

## Product datasheet for MR201051

### Calm1 (NM\_009790) Mouse Tagged ORF Clone

#### Product data:

**Product Type:** Expression Plasmids  
**Product Name:** Calm1 (NM\_009790) Mouse Tagged ORF Clone  
**Tag:** Myc-DDK  
**Symbol:** Calm1  
**Synonyms:** AI256814; AI327027; AI461935; AL024000; Calm; CaM; Cam1  
**Mammalian Cell Selection:** Neomycin  
**Vector:** pCMV6-Entry (PS100001)  
**E. coli Selection:** Kanamycin (25 ug/mL)  
**ORF Nucleotide Sequence:** >MR201051 ORF sequence  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGATCGCC**

ATGGCTGATCAGCTGACTGAAGAGCAGATTGCTGAATCAAGGAAGCTTCTCCCTATTCGATAAAGATG  
 GTGACGGCACCATCACACCAAGGAAGTGGGGACCGTCATGCGGTCACTGGGTGAGAACCAACAGAAGC  
 CGAGCTGCAGGATATGATCAACGAAGTGGATGCTGATGGCAATGGCACCATTGACTTCCCAGAGTCTTG  
 ACTATGATGGCTAGAAAAATGAAAGACACAGATAGCGAAGAAGAGATCCGCGAGGCTTCCGAGTGTGG  
 ACAAGGATGGGAATGGTTACATCAGTGGCAGAACTGCGCCACGTCATGACAACTTAGGAGAAAAGCT  
 AACAGATGAAGAAGTAGATGAAATGATCAGAGAAGCAGATATTGATGGCGACGGACAAGTCAACTATGAA  
 GAATTCGTACAGATGATGACTGCAAAA

**ACGCGT**ACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT  
 ACAAGGATGACGACGATAAGGTTTAA

**Protein Sequence:** >MR201051 protein sequence  
 Red=Cloning site Green=Tags(s)

MADQLTEEQIAEFKEAFSLFDKGDGTITTKELGTVMRSLGQNPTEAELQDMINEVDADNGTIDFPEFL  
 TMMARKMKDTSDEEIEAIFRVFDKDGNGYISAAELRHVMTNLGEKLTDEEVDDEMIREADIDGQGQVNYE  
 EFVQMMTAK

**TR**TRPLEQKLISEEDLAANDILDYKDDDDKV

**Restriction Sites:** SgfI-MluI



**Cloning Scheme:**


**ACCN:** NM\_009790

**ORF Size:** 450 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\\_009790.5](#)

**RefSeq Size:** 4001 bp

**RefSeq ORF:** 450 bp

**Locus ID:** 12313

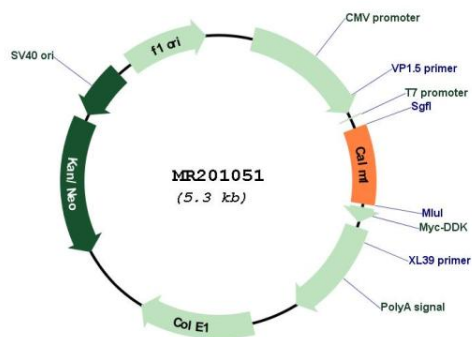
**UniProt ID:** [P0DP26](#)

**Cytogenetics:** 12 E

**MW:** 16.8 kDa

**Gene Summary:** This gene encodes a member of the EF-hand calcium-binding protein family. The encoded protein acts as a calcium sensor and is involved in relaying signals to calcium-sensitive proteins, enzymes and ion channels. The protein-calcium complex binds target proteins to regulate several cellular processes, including smooth muscle contraction, inflammation, apoptosis and the immune response. Mutations in the human gene are associated with catecholaminergic polymorphic ventricular tachycardia and long QT syndrome 14. Alternative splicing results in multiple transcript variants encoding different isoforms. [provided by RefSeq, Sep 2015]

**Product images:**



Circular map for MR201051