

## Product datasheet for **RG226911**

### **POMT1 (NM\_001136113) Human Tagged ORF Clone**

#### **Product data:**

Product Type:	Expression Plasmids
Product Name:	POMT1 (NM_001136113) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	POMT1
Synonyms:	LGMD2K; LGMDR11; MDDGA1; MDDGB1; MDDGC1; RT
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



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ORF Nucleotide  
Sequence:

>RG226911 representing NM\_001136113  
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCCGCGATCGCC

ATGTGGGGATTTTTGAAGCGCCCTGTAGTGGTGACGGCTGACATCAACTTGAGCCTGTGGCCCTGACTG  
GGATGGGGTTACTGAGCCGGCTGTGGCGACTCACCTACCCGCGGCTGTGGTTTTTGACGAAGTATATTA  
TGGGCAGTACATCTTTTTACATGAAACAAATCTTCTTGGATGACAGTGGGCCGCCATTTGGCCAC  
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CATGATATATGAGAACGGCCGAGGCAGCTCCCACCAGCAACAGGTGACCTGTTACCCCTCAAAGACGTC  
AATAACTGGTGGATTGTAAGGATCCCAGGAGGCACAGCTGGTGGTGGCAGCCCTCCGAGACCTGTGA  
GGCAGCGGGACATGGTGCAGTGGTCCAGGCATGACCACCCGCTCCCTGAACACGCATGATGTTGCAGC  
CCCCCTGAGCCCCATTACAGGAGGTCTCCTGCTACATTGACTATAACATCTCCATGCCCGCCAGAAC  
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GCTTTGTGCAGTGAACACTTCCGCTGTCTAAAGCTGAGCGGGGCTCACCTCCCTGACTGGGGGTATCG  
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TCAGGATGCCTGGCTGCGCTGGGTGCTGGCTGGGGCGCTGTGTGCCGGTGGCTGGGCAGTGAACCTC  
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TGCTCCCTGTGGTCTGCAGCACATCAGCGACCACCTGTGCAGGTCCCAGCTCCAGAGGAGCATCTTCAG  
CGCCCTGGTGGTGGCCTGGTACTCCTCCGCGTCCACGTGTCCAACACGCTGCGCCCACTCACCTACGGG  
GACAAGTCACTCTCGCCACATGAACTCAAGGCCCTTCGCTGGAAGACAGCTGGGACATCTTGATCCGAA  
AACAC

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >RG226911 representing NM\_001136113  
 Red=Cloning site Green=Tags(s)

MWGFLKRPVVVTADINLSLVALTGMGLLSRLWRLTYPRAVVFDEVYVYQYISFYMKQIFFLDDSGPPFGH  
 MYLALGGYLGFDGNFLWNRIGAEYSSNPVWSLRLPALAGALSVPMAYQIVLELHFHSHCAAMGAALLM  
 LIENALITQSRMLLESVLIFFNLLAVLSYLFKFNQCQKHSFSLSWFWLTLTGAVACSCAVGIKYMVFVFT  
 YVLVLGVAAVHAWHLLGDQTL SNVCVFCHLLARAVALLVIPVVL YLLFFVYVHLILVFRSGPHDQIMSSAF  
 QASLEGGLARITQGQPLEVAFGSQVTLRNVFVKPVCWLHSHQDTYPMIYENGRGSSHQQVTCYPFKDV  
 NNWWIVKDPRRHQLVVSPPRPVRHGMVQLVHGTTTRSLNTHDVAAPLSPHSQEVSCYIDYINISMPAQN  
 LWRLEIVNRGSDTDVWTKILSEVRFVHVNTSAVLKLSGAHLPDWGYRQLEIVGEKLSRGYHGSTVWNVVEE  
 HRYGASQEQRRERELHSPAQVDVSRNLSFMARFSELQWRMLALRSDSEHKYSSSPLEWVTLDTNIAYW  
 LHPRTSAQIHLLGNIVIWVSGSLALAIYALLSLWYLLRRRRNVHDL PQDAWL RWVLGALCAGGWAVNYL  
 PFFLMKTLFLYHYLPALTFQILLLPVVLQHISDHLCRSQRSLFISALVVAWYSSACHVNTLRPLTYG  
 DKSLSPHELKALRWKDSWDILIRKH

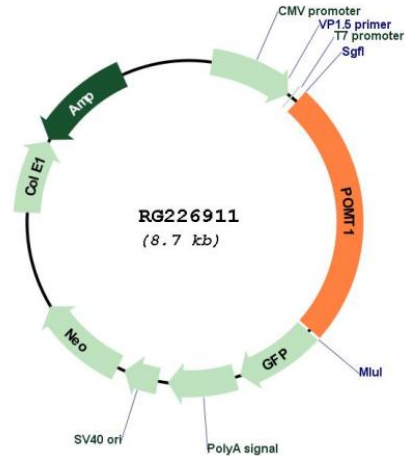
TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI

Cloning Scheme:

Cloning sites used for ORF Shutting:



**Plasmid Map:**


**ACCN:** NM\_001136113

**ORF Size:** 2175 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\\_001136113.1](#), [NP\\_001129585.1](#)

**RefSeq Size:** 3320 bp

**RefSeq ORF:** 2178 bp

**Locus ID:** 10585

UniProt ID: [Q9Y6A1](#)

Cytogenetics: 9q34.13

Protein Families: Transmembrane

Protein Pathways: O-Mannosyl glycan biosynthesis

**Gene Summary:** The protein encoded by this gene is an O-mannosyltransferase that requires interaction with the product of the POMT2 gene for enzymatic function. The encoded protein is found in the membrane of the endoplasmic reticulum. Defects in this gene are a cause of Walker-Warburg syndrome (WWS) and limb-girdle muscular dystrophy type 2K (LGMD2K). Several transcript variants encoding different isoforms have been found for this gene.[provided by RefSeq, Oct 2008]