

# **KDM5B Polyclonal Antibody**

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP58384

# **Specification**

# **KDM5B Polyclonal Antibody - Product Information**

Application WB, IHC-P, IHC-F, IF, E

Primary Accession <u>Q9UGL1</u>

Reactivity Rat, Pig, Dog, Bovine Host Rabbit

Host Rabbit
Clonality Polyclonal
Calculated MW 170 KDa
Physical State Liquid

Immunogen KLH conjugated synthetic peptide derived

laG

from human KDM5B/PLU1/Jarid1B

Epitope Specificity 65-165/1544

Isotype Purity

affinity purified by Protein A

Buffer 0.01M TBS (pH7.4) with 1% BSA, 0.02%

Proclin300 and 50% Glycerol.

SUBCELLULAR LOCATION Nucleus. Ubiquitously expressed, with

highest levels in testis. Down-regulated in melanoma and glioblastoma. Up-regulated

in breast cancer (at protein level).

SIMILARITY Belongs to the JARID1 histone demethylase

family.Contains 1 ARID domain.Contains 1

ImiC domain.Contains 1 ImiN

SUBUNIT domain.Contains 3 PHD-type zinc fingers.
Interacts with FOXG1B, PAX9, MYC, MYCN

and RB1. Interacts with HDAC1, HDAC4,

**HDAC5** and **HDAC7**.

Important Note

This product as supplied is intended for

research use only, not for use in human, therapeutic or diagnostic applications.

# **Background Descriptions**

Histone demethylase that demethylates 'Lys-4' of histone H3, thereby playing a central role in histone code. Does not demethylate histone H3 'Lys-9' or H3 'Lys-27'. Demethylates trimethylated, dimethylated and monomethylated H3 'Lys-4'. Acts as a transcriptional corepressor for FOXG1B and PAX9. Favors the proliferation of breast cancer cells by repressing tumor suppressor genes such as BRCA1 and HOXA5. In contrast, may act as a tumor suppressor for melanoma.

# **KDM5B Polyclonal Antibody - Additional Information**

**Gene ID 10765** 

**Other Names** 

Lysine-specific demethylase 5B, 1.14.11.67, KDM5B, JARID1B, PLU1, RBBP2H1



# Target/Specificity

Ubiquitously expressed, with highest levels in testis. Down-regulated in melanoma and glioblastoma. Up-regulated in breast cancer (at protein level).

### **Dilution**

<span class ="dilution\_WB">WB~~1:1000</span><br \><span class
="dilution\_IHC-P">IHC-P~~N/A</span><br \><span class
="dilution\_IHC-F">IHC-F~~N/A</span><br \><span class
="dilution\_IF">IF~~1:50~200</span><br \><span class ="dilution\_E">E~~N/A</span>

#### **Format**

0.01M TBS(pH7.4), 0.09% (W/V) sodium azide and 50% Glyce

### Storage

Store at -20  $^{\circ}$ C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4  $^{\circ}$ C.

# **KDM5B Polyclonal Antibody - Protein Information**

### Name KDM5B

Synonyms JARID1B, PLU1, RBBP2H1

### **Function**

Histone demethylase that demethylates 'Lys-4' of histone H3, thereby playing a central role in histone code (PubMed:<a href="http://www.uniprot.org/citations/24952722" target="\_blank">24952722</a>, PubMed:<a href="http://www.uniprot.org/citations/27214403" target="\_blank">27214403</a>, PubMed:<a href="http://www.uniprot.org/citations/28262558" target="\_blank">28262558</a>). Does not demethylate histone H3 'Lys-9' or H3 'Lys-27'. Demethylates trimethylated, dimethylated and monomethylated H3 'Lys-4'. Acts as a transcriptional corepressor for FOXG1B and PAX9. Favors the proliferation of breast cancer cells by repressing tumor suppressor genes such as BRCA1 and HOXA5 (PubMed:<a href="http://www.uniprot.org/citations/24952722" target="\_blank">24952722</a>). In contrast, may act as a tumor suppressor for melanoma. Represses the CLOCK-BMAL1 heterodimer-mediated transcriptional activation of the core clock component PER2 (By similarity).

### **Cellular Location**

Nucleus {ECO:0000255|PROSITE-ProRule:PRU00355, ECO:0000255|PROSITE-ProRule:PRU00537, ECO:0000269|PubMed:10336460, ECO:0000269|PubMed:12237901}

# **Tissue Location**

Ubiquitously expressed, with highest levels in testis. Down-regulated in melanoma and glioblastoma. Up-regulated in breast cancer (at protein level).

# **KDM5B Polyclonal Antibody - Protocols**

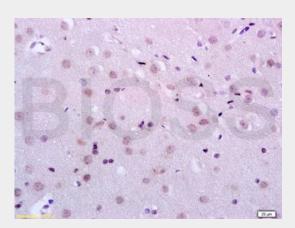
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence



- Immunoprecipitation
- Flow Cytomety
- Cell Culture

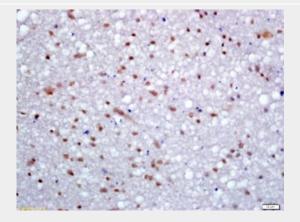
# **KDM5B Polyclonal Antibody - Images**



Tissue/cell: rat brain tissue; 4% Paraformaldehyde-fixed and paraffin-embedded;

Antigen retrieval: citrate buffer ( 0.01M, pH 6.0 ), Boiling bathing for 15min; Block endogenous peroxidase by 3% Hydrogen peroxide for 30min; Blocking buffer (normal goat serum,C-0005) at  $37^{\circ}$ C for 20 min;

Incubation: Anti-KDM5B/PLU1/Jarid1B Polyclonal Antibody, Unconjugated(bs-6139R) 1:200, overnight at 4°C, followed by conjugation to the secondary antibody(SP-0023) and DAB(C-0010) staining

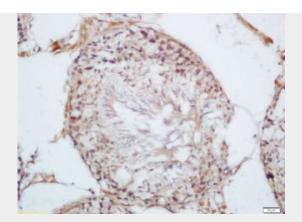


Tissue/cell: Human glioma tissue; 4% Paraformaldehyde-fixed and paraffin-embedded;

Antigen retrieval: citrate buffer ( 0.01M, pH 6.0 ), Boiling bathing for 15min; Block endogenous peroxidase by 3% Hydrogen peroxide for 30min; Blocking buffer (normal goat serum,C-0005) at  $37^{\circ}$ C for 20 min;

Incubation: Anti-KDM5B Polyclonal Antibody, Unconjugated(bs-6139R) 1:200, overnight at 4°C, followed by conjugation to the secondary antibody(SP-0023) and DAB(C-0010) staining

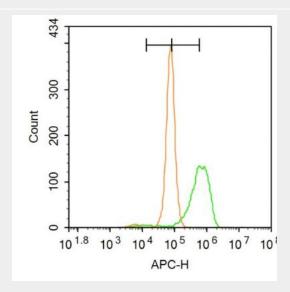




Tissue/cell: rat testis tissue; 4% Paraformaldehyde-fixed and paraffin-embedded;

Antigen retrieval: citrate buffer (0.01M, pH 6.0), Boiling bathing for 15min; Block endogenous peroxidase by 3% Hydrogen peroxide for 30min; Blocking buffer (normal goat serum, C-0005) at 37°C for 20 min;

Incubation: Anti-KDM5B Polyclonal Antibody, Unconjugated(bs-6139R) 1:200, overnight at 4°C, followed by conjugation to the secondary antibody(SP-0023) and DAB(C-0010) staining



Blank control:A431.

Primary Antibody (green line): Rabbit Anti-KDM5B antibody (bs-6139R)

Dilution:  $3 \mu g / 10^6$  cells;

Isotype Control Antibody (orange line): Rabbit IgG . Secondary Antibody : Goat anti-rabbit IgG-AF647

Dilution: 3 µg /test.

Protocol

The cells were fixed with 4% PFA (10min at room temperature) and then permeabilized with 90% ice-cold methanol for 20 min at-20°C. The cells were then incubated in 5%BSA to block non-specific protein-protein interactions for 30 min at at room temperature. Cells stained with Primary Antibody for 30 min at room temperature. The secondary antibody used for 40 min at room temperature. Acquisition of 20,000 events was performed.