

Datasheet for 009-001-U19S**TRDMT1 (DNMT2) protein-GST fusion****Overview**

Description:	TRDMT1 (DNMT2) recombinant protein-GST fusion protein - 009-001-U19S
Item No.:	009-001-U19S
Size:	20 µg
Origin:	Human
Expressed in:	Sf9 cells

Product Details

Background:	TRDMT1 is responsible for the methylation of aspartic acid transfer RNA, specifically at the cytosine-38 residue in the anticodon loop. TRDMT1 also possesses residual DNA-(cytosine-C5) methyltransferase activity. While similar in sequence and structure to DNA cytosine methyltransferases, TRDMT1 is distinct and highly conserved in its function among various species. The indirect sequence recognition is also a feature of eukaryotic DNA methyltransferases, which may have arisen from a DNMT2-like RNA methyltransferase (1). DNMT2 is involved in retrotransposon silencing and telomere integrity in somatic cells (2). TRDMT1 Protein is ideal for investigators involved in Signaling Proteins, Acetyl/Methyltransferase Proteins, Apoptosis/Autophagy, Cancer, Cell Cycle, and Neurobiology research.
Synonyms:	DNMT2, DMNT2, PUMET, RNMT1, MHSIIP, tRNA (cytosine(38)-C(5))-methyltransferase, DNA (cytosine-5)-methyltransferase-like protein 2, Dnmt2
Species of Origin:	Human
Expressed in:	Sf9 cells
Type:	Recombinant Protein

Target Details

Gene Name:	TRDMT1
Purity/Specificity:	Recombinant full-length human TRDMT1 (DNMT2) was expressed by baculovirus in Sf9 insect cells using an N-Terminal Glutathione-S-Transferase fusion protein. The purity was determined to be >95% by densitometry.
Relevant Links:	• NCBI - BC047733

Application Details

Application Note:	TRDMT1 Protein is stored in 50mM Tris-HCl, pH 7.5, 50mM NaCl, 10mM glutathione, 0.1mM EDTA, 0.25mM DTT, 0.1mM PMSF, 25% glycerol. TRDMT1 Protein is suitable for use in Western Blot. Expect a band approximately ~67kDa on specific lysates or tissues. Specific conditions for reactivity should be optimized by the end user.
Assay Dilutions:	All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.
WB:	User Optimized

Formulation

Physical State:	Liquid (sterile filtered)
Concentration:	0.1 µg/µL
Buffer:	See application note.

Shipping & Handling

Shipping Condition:	Dry Ice
Storage Condition:	Store product at -70°C. For optimal storage, aliquot target into smaller quantities after centrifugation and store at recommended temperature. For most favorable performance, avoid repeated handling and multiple freeze/thaw cycles.
Expiration:	Expiration date is one (1) year from date of receipt.

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.

