

JMJD4 Antibody (C-term)

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP1030B

Specification

JMJD4 Antibody (C-term) - Product Information

Application	WB, IHC-P,E
Primary Accession	<u>Q9H9V9</u>
Reactivity	Human, Mouse
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	47425
Antigen Region	423-455

JMJD4 Antibody (C-term) - Additional Information

Gene ID 65094

Other Names JmjC domain-containing protein 4, Jumonji domain-containing protein 4, JMJD4

Target/Specificity

This JMJD4 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 423-455 amino acids from the C-terminal region of human JMJD4.

Dilution WB~~1:1000 IHC-P~~1:10~50 E~~Use at an assay dependent concentration.

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation followed by dialysis against PBS.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

JMJD4 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

JMJD4 Antibody (C-term) - Protein Information

Name JMJD4

Function Catalyzes the 2-oxoglutarate and iron-dependent C4-lysyl hydroxylation of ETF1 at



'Lys-63' thereby promoting the translational termination efficiency of ETF1.

Cellular Location Cytoplasm.

JMJD4 Antibody (C-term) - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- <u>Flow Cytomety</u>
- <u>Cell Culture</u>

JMJD4 Antibody (C-term) - Images



Western blot analysis of anti-JMJD4 (C-term) Pab in Hela and mouse kidney cell line lysate. JMJD4 (C-term)(arrow) was detected using the purified Pab.



Formalin-fixed and paraffin-embedded human hepatocarcinoma tissue reacted with JMJD4 (C-term) (Cat.#AP1030b), which was peroxidase-conjugated to the secondary antibody, followed



by DAB staining. This data demonstrates the use of this antibody for immunohistochemistry; clinical relevance has not been evaluated.

JMJD4 Antibody (C-term) - Background

Covalent modification of histones plays critical role in regulating chromatin structure and transcription. While most covalent histone modifications are reversible, only recently has it been established that methyl groups are subject to enzymatic removal from histones. A family of novel JmjC domain-containing histone demethylation (JHDM) enzymes have been identified that perform this specific function. Histone demethylation by JHDM proteins requires cofactors Fe(II) and alpha-ketoglutarate. Family members include JHDM1 (demethylating histone 3 at lysine 36), and JHDM2A as well as JMJD2CH3K9 (both of which demethylate histone 3 at lysine 9). Contributions of histone demethylase activity to tumor development, decreases in cell proliferation, and hormone-dependent transcriptional activation have been observed.

JMJD4 Antibody (C-term) - References

Ota, T., et al., Nat. Genet. 36(1):40-45 (2004).