



Anti-EHMT2 monoclonal antibody, clone FQS5129(3) (DCABH-2914)

This product is for research use only and is not intended for diagnostic use.

PRODUCT INFORMATION

Product Overview	Rabbit monoclonal to KMT1C / G9a
Antigen Description	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.
Immunogen	Synthetic peptide (the amino acid sequence is considered to be commercially sensitive) (N terminal)
Isotype	IgG
Source/Host	Rabbit
Species Reactivity	Human
Clone	FQS5129(3)
Conjugate	Unconjugated
Applications	WB, IHC-P

Positive Control	HepG2, 293T and HeLa cell lysates; Human carcinoma of thyroid gland tissue.
Format	Liquid
Size	100 µl
Buffer	pH: 7.40; Preservative: 0.01% Sodium azide; Constituents: 50% Glycerol, 0.05% BSA
Storage	Store at -20°C. Stable for 12 months at -20°C

GENE INFORMATION

Gene Name	EHMT2 euchromatic histone-lysine N-methyltransferase 2 [Homo sapiens]
Official Symbol	EHMT2
Synonyms	EHMT2; euchromatic histone-lysine N-methyltransferase 2; BAT8, C6orf30, chromosome 6 open reading frame 30 , HLA B associated transcript 8; histone-lysine N-methyltransferase EHMT2; Em:AF134726.3; G9A; KMT1C; NG36/G9a; protein G9a; H3-K9-HMTase 3; G9A h
Entrez Gene ID	10919
Protein Refseq	NP_006700
UniProt ID	A2ABF8
Chromosome Location	6p21.3
Pathway	Gene Expression, organism-specific biosystem; Lysine degradation, organism-specific biosystem; Lysine degradation, conserved biosystem; RNA Polymerase I Promoter Clearance, organism-specific biosystem; RNA Polymerase I Transcription, organism-specific biosystem; RNA Polymerase I Transcription Initiation, organism-specific biosystem; RNA Polymerase I, RNA Polymerase III, and Mitochondrial Transcription, organism-specific biosystem;
Function	histone methyltransferase activity (H3-K27 specific); histone methyltransferase activity (H3-K9 specific); metal ion binding; methyltransferase activity; p53 binding; protein binding; protein-lysine N-methyltransferase activity; transferase activity; zinc