

SHMT1 Antibody

Rabbit Polyclonal

Antigen Affinity Purified

Protein ID NP_004160.3

Catalog No. A304-259A

GeneID 6470

Lot No. A304-259A-1



APPLICATIONS	WB, IP, IHC
SPECIES REACTIVITY	Human, Mouse
PRESUMED REACTIVITY	Based on 100% sequence identity, this antibody is predicted to react with Orangutan
AMOUNT	100 µl
CONCENTRATION	1000 µg/ml
STORAGE/SHELF LIFE	2 - 8° C / 1 year from date of receipt
PHYSICAL STATE	Liquid
BUFFER	Tris-citrate/phosphate buffer, pH 7 to 8 containing 0.09% Sodium Azide
ISOTYPE	IgG
ORIGIN	USA
PRODUCTION PROCEDURES	Antibody was affinity purified using an epitope specific to SHMT1 immobilized on solid support.

The epitope recognized by A304-259A maps to a region between residue 453 to 483 of human Serine Hydroxymethyltransferase 1 using the numbering given in entry NP_004160.3 (GeneID 6470).

Antibody concentration was determined by extinction coefficient: absorbance at 280 nm of 1.4 equals 1.0 mg of IgG.

APPLICATIONS Centrifuge tube to remove product from lid. Optimal working dilutions should be determined experimentally by the investigator. Prepare working dilution immediately before use.

Western Blot 1:500 - 1:2,500

Immunoprecipitation 2 - 10 µg/mg lysate

Immunohistochemistry 1:500 - 1:2,000. Epitope retrieval with citrate buffer pH 6.0 is recommended for FFPE tissue sections.

APPLICATION NOTES Western blot of immunoprecipitates performed using Normal Pig Serum (Cat. No. S100-020), Goat anti-Rabbit Light Chain HRP Conjugate (Cat. No. A120-113P) and 4-20% SDS-PAGE (link to IP-western blot protocol in Additional Info section below).

Western blot of lysates performed using standard western blot reagents and 4-20% SDS-PAGE.

IHC HUMAN CONTROLS Breast Carcinoma

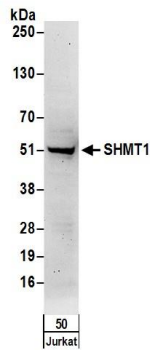
IHC MOUSE CONTROLS Hybridoma Tumor, Teratoma

ADDITIONAL INFO <https://www.bethyl.com/product/A304-259A>

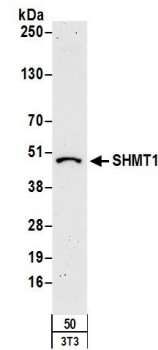
Use the link above to view SDS, a current list of citations, and other product specific information.

IP-western blot protocol: https://www.bethyl.com/content/protocol_IP_WB

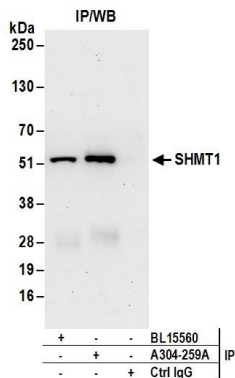
This document certifies that this product has met all of the quality control standards defined by Bethyl Laboratories, Inc.
Eric McIntush, PhD | Chief Scientific Officer Date: June 21, 2019



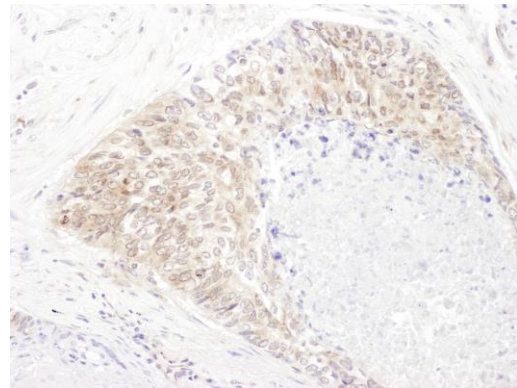
Detection of human SHMT1 by western blot. *Samples:* Whole cell lysate (50 μ g) from Jurkat cells. *Antibodies:* Affinity purified rabbit anti-SHMT1 antibody A304-259A (lot A304-259A-1) used for WB at 1 μ g/ml. *Detection:* Chemiluminescence with an exposure time of 3 minutes.



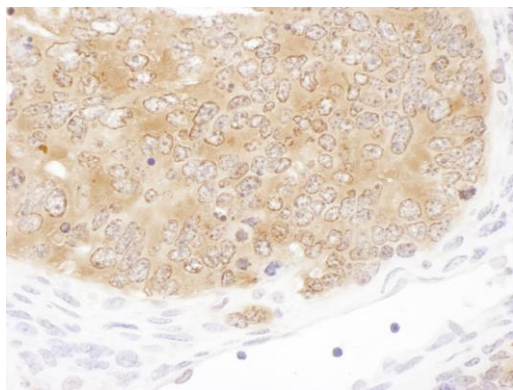
Detection of mouse SHMT1 by western blot. *Samples:* Whole cell lysate (50 μ g) from NIH 3T3 cells. *Antibodies:* Affinity purified rabbit anti-SHMT1 antibody A304-259A (lot A304-259A-1) used for WB at 1 μ g/ml. *Detection:* Chemiluminescence with an exposure time of 3 minutes.



Detection of human SHMT1 by western blot of immunoprecipitates. *Samples:* Whole cell lysate (0.5 or 1.0 mg per IP reaction; 20% of IP loaded) from Jurkat cells. *Antibodies:* Affinity purified rabbit anti-SHMT1 antibody A304-259A (lot A304-259A-1) used for IP at 6 μ g per reaction. SHMT1 was also immunoprecipitated by rabbit anti-SHMT1 antibody BL15560. For blotting immunoprecipitated SHMT1, A304-259A was used at 1 μ g/ml. *Detection:* Chemiluminescence with an exposure time of 30 seconds.



Detection of human SHMT1 by immunohistochemistry. *Sample:* FFPE section of human lung cancer. *Antibody:* Affinity purified rabbit anti-SHMT1 (Cat. No. A304-259A Lot1) used at a dilution of 1:1,000 (1 μ g/ml). *Detection:* DAB



Detection of mouse SHMT1 by immunohistochemistry.
Sample: FFPE section of mouse teratoma. *Antibody:* Affinity purified rabbit anti-SHMT1 (Cat. No. A304-259A Lot1) used at a dilution of 1:1,000 (1 µg/ml). *Detection:* DAB