

Product datasheet for **RR204477**

Mef2a (NM_001014035) Rat Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Mef2a (NM_001014035) Rat Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	Mef2a
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)



[View online »](#)

ORF Nucleotide Sequence:

>RR204477 representing NM_001014035
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGGATCGCC**

ATGGGGCGAAAGAAAATACAAATTACACGCATAATGGATGAGAGGAACCGACAGGTGACTTTTACAAGC
 GAAAGTTCGGATTGATGAAGAAAGCCTATGAACCTCAGTGTGCTCTGTGACTGTGAGATAGCACTCATCAT
 CTTCAACAGCTCTAACAAGTTGTTTCAGTACGCCAGCACTGACATGGACAAAGTCTTCTCAAGTACACC
 GAGTACAACGAGCCTCATGAAAGCAGGACGAACCTCGGATATTGTGGAGGCTCTGAACAAGAAGGAACACA
 GAGGCTGCGACAGCCAGACCCTGATACTTCATATGTGCTAACTCCACATACAGAAGAAAAATATAAAAA
 AATTAATGAGGAATTTGATAATATGATGCGGAATCATAAAATCGCACCTGGCTTGCCGCCTCAGAACTTC
 TCAATGTCTGTACAGTCCCTGTGACCAGCCCTAATGCTTTGTCGTACACTAACCCAGGGAGTTCACCTCG
 TGTACCCTCTTTGGCAGCCAGCTCAACATTAGCAGAGTCCAGCATGCTGTCTCCACCCCGCCAGCCAGCT
 ACATAGAAATGTGTCTCCAGGAGCTCCGCAGAGACCACCAAGCACTGGCAGTGCAGGTGGGATGTTGAGC
 ACTACAGACCTCACGGTACCAAAATGGAGCTGGAATAGTCTGTGGGGAATGGATTTGTAAACTCAAGGG
 CCTCTCCAAATTTGATTGGAAATACTGGTGCGAATAGTGTAGGCAAAGTCATGCCTACAAAGTCCCCCCC
 GCCACCAGGTGGGGGAGTGTGGAATGAACAGTCGGAACCCAGATCTACGGGTTGTATTCCCCCTTCA
 AGCAAGGGCATGATGCCCCACTTAATGCCAAAGGATAAGTAGTTCTCAAGCCACACAACCTCTTGCCA
 CGCCCGTGGTGTCTGTGACAACCTCAAGCTTGCCTCCGCAGGGACTAGTGTACTCGGCCATGCCGACAGC
 CTACAACACTGATTACTCATTGACCAGCGCTGACCTGTCCGCCCTGCAAGGCTTTACTTCCCCTGGAATG
 CTGGAGGGCAGTTATCTCAGGGTTCAAATTTGTCCATTAACACCAACCAAGCAACATCAACATTAAGTCAGA
 GCCAATTTACCTCCCCGTGATAGAATGACCCCATCAGGCTTCCAGCAGCAGCAGCAGCAGCAGCCACAG
 CAGCAACCACCGCCACAACCTCCACAGCCCGCCCAACCCCGCAGGAAATGGGGCGCTCCCCTGTGG
 ACAGTCTGAGCAGCTCTAGCAGCTCTACGATGGCAGTACCAGGGAGGATCCACGGGGCGACTTCCATTC
 TCCAATTTGCTTGCCGACCTCCAAATGCTGAGGACAGAGAAAGCCCTCTGTAAAACGCATGAGGATG
 GACACATGGGTGACC

**ACGGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
 ACAAGGATGACGACGATAAGGTTTAA**

Protein Sequence:

>RR204477 representing NM_001014035
 Red=Cloning site Green=Tags(s)

MGRKKIQITRIMDERNRQVTFTRKRFGLMKKAYELSVLCDCEIALIIFNSSNKL FQYASTDMDKVLKYT
 EYNPHESTRNSDIVEALNKKEHRGCDSPDPDTSYVLTPHTEEKYKKINEEFDNMMRNHKIAPGLPPQNF
 SMSVTVPVTSNALSYTNPGSSLVSPSLAASSTLAESSMLSPPPATLHRNVSPGAPQRPSTGSAGGMLS
 TTDLTVPNGAGNSPVNGFVNSRASPNLIGNTGANSVGKVMPTKSPPPPGGSGVMNSRKPDRLRVIPPS
 SKGMPPPLNAQRISSSQATQPLATPVVSVTTPSLPPQGLVYSAMPTAYNTDYSLTSADLSALQGFSPGM
 LSLGQASAWQHHLGQAALSSLVAGGQLSQGSNLSINTNQINIKSEPI SPPRDRMTPSGFQQQQQQPQ
 QQQPPQPQPQPQPRQEMGRSPVDSLSSSSSYDGSREDPRGDFHSPIVLGRPPNAEDRESPSVKRMRM
 DTWVT

TRTRPLEQKLI SEEDLAANDILDYKDDDDKV

Restriction Sites:

Sgfl-Mlul

Cloning Scheme:


ACCN: NM_001014035

ORF Size: 1485 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_001014035.1](#), [NP_001014057.1](#)

RefSeq Size: 3237 bp

RefSeq ORF: 1488 bp

Locus ID: 309957

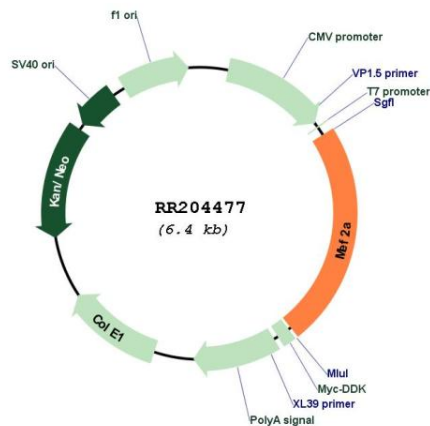
UniProt ID: [Q2MJT0](#)

Cytogenetics: 1q22

MW: 53.3 kDa

Gene Summary: Transcriptional activator which binds specifically to the MEF2 element, 5'-YTA[AT](4)TAR-3', found in numerous muscle-specific genes. Also involved in the activation of numerous growth factor- and stress-induced genes. Mediates cellular functions not only in skeletal and cardiac muscle development, but also in neuronal differentiation and survival. Plays diverse roles in the control of cell growth, survival and apoptosis via p38 MAPK signaling in muscle-specific and/or growth factor-related transcription. In cerebellar granule neurons, phosphorylated and sumoylated MEF2A represses transcription of NUR77 promoting synaptic differentiation. Associates with chromatin to the ZNF16 promoter (By similarity).[UniProtKB/Swiss-Prot Function]

Product images:



Circular map for RR204477