

Product datasheet for **RC239725**

MCM8 (NM_001281521) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	MCM8 (NM_001281521) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	MCM8
Synonyms:	C20orf154; dj967N21.5; POF10
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Cell Selection:	Neomycin



[View online »](#)

ORF Nucleotide Sequence:

>RC239725 representing NM_001281521
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGGATCGCC**

ATGAATGGAGAGTATAGAGGCAGAGGATTTGGACGAGGAAGATTTCAAAGCTGGAAAAGGGGAAGAGGTG
 GTGGGAACCTTCTCAGGAAAATGGAGAGAAAAGAGAACACAGACCTGATCTGAGTAAAACCACAGGAAAACG
 TACTTCTGAACAAACCCACAGTTTTTGTCTTCAACAAAGACCCACAGTCAATGCAGTCAACATTGGAT
 CGATTCATACCATATAAAGGCTGGAAGCTTTATTTCTCTGAAGTTTACAGCGATAGCTCTCCTTTGATTG
 AGAAGATTCAAGCATTGAAAAATTTTTCACAAGGCATATTGATTTGTATGACAAGGATGAAATAGAAAAG
 AAAGGGAAGTATTTTGGTAGATTTTAAAGAACTGACAGAAGGTGGTGAAGTAACTAACTTGATACCAGAT
 ATAGCAACTGAACTAAGAGATGCACCTGAGAAAACCTGGCTTGCATGGGTTTGGCAATACATCAGGTGT
 TAACTAAGGACCTTGAAGGCATGCAGCTGAGTTACAAGCCAGGAAGGATTGTCTAATGATGGAGAAAAC
 AATGGTAAATGTGCCACATATTCATGCAAGGGTGTACAATATGAGCCTTTGACACAGCTCAAGAATGTC
 AGAGCAAATTACTATGAAAAATACATTGCCTAAGAGGGACAGTGGTTCTGTGTCAGTAATAAAGCCTC
 TTTGCACCAAGATGGCTTTTCTTTGTGCTGCATGTGGAGAAATTCAGAGCTTTTCTCTCCAGATGGAAA
 ATACAGCTTCCCACAAAGTGTCTGTGCTGTGTGTCGAGGCAGGTCATTTACTGCTCTCCGACGCTCT
 CCTCTCACAGTTACGATGGACTGGCAGTCAATCAAATCCAGGAATTGATGTCTGATGATCAGAGAGAAG
 CAGGTCGGATTCCACGAACAATAGAATGTGAGCTTGTTCATGATCTTGTGGATAGCTGTGCCCGGAGA
 CACAGTGAATTTACTGGAATTTCAAAGTCTCAAATGCGGAAGAAGGTTCTCGAAATAAGAATGACAAG
 TGTATGTTCTTTTGTATATTGAAGCAAATCTATTAGTAATAGCAAAGGACAGAAAACAAGAGTTCTG
 AGGATGGGTGTAAGCATGGAATTTGATGGAGTCTCACTTAAAGACCTTTATGCCATCCAAGAGTTCA
 AGCTGAAGAAAACCTGTTTAAACTCATTGTCAAATGGAGTCTTGTCTGTGCGCCAGGCTAGAGTACAGT
 GGTGCGATCTCAGCTCACTGCAACCTCCACCTCCAAGTTCAAACAGTTCTCCACCTCAGCCTGCCGAG
 TAGCTGGGACTACAGGCATGCGCCACCAGACCCAGCTACTTTTGTGTTAAAGCAGGTTTGGCATTAGC
 ACTCTTTGGAGGAAGCCAGAAAATACGCAGATGACAAAAACAGAATTCCAATTCGGGGAGACCCCCACATC
 CTTGTTGTTGGAGATCCAGGCCTAGGAAAAAGTCAAATGCTACAGGCAGCGTGAATGTTGCCCCACGTG
 GCGTGTATGTTTGGTAAACACCACGACCCTCTGGTCTGACGGTAACTCTTCAAAGATAGTTCCTC
 TGGAGATTTTGTGTTGGAAGCTGGTGCCTGGTACTTGGTGTCAAGGATTTTGTGGAATCGATGAATTT
 GATAAGATGGGGAATCAACATCAAGCCTTGTGGAAGCCATGGAGCAGCAAAGTATTAGTCTTGCTAAGG
 CTGGTGTGGTTTGTAGCCTTCTGCAAGAACTCCATTATTGCTGCTGCAATCCAGTTGGAGGACATTA
 CAATAAAGCCAAAACAGTTTCTGAGAATTTAAAAATGGGGAGTGCACTACTATCCAGATTTGATTTGGTC
 TTTATCCTGTTAGATACTCCAAATGAGCATCATGATCACTTACTCTCTGAACATGTGATTGCAATAAGAG
 CTGAAAAGCAGAGAACCATTAGCAGTGCCACAGTAGCTCGTATGAATAGTCAAGATTCAAATACTTCCGT
 ACTTGAAGTAGTTTCTGAGAAGCCATTATCAGAAAAGACTAAAGGTGGTTCCTGGAGAAAACAATAGATCCC
 ATCCCCACCAGCTATTGAGAAAGTACATTGGCTATGCTCGGCAGTATGTGTACCAAGGCTATCCACAG
 AAGCTGCTCGAGTCTTCAAGATTTTACCTTGAGCTCCGGAACAGAGCCAGAGGTTAAATAGCTCACC
 AATCACTACCAGGCAGCTGGAATCTTTGATTCGTCTGACAGAGGCACGAGCAAGGTTGGAATTGAGAGAG
 GAAGCAACCAAAAGAAGACGCTGAGGATATAGTGAAATTAAGAAATATAGCATGCTAGGAACTTACTCTG
 ATGAATTTGGGAACCTAGATTTTGGAGCATCCAGCATGGTTCTGGAATGAGCAACAGGTTCAACAGCGAA
 AAGATTTATTTCTGCTCTCAACAACGTTGCTGAAAGAACTTATAATAATATATTTCAATTTCACTCAACT
 CGGCAGATTGCCAAAGAACTAAACATTCAGGTTGCTGATTTTAAAAATTTTATTGGATCACTAAATGACC
 AGGTTACCTCTTAAAAAAGGCCAAAAGTTTACCAGCTTCAAATATG

ACGCGTACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
 ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RC239725 representing NM_001281521
 Red=Cloning site Green=Tags(s)

MNGEYRGRGFGRGRFQSWKRGRGGGNFSGKWREREHDPDLSKTTGKRTSEQTPQFLLSTKTPQSMQSTLD
 RFIPYKGWKL YFSEVYSDSSPLIEKIQAFAKFFTRHIDL YDKDEIERKGSILVDFKELTEGGEVTNLIPD
 IATEL RDAPEKTLACMGLAIHQVLTKDLERHAAELQAQEGLSNDGETMVNVPHIHARVYNYEPLTQLKNV
 RANYYGKYIALRGTVVRVSNIKPLCTKMAFLCAACGEIQSFPLPDGKYSPLTKCPVPVPCGRSFTALRSS
 PLTVTMDWQSIKIQELMSDDQREAGRIPRTIECELVHDLVDSCVPGDVTITGIVKVSNAEEGSRNKNDK
 CMFLLYIEANSISNSKGQKTKSSEDGCKHGMLEFSLKDL YAIQEIQAENL FKLIVKWSLALSPRLEYS
 GAISAHCNLHLPSSNSSPTSACRVAGTTGMRHQTQLLLL VKAGLALALFGGSQKYADDKNRIPIRGDPHI
 LVVGDPLGKSQMLQAACNVAPRGVYVCGNTTTT SGLTVTL SKDSSSGDFALEAGALVLGDQGICGIDEF
 DKMGNQHALL EAMEQQSISLAKAGVVCSLPARTSIIAAANPVGGHYNKAKTVSENLMKMSALLSRFDLV
 FILLDTPNEHHDHLLSEHVIAIRAGKQRTISSATVARMNSQDSNTSVLEVVSEKPLSERLKVVPGETIDP
 IPHQLLRKYIGYARQYVYPRLSTEAAVLQDFYLELRKQSQRNLNSPITTRQLESLIRL TEARARLELRE
 EATKEDAEDIVEIMKYSMLGTYSDEFGNLDFERSQHSGMSNRSTAKRFISALNNVAERTYNNIFQFHQL
 RQIAKELNIQVADFENFIGSLNDQGYLLKKGPKVYQLQTM

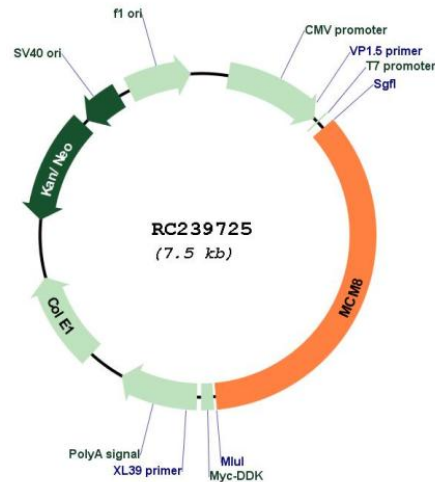
TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Restriction Sites:

Sgfl-MluI

Cloning Scheme:



Plasmid Map:


ACCN: NM_001281521

ORF Size: 2640 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_001281521.1](#), [NP_001268450.1](#)

RefSeq Size: 3835 bp

RefSeq ORF: 2643 bp

Locus ID: 84515

UniProt ID: [Q9UJA3](#)

Cytogenetics: 20p12.3

Protein Families: Transcription Factors

MW: 98.4 kDa

Gene Summary: The protein encoded by this gene is one of the highly conserved mini-chromosome maintenance proteins (MCM) that are essential for the initiation of eukaryotic genome replication. The hexameric protein complex formed by the mini-chromosome maintenance proteins is a key component of the pre-replication complex and may be involved in the formation of replication forks and in the recruitment of other DNA replication related proteins. This protein contains the central domain that is conserved among the mini-chromosome maintenance proteins. The encoded protein may interact with other mini-chromosome maintenance proteins and play a role in DNA replication. This gene may be associated with length of reproductive lifespan and menopause. Alternatively spliced transcript variants encoding distinct isoforms have been described. [provided by RefSeq, Jul 2013]