

## Product datasheet for MR201393

### Grem2 (NM\_011825) Mouse Tagged ORF Clone

#### Product data:

**Product Type:** Expression Plasmids  
**Product Name:** Grem2 (NM\_011825) Mouse Tagged ORF Clone  
**Tag:** Myc-DDK  
**Symbol:** Grem2  
**Synonyms:** Gremlin2; Prdc  
**Mammalian Cell Selection:** Neomycin  
**Vector:** pCMV6-Entry (PS100001)  
**E. coli Selection:** Kanamycin (25 ug/mL)  
**ORF Nucleotide Sequence:** >MR201393 ORF sequence  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGATCGCC**

ATGTTCTGGAAGCTCTCGCTGACCTTGCTCCTGGTGGCTGTGCTGGTAAAGGTAGCTGAAACACGGAAGA  
 ACCGGCCTGCGGGCGCCATCCCCTCGCCTTACAAGGATGGTAGCAGCAACAACCTCAGAGAGGTGGCATCA  
 CCAGATCAAGGAGGTGCTGGCCTCCAGCCAGGAGGCCCTGGTAGTCACCGAGCGCAAGTACCTCAAGAGT  
 GACTGGTGAAGACGCAGCCTCTCGGGCAGACAGTGAGCGAGGAGGGTTGCCGACGCCGACCATCTCA  
 ACCGCTTCTGCTACGGCCAGTGAACCTCTTCTACATCCCAGCACAGTGAAGAAGGAGGAGGACTCCTT  
 CCAATCCTGCGCTTTCTGCAAGCCCAGCGTGTACCTCTGTATCGTAGAGCTCGAATGCCCGGTCTC  
 GACCCACCTTTCCGAATCAAGAAAATCCAGAAGGTGAAGCATTGCCGGTGCATGTCAGTGAACCTGAGTG  
 ACTCCGACAAGCAG

**ACGCGT**ACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT  
 ACAAGGATGACGACGATAAGGTTTAA

**Protein Sequence:** >MR201393 protein sequence  
 Red=Cloning site Green=Tags(s)

MFWKLSL TLLL VAVL VKVAETRKNRPAGAI PPSYKDGSSNNSERWHHQI KEVLASSQEAL VVTERKYLKS  
 DWCKTQPLRQTVSEEGCRSRTILNRF CYQCNSFYIPRHVKKEEDSFQSCAFCKPQRVTSVIVELECPGL  
 DPPFRIKKIQVKHCRMSVNLSDSDKQ

**TR**TRPLEQKLI SEEDLAANDILDYKDDDDKV

**Restriction Sites:** Sgfl-MluI



**Cloning Scheme:**


**ACCN:** NM\_011825

**ORF Size:** 507 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\\_011825.1](#), [NP\\_035955.1](#)

**RefSeq Size:** 3745 bp

**RefSeq ORF:** 507 bp

**Locus ID:** 23893

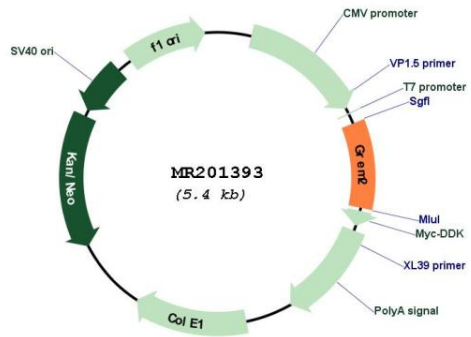
**UniProt ID:** [O88273](#)

**Cytogenetics:** 1 H3

**MW:** 19.3 kDa

**Gene Summary:** Cytokine that inhibits the activity of BMP2 and BMP4 in a dose-dependent manner, and thereby modulates signaling by BMP family members. Contributes to the regulation of embryonic morphogenesis via BMP family members. Antagonizes BMP4-induced suppression of progesterone production in granulosa cells.[UniProtKB/Swiss-Prot Function]

**Product images:**



Circular map for MR201393