

Datasheet for ABIN6943389
anti-EZH2 antibody



[Go to Product page](#)

Overview

Quantity:	50 µg
Target:	EZH2
Reactivity:	Human, Mouse
Host:	Mouse
Clonality:	Monoclonal
Conjugate:	This EZH2 antibody is un-conjugated
Application:	Western Blotting (WB)

Product Details

Immunogen:	Monoclonal antibody raised in mouse against the central part of the human EZH2 protein (Enhancer of zeste homolog 2).
Clone:	1D12
Isotype:	IgG1
Cross-Reactivity:	Human, Mouse
Purification:	Protein G purified polyclonal antibody in PBS containing 0.05% azide.

Target Details

Target:	EZH2
Alternative Name:	EZH2 (EZH2 Products)
Background:	Synonyms: Histone-lysine N-methyltransferase EZH2, EZH2, ENX-1, Enhancer of zeste homolog

Target Details

2, Lysine N-methyltransferase 6, KMT6

Background: Polycomb group (PcG) protein. Catalytic subunit of the PRC2/EED-EZH2 complex, which methylates 'Lys-9' (H3K9me) and 'Lys-27' (H3K27me) of histone H3, leading to transcriptional repression of the affected target gene. Able to mono-, di- and trimethylate 'Lys-27' of histone H3 to form H3K27me1, H3K27me2 and H3K27me3, respectively. Displays a preference for substrates with less methylation, loses activity when progressively more methyl groups are incorporated into H3K27, H3K27me0 > H3K27me1 > H3K27me2 (PubMed:22323599). Compared to EZH1-containing complexes, it is more abundant in embryonic stem cells and plays a major role in forming H3K27me3, which is required for embryonic stem cell identity and proper differentiation. The PRC2/EED-EZH2 complex may also serve as a recruiting platform for DNA methyltransferases, thereby linking two epigenetic repression systems. Genes repressed by the PRC2/EED-EZH2 complex include HOXC8, HOXA9, MYT1, CDKN2A and retinoic acid target genes. EZH2 can also methylate non-histone proteins such as the transcription factor GATA4 and the nuclear receptor RORA. Regulates the circadian clock via histone methylation at the promoter of the circadian genes. Essential for the CRY1/2-mediated repression of the transcriptional activation of PER1/2 by the CLOCK-ARNTL/BMAL1 heterodimer, involved in the di and trimethylation of 'Lys-27' of histone H3 on PER1/2 promoters which is necessary for the CRY1/2 proteins to inhibit transcription.

Gene ID:	2146
UniProt:	Q15910
Pathways:	Retinoic Acid Receptor Signaling Pathway , Regulation of Muscle Cell Differentiation

Application Details

Application Notes:	WB 1:300-5000
Restrictions:	For Research Use only

Handling

Format:	Liquid
Concentration:	1 µg/µL
Buffer:	PBS with 0.05 % sodium azide.
Preservative:	ProClin
Precaution of Use:	This product contains ProClin: a POISONOUS AND HAZARDOUS SUBSTANCE, which should be

Handling

	handled by trained staff only.
Storage:	-20 °C
Storage Comment:	Store at -20°C for 12 months.
Expiry Date:	12 months