

## Product datasheet for **MG223231**

### Kdm5d (NM\_011419) Mouse Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	Kdm5d (NM_011419) Mouse Tagged ORF Clone
Tag:	TurboGFP
Symbol:	Kdm5d
Synonyms:	HY; Jarid1d; Smcy
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)
ORF Nucleotide Sequence:	>MG223231 representing NM_011419 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**CGATCGCC**

ATGAAGCCAGGATCTGACGACTTCTACCGCCGCTGAGTGCCCTGTGTTTGAGCCAGTTGGCGGAAT  
TCCGCGATCCTCTGGCTATATAGCTAAAATCAGACCCATTGCGGAGAAAATCAGGCATTTGCAAGATACG  
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GATTGTGATGGAGGAAGGTGGATATGAAGCAATCTGCAAGGACCGTCGGTGGGCCCGTGTGCCAACGC  
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GCAGACATCTCAGGCATGAAAGTGCCCTGGTTATATGTGGGCATGGTGTTCAGCATTTTGTGGCATA  
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ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

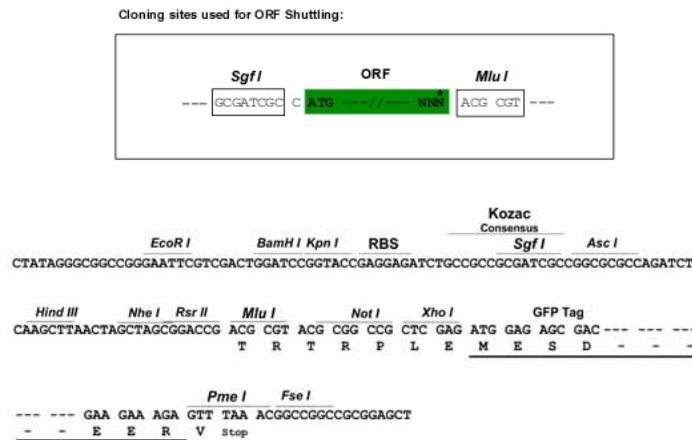
**Protein Sequence:** >MG223231 representing NM\_011419  
 Red=Cloning site Green=Tags(s)

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 RRGRRLQPEPEPTTEEDIEKNPELKKLQIYGAGPKMIGLGLKAKEKTLRKKDSKQPDKEEVTCPATIVVKG  
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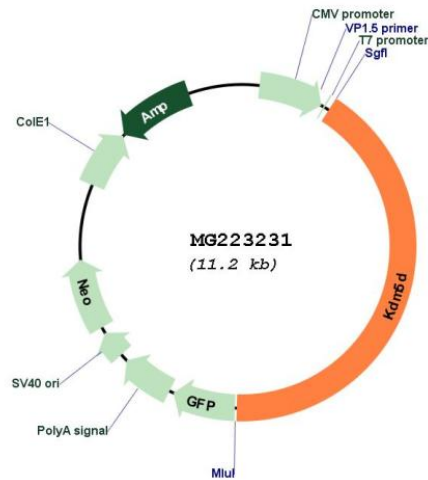
TRTRPLE - GFP Tag - V

**Restriction Sites:** SgfI-MluI

**Cloning Scheme:**



Plasmid Map:



ACCN: NM\_011419

ORF Size: 4644 bp

**OTI Disclaimer:** Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in *E. coli* are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at [custsupport@origene.com](mailto:custsupport@origene.com) or by calling 301.340.3188 option 3 for pricing and delivery.

The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. [More info](#)

**OTI Annotation:** This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

**Components:** The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

**Reconstitution Method:**

1. Centrifuge at 5,000xg for 5min.
2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.

**RefSeq:** [NM\\_011419.3](#), [NP\\_035549.1](#)

**RefSeq Size:** 5471 bp

**RefSeq ORF:** 4647 bp

**Locus ID:** 20592

**UniProt ID:** [Q62240](#)

**Cytogenetics:** Ypter

**Gene Summary:** Histone demethylase that specifically demethylates 'Lys-4' of histone H3, thereby playing a central role in histone code. Does not demethylate histone H3 'Lys-9', H3 'Lys-27', H3 'Lys-36', H3 'Lys-79' or H4 'Lys-20'. Demethylates trimethylated and dimethylated but not monomethylated H3 'Lys-4'. May play a role in spermatogenesis. Involved in transcriptional repression of diverse metastasis-associated genes; in this function seems to cooperate with ZMYND8. Suppresses prostate cancer cell invasion. Regulates androgen receptor (AR) transcriptional activity by demethylating H3K4me3 active transcription marks (By similarity). [UniProtKB/Swiss-Prot Function]