



Anti-KDM1A monoclonal antibody, clone FQS7936 (DCABH-2185)

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

PRODUCT INFORMATION

Product Overview	Rabbit monoclonal to KDM1 / LSD1 - Nuclear Envelope Marker
Antigen Description	Histone demethylase that demethylates both Lys-4 (H3K4me) and Lys-9 (H3K9me) of histone H3, thereby acting as a coactivator or a corepressor, depending on the context. Acts by oxidizing the substrate by FAD to generate the corresponding imine that is subsequently hydrolyzed. Acts as a corepressor by mediating demethylation of H3K4me, a specific tag for epigenetic transcriptional activation. Demethylates both mono- (H3K4me1) and di-methylated (H3K4me2) H3K4me. May play a role in the repression of neuronal genes. Alone, it is unable to demethylate H3K4me on nucleosomes and requires the presence of RCOR1/CoREST to achieve such activity. Also acts as a coactivator of androgen receptor (ANDR)-dependent transcription, by being recruited to ANDR target genes and mediating demethylation of H3K9me, a specific tag for epigenetic transcriptional repression. The presence of PRKCB in ANDR-containing complexes, which mediates phosphorylation of Thr-6 of histone H3 (H3T6ph), a specific tag that prevents demethylation H3K4me, prevents H3K4me demethylase activity of KDM1A. Demethylates di-methylated Lys-370 of p53/TP53 which prevents interaction of p53/TP53 with TP53BP1 and represses p53/TP53-mediated transcriptional activation. Demethylates and stabilizes the DNA methylase DNMT1. Required for gastrulation during embryogenesis.
Immunogen	A synthetic peptide corresponding to residues in Human KDM1/ LSD1.
Isotype	IgG
Source/Host	Rabbit
Species Reactivity	Mouse, Rat, Human
Clone	FQS7936
Purity	Tissue culture supernatant
Conjugate	Unconjugated
Applications	WB, IP, IHC-P, ICC/IF
Positive Control	293T, HeLa, Jurkat, PC3, C6, RAW264.7, PC12, and NIH 3T3 cell lysates; Human testis tissue; HeLa cells.

Format	Liquid
Size	100 µl
Buffer	pH: 7.20; Preservative: 0.01% Sodium azide; Constituents: 49% PBS, 50% Glycerol, 0.05% BSA
Storage	Store at -20oC.
Ship	Shipped at 4°C.

GENE INFORMATION

Gene Name	KDM1A lysine (K)-specific demethylase 1A [Homo sapiens]
Official Symbol	KDM1A
Synonyms	KDM1A; lysine (K)-specific demethylase 1A; amine oxidase (flavin containing) domain 2 , AOF2, KDM1, lysine (K) specific demethylase 1; lysine-specific histone demethylase 1A; BHC110; KIAA0601; LSD1; lysine (K)-specific demethylase 1; BRAF35-HDAC complex
Entrez Gene ID	23028
Protein Refseq	NP_001009999
UniProt ID	O60341
Chromosome Location	1p36.12
Pathway	Coregulation of Androgen receptor activity, organism-specific biosystem; Factors involved in megakaryocyte development and platelet production, organism-specific biosystem; Hemostasis, organism-specific biosystem; Notch signaling pathway, organism-specific biosystem; Notch-mediated HES/HEY network, organism-specific biosystem;
Function	MRF binding; androgen receptor binding; chromatin binding; demethylase activity; enzyme binding; flavin adenine dinucleotide binding; histone demethylase activity; histone demethylase activity (H3-K4 specific); histone demethylase activity (H3-K9 specific)