

Product datasheet for **RC203680**

EEF1AKMT3 (NM_015433) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Tag:	Myc-DDK
Symbol:	EEF1AKMT3
Synonyms:	FAM119B; METTL21B
Mammalian Cell	Neomycin
Selection:	
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)

ORF Nucleotide Sequence: >RC203680 ORF sequence
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCCGCGATCGCC

ATGGCGGACCCCGGCCAGATCCCGAATCTGAGTCGGAATCGGTGTTCCCGCGGGAGGTCTGGGCTTTTG
CAGACTCTTACTCGGAGAAGAGCCAGTTCTGTTTCTGTGGGCATGTGCTGACCATCACGCAGAACTTTGG
GTCCCGCCTCGGGGTGGCGGCGCGGTGTGGGACGCGGCCCTGAGCCTGTGCAATTATTCGAGAGTCAA
AATGTGGATTTCCGAGGCAAGAAGGTGATCGAAGTGGGTGCGGGGACAGGCATCGTGGGGATCTTGGCAG
CGCTGCAGGGGGGGATGTTACCATCACTGACCTGCCCCCTGGCCCTAGAACAGATCCAGGGCAACGTCCA
GGCCAATGTCCAGCTGGAGGCCAGGCCAGGTGCGTGCCTTGCTCGGGGATTGACCATCATGTCTTC
CCTGCAAACTATGACCTGGTGTGGGGCTGATATCGTGTACCTGGAACCCACCTTCCCTCTGCTGCTGG
GGACCTCCAACACCTGTGCAGGCCCATGGCACCATCTATCTGGCCTCAAGATGAGAAAGGAGCATGG
GACAGAGAGCTTCTTCAGCACCTCTGCCCCAGCATTTCCAAGTGGAGCTGGCTCAGCGGGATGAGGAT
GAAAATGTCAACATCTATAGGCCAGGCACAGGAACCAAGACCTGCT

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCTGGATT
ACAAGGATGACGACGATAAGGTTTAA



Protein Sequence:

>RC203680 protein sequence
 Red=Cloning site Green=Tags(s)

MADPGDPPESESESVFPREVGLFADSYSEKSQFCFCGHVLTITQNFGRSLGVAARVWDAALSLCNFYFESQ
 NVDFRGKKVIELGAGTGIVGILAAALQGGDVTITDLPLALEQIQGNVQANVPAGGQAQVRALSWGIDHHVF
 PANYDLVLGADIVYLEPTFPLLLGTLQHLCRPHGTIYLASKMRKEHGTSFFQHLLPQHFQLELAQRDED
 ENVNIYRARHREPRPA

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

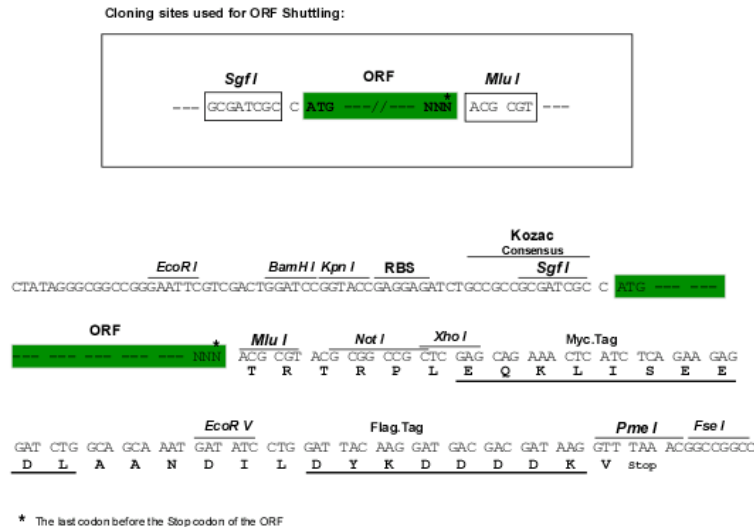
Chromatograms:

https://cdn.origene.com/chromatograms/mk6304_g10.zip

Restriction Sites:

SgfI-MluI

Cloning Scheme:



ACCN:

NM_015433

ORF Size:

678 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:

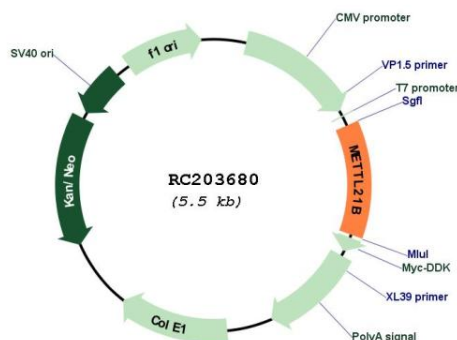
This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

Components:

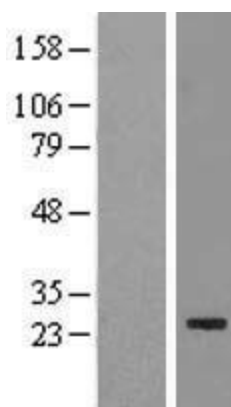
The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

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.
Note:	Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.
RefSeq:	<u>NM_015433.3</u>
RefSeq Size:	2717 bp
RefSeq ORF:	681 bp
Locus ID:	25895
UniProt ID:	<u>Q96AZ1</u>
Cytogenetics:	12q14.1
MW:	24.9 kDa
Gene Summary:	Protein-lysine methyltransferase that selectively methylates EEF1A1 and EEF1A2 at 'Lys-165' in an aminoacyl-tRNA and GTP-dependent manner. EEF1A1 methylation by EEF1AKMT3 is dynamic as well as inducible by stress conditions, such as ER-stress, and plays a regulatory role on mRNA translation.[UniProtKB/Swiss-Prot Function]

Product images:



Circular map for RC203680



Western blot validation of overexpression lysate (Cat# [LY414550]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from un-transfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC203680 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).