

Product datasheet for **RC234662**

MBD1 (NM_001204136) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	MBD1 (NM_001204136) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	MBD1
Synonyms:	CXXC3; PCM1; RFT
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)



[View online »](#)

ORF Nucleotide
Sequence:

>RC234662 representing NM_001204136
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGGATCGCC**

ATGGCTGAGGACTGGCTGGACTGCCCGCCCTGGCCCTGGCTGGAAGCGCCGCAAGTCTTTCGCAAGT
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TCAGGGGATGGCACCCAAAGGCAGCGGCTCAAACGTTGTCAAAGACTGTGAGCACAGAGAATTGCCT
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GCCCTACACGAACCGCCGGCAGAACCAGCAAGTGCAGGGCTGTGCAGCCTGCCTACGGCGGATGGACTGT
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AGAGT

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RC234662 representing NM_001204136
Red=Cloning site Green=Tags(s)

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MAEDWLDPCALGPGWKREVFVKSGATCGRSPTYYSPTGDRIRSKVELTRYLGPACDLTLDFDKQGIILC
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ERRRCLRIVERSRGCGVCRGCQTQEDCGHCPICLRPPRPLRRQWKCVQRRCLRGKHARRKGGCDKSKMAA
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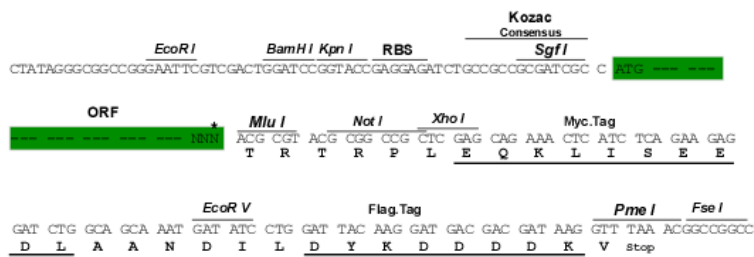
TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Chromatograms: https://cdn.origene.com/chromatograms/ja3208_f10.zip

Restriction Sites: SgfI-MluI

Cloning Scheme:

Cloning sites used for ORF Shuttling:



* The last codon before the Stop codon of the ORF

ACCN: NM_001204136

ORF Size: 1965 bp

OTI Disclaimer: 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_001204136.1](#), [NP_001191065.1](#)

RefSeq Size: 3207 bp

RefSeq ORF: 1968 bp

Locus ID: 4152

UniProt ID: [Q9UIS9](#)

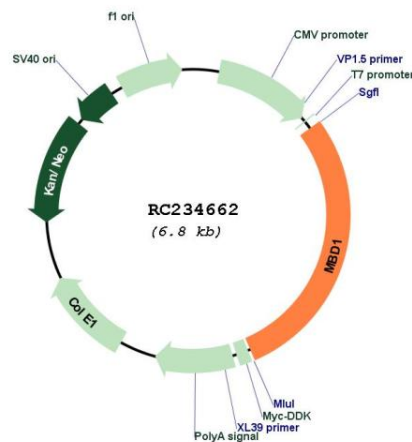
Cytogenetics: 18q21.1

Protein Families: Druggable Genome, Transcription Factors

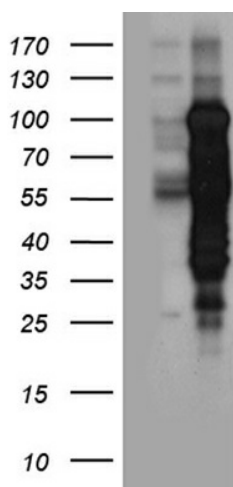
MW: 72.1 kDa

Gene Summary: The protein encoded by this gene is a member of a family of nuclear proteins related by the presence of a methyl-CpG binding domain (MBD). These proteins are capable of binding specifically to methylated DNA, and some members can also repress transcription from methylated gene promoters. This protein contains multiple domains: MBD at the N-terminus that functions both in binding to methylated DNA and in protein interactions; several CXXC-type zinc finger domains that mediate binding to non-methylated CpG dinucleotides; transcriptional repression domain (TRD) at the C-terminus that is involved in transcription repression and in protein interactions. Numerous alternatively spliced transcript variants encoding different isoforms have been noted for this gene.[provided by RefSeq, Feb 2011]

Product images:



Circular map for RC234662



HEK293T cells were transfected with the pCMV6-ENTRY control (Cat# [PS100001], Left lane) or pCMV6-ENTRY MBD1 (Cat# RC234662, Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-MBD1 antibody (Cat# [TA890133]). Positive lysates [LY414370] (100ug) and [LC414370] (20ug) can be purchased separately from OriGene.