

Datasheet for ABIN3137590

EHMT2 Protein (AA 1-1263) (His tag)[Go to Product page](#)**1** Image

Overview

Quantity:	1 mg
Target:	EHMT2
Protein Characteristics:	AA 1-1263
Origin:	Mouse
Source:	Insect Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This EHMT2 protein is labelled with His tag.
Application:	Crystallization (Crys), ELISA, SDS-PAGE (SDS), Western Blotting (WB)

Product Details

Sequence:	MRGLPRGRGL MRARGRGRAA PTGGRGRGRG GAHRGRGRPR SLLSLPRAQA SWAPQLPAGL TGPPVPCLPS QGEAPAEMGA LLEKEPRGA AERVHSSLGD TPQSEETLPK ANPDSLEPAG PSSPASVTVT VGDEGADTPV GAASLIGDEP ESLEGDGGRI VLGHATKSFP SSPSKGGACP SRAKMSMTGA GKSPPSVQSL AMRLLSMPGA QGAATAGPEP SPATTAAQEG QPKVHRARKT MSKPSNGQPP IPEKRPPEVQ HFRMSDDMHL GKVTSDVAKR RKLNSGSLSE DLGSAGGSGD IILEKGEPRP LEEWETVVDG DFSLYYDAYS VDERVDSDSK SEVEALAEQL SEEEEEEEE EEEEEEEEEE EEEEEDEES GNQSDRSGSS GRRKAKKKWR KDSPWVKPSR KRRKREPPRA KEPRGVNGVG SSGPSEYMEV PLGSLELPSE GTLSPNHAGV SNTDSSLETE RGFEELPLCS CRMEAPKIDR ISERAGHKCM ATESVDGELL GCNAAILKRE TMRPSSRVAL MVLCEAHRAR MVKHHCCPGC GYFCTAGTFL ECHPDFRVAH RFHKACVSQL NGMVFCPHCG EDASEAQEVT IPRGDGGTPP IGTAAPALPP LAHDAPGRAD TSQPSARMRG HGEPRRPPCD PLADTIDSSG PSLTLPNGGC LSAVGLPPGP GREALEKALV IQESERRKKL RFHPRQLYLS VKQGELQKVI
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LMLLDNLDPN FQSDQQSKRT PLHAAAQKGS VEICHVLLQA GANINAVDKQ QRTPLMEAVV
NNHLEVARYM VQLGGCVYSK EEDGSTCLHH AAKIGNLEMV SLLLSTGQVD VNAQDSGGWT
PIIWAAEHKH IDVIRMLLTR GADVTLTDNE ENICLHWASF TGSAAIAEVL LNAQCDLHAV
NYHGDTPLHI AARESYHDCV LLFLSRGANP ELRNKEGDTA WDLTPERSDV WFALQLNRKL
RLGVGNRAVR TEKICRDVA RGYENVIPC VNGVDGEPCP EDYKYISENC ETSTMNIDRN
ITHLQHCTCV DDCSSSNCLC GQLSIRCWYD KDGRLLQEFN KIEPLIFEC NQACSCWRSC
KNRVVQSGIK VRLQLYRTAK MGWGVRLQT IPQGTFIGEY VGELISDAEA DVREDDSYLF
DLDNKDGEVY CIDARYYGNI SRFINHLCDP NIIPVRVFM L HQDLRFPRIA FFSSRDIRTG
EELGFDYGDR FWDIKSKYFT CQCGSEKCKH SAEAIALEQS RLARLDPHPE LLPDLSSLPP INT

Sequence without tag. Tag location is at the discretion of the manufacturer. If you have a special request, please contact us.

Characteristics:

- Made in Germany - from design to production - by highly experienced protein experts.
- Mouse Ehmt2 Protein (raised in Insect Cells) purified by multi-step, protein-specific process to ensure crystallization grade.
- State-of-the-art algorithm used for plasmid design (Gene synthesis).

This protein is a made to order protein and will be made for the first time for your order. Our experts in the lab will ensure that you receive a correctly folded protein.

The big advantage of ordering our made-to-order proteins in comparison to ordering custom made proteins from other companies is that there is no financial obligation in case the protein cannot be expressed or purified.

In the unlikely event that the protein cannot be expressed or purified we do not charge anything (other companies might charge you for any performed steps in the expression process for custom-made proteins, e.g. fees might apply for the expression plasmid, the first expression experiments or purification optimization).

When you order this made-to-order protein you will only pay upon receipt of the correctly folded protein. With no financial risk on your end you can rest assured that our experienced protein experts will do everything to make sure that you receive the protein you ordered.

The concentration of our recombinant proteins is measured using the absorbance at 280nm.

The protein's absorbance will be measured in several dilutions and is measured against its specific reference buffer.

The concentration of the protein is calculated using its specific absorption coefficient. We use the Expasy's protparam tool to determine the absorption coefficient of each protein.

Purification:

Two step purification of proteins expressed in baculovirus infected SF9 insect cells:

1. In a first purification step, the protein is purified from the cleared cell lysate using three different His-tag capture materials: high yield, EDTA resistant, or DTT resistant. Eluate

Product Details

fractions are analyzed by SDS-PAGE.

2. Protein containing fractions of the best purification are subjected to second purification step through size exclusion chromatography. Eluate fractions are analyzed by SDS-PAGE and Western blot.

Purity: >95 % as determined by SDS PAGE, Size Exclusion Chromatography and Western Blot.

Sterility: 0.22 µm filtered

Endotoxin Level: Protein is endotoxin free.

Grade: Crystallography grade

Target Details

Target: EHMT2

Alternative Name: Ehmt2 ([EHMT2 Products](#))

Background: Histone methyltransferase that specifically mono- and dimethylates 'Lys-9' of histone H3 (H3K9me1 and H3K9me2, respectively) in euchromatin. H3K9me represents a specific tag for epigenetic transcriptional repression by recruiting HP1 proteins to methylated histones. Also mediates monomethylation of 'Lys-56' of histone H3 (H3K56me1) in G1 phase, leading to promote interaction between histone H3 and PCNA and regulating DNA replication. Also weakly methylates 'Lys-27' of histone H3 (H3K27me). Also required for DNA methylation, the histone methyltransferase activity is not required for DNA methylation, suggesting that these 2 activities function independently. Probably targeted to histone H3 by different DNA-binding proteins like E2F6, MGA, MAX and/or DP1. May also methylate histone H1. In addition to the histone methyltransferase activity, also methylates non-histone proteins: mediates dimethylation of 'Lys-373' of p53/TP53. Also methylates CDYL, WIZ, ACIN1, DNMT1, HDAC1, ERCC6, KLF12 and itself. {ECO:0000269|PubMed:12130538, ECO:0000269|PubMed:15774718, ECO:0000269|PubMed:18818694, ECO:0000269|PubMed:22387026}.

Molecular Weight: 139.0 kDa Including tag.

UniProt: [Q9Z148](#)

Application Details

Application Notes: In addition to the applications listed above we expect the protein to work for functional studies as well. As the protein has not been tested for functional studies yet we cannot offer a guarantee though.

Application Details

Comment: Protein has not been tested for activity yet. In cases in which it is highly likely that the recombinant protein with the default tag will be insoluble our protein lab may suggest a higher molecular weight tag (e.g. GST-tag) instead to increase solubility. We will discuss all possible options with you in detail to assure that you receive your protein of interest.

Restrictions: For Research Use only

Handling

Format: Liquid

Buffer: 100 mM NaCl, 20 mM Hepes, 10% glycerol. pH value is at the discretion of the manufacturer.

Handling Advice: Avoid repeated freeze-thaw cycles.

Storage: -80 °C

Storage Comment: Store at -80°C.

Expiry Date: Unlimited (if stored properly)

Images



Image 1. „Crystallography Grade“ protein due to multi-step, protein-specific purification process