. Dilute only prior to immediate use.
Expiration:	Expiration date is one (1) year from date of receipt.

Images



Immunohistochemistry

Immunohistochemistry showing detection of STIM1 in human spleen tissue; primary antibody anti-Stim-1 was used at 2.5 µg/mL.



Western Blot

Western blot of STIM1 Antibody. Lane A: mouse thymus tissue lysate STIM1 antibody used at 1.0 µg/mL. Lane B: mouse thymus tissue lysate STIM1 antibody used at 2.0 µg/mL. Load: 35 µg per lane. Primary Antibody: Anti-STIM-1 at designated amounts. Secondary antibody: Peroxidase rabbit secondary antibody at 1:10,000 for 45 min at RT. Block: 5% BLOTTO overnight at 4°C.

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.