

## Product datasheet for **MG207155**

### **Cyp27b1 (NM\_010009) Mouse Tagged ORF Clone**

#### **Product data:**

Product Type:	Expression Plasmids
Product Name:	Cyp27b1 (NM_010009) Mouse Tagged ORF Clone
Tag:	TurboGFP
Symbol:	Cyp27b1
Synonyms:	Cp2b; Cyp1; Cyp27b; Cyp40; P450c1; Pddr; Vdd1; Vddr; Vddrl; Vdr
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

**ORF Nucleotide Sequence:**

>MG207155 representing NM\_010009  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGCATCGCC**

ATGCGCCGATTCTCTCAGGTGCATGGCGTGCAGGACAGTATGGTCTGGCAGCTTTGGGACAC  
 TTCGCACAGTTTACGTTGCCGACCTACACTTGTGGAGCAGCTCCTGCGACAAGAAAGTCACTGTCCAGA  
 GCGCTGTAGTTTCTCATCATGGGAGAGCACCCTCGCCGCCACCAGCGTCTTGGCGATTGCTAACGGCG  
 GATGGTGAAGAATGGCAGAGGCTCCGAAGTCTTCTGGCCCGCTCCTCCTCCGGCCACAAGCAGCCGCGG  
 GCTATGCTGGAACCTGGACAACGTGGTCCGTGACCTTGTGCGACGACTAAGGCGCCAGCGGGGACGTGG  
 CTCTGGGCTACCCGGCTAGTTCTGGACGTGGCAGGAGAGTTTTACAAATTTGGCCTAGAAAAGTATAGGC  
 GCGGTGCTGCTGGATCGCGCTGGGCTGCCTAGAGGCTGAAGTCCCTCCTGACACAGAAACCTTCATAC  
 ATGCACTGGGCTCAGTGTCTGTGTCTACACTCTTGACCATGGCGATGCCCACTGGTTGCACCACCTTAT  
 ACCTGGACCTGGGCCCGCTCTGCCGAGACTGGGATCAGATGTTTGCCTTTGCCAGAGGCACGTGGAG  
 CTGCGAGAAGGTGAAGCTGCGATGAGGAACCAGGAAAGCCTGAGGAGGATATGCCGTCTGGGCATCACT  
 TAACCCACTTCTTTTTCGGGAAAAGGTGTCTGTCCAGTCCATAGTGGGGAATGTGACAGAGCTACTACT  
 GGCTGGAGTGGACACGGTATCCAATACGCTCTCCTGGACACTCTATGAGCTTTCCCGCACCCCGATGTC  
 CAGACTGCACTCCACTCTGAGATCACAGCTGGGACCCGTGGCTCCTGTGCCACCCCCATGGCACTGCTC  
 TGTCCCAGCTGCCCTGTAAAGGCTGTGATCAAAGAAGTGTGAGATTGACCTGTGGTACCTGGGAA  
 TTCCCCTGTCCCAGACAGAGACATCCGTGTAGGAAACTATGTAATCCCCAAGATACGCTAGTCTCCCTA  
 TGTCACTATGCCACTTCAAGGGACCCACACAGTTTCCAGACCCCACTTTTAAATCCAGCTCGCTGGC  
 TGGGGGAGGGTCCGACCCCCACCCATTTGCATCTTCCCTTCGGCTTTGGCAAACGGAGCTGCATCGG  
 GAGACGCTTGGCAGAGCTTGAAGTACAAATGGCTTTGTCCAGATCTTGACCCATTTTGAAGTGTACCT  
 GAGCCAGGTGCTTCTCTATCAAGCCATGACCCGGACTGTCTGGTCCCTGAGAGGAGCATCAATCTAC  
 AGTTTGTAGATAGA

**ACCGGT**ACGCGGCCGCTCGAG - GFP Tag - GTTTAA

**Protein Sequence:**

>MG207155 representing NM\_010009  
 Red=Cloning site Green=Tags(s)

MRRFSQVHGAARYGPVWSGSFGLRTRVYVADPTLVEQLLRQESHCPERCSFSSWAEHRRRHQRACGLLTA  
 DGEEWQRLRSLAPLLLRPQAAAGYAGTLDNVVRDLVRRLRRQRGRGSLPGLVLDVAGEFYKFGLESIG  
 AVLLGSRLLGCLAEVPPDTETFIAVGSVSVSTLLTMAMPNWLHHLIPGPWARLCRDWDQMF AFAQRHVE  
 LREGAAMRNQKPEEDMPSGHHLTHFLFREKVSQSI VGNVTELLLAGVDTVSNLTSWTL YELSRHPDV  
 QTALHSEITAGTRGSCAHPHGALSQLPLLKAVIKEVLRLYPVVPGNSRV PDRDIRVGNVYIPQDTLVSL  
 CHYATSRDPTQFPDPSFNPARWL GEGTPHPFASLPFGFKRSCIGRRLAELELQMALSQLTHFEVLP  
 EPGALPIKPMTRTVLVPERSINLQFVDR

**TRTRPLE** - GFP Tag - V

**Restriction Sites:**

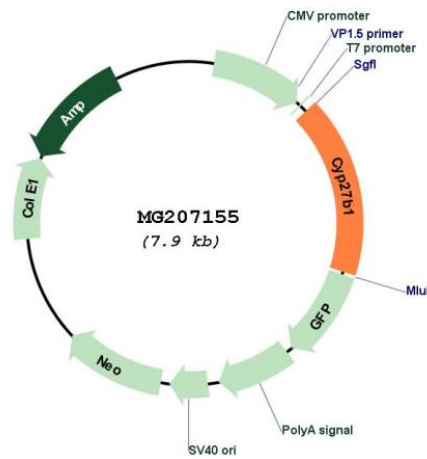
SgfI-MluI

Cloning Scheme:

Cloning sites used for ORF Shutting:



Plasmid Map:



ACCN: NM\_010009

ORF Size: 1344 bp

<b>OTI Disclaimer:</b>	<p>Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in E. coli are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at <a href="mailto:custsupport@origene.com">custsupport@origene.com</a> or by calling 301.340.3188 option 3 for pricing and delivery.</p> <p>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. <a href="#">More info</a></p>
<b>OTI Annotation:</b>	This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.
<b>Components:</b>	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).
<b>Reconstitution Method:</b>	<ol style="list-style-type: none"> <li>1. Centrifuge at 5,000xg for 5min.</li> <li>2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.</li> <li>3. Close the tube and incubate for 10 minutes at room temperature.</li> <li>4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.</li> <li>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.</li> </ol>
<b>RefSeq:</b>	<a href="#">NM_010009.1</a> , <a href="#">NP_034139.1</a>
<b>RefSeq Size:</b>	2475 bp
<b>RefSeq ORF:</b>	1524 bp
<b>Locus ID:</b>	13115
<b>UniProt ID:</b>	<a href="#">O35084</a>
<b>Cytogenetics:</b>	10 D3
<b>Gene Summary:</b>	Catalyzes the conversion of 25-hydroxyvitamin D3 (25(OH)D3) to 1-alpha,25-dihydroxyvitamin D3 (1alpha,25(OH)(2)D3), and of 24,25-dihydroxyvitamin D3 (24,25(OH)(2)D3) to 1-alpha,24,25-trihydroxyvitamin D3 (1alpha,24,25(OH)(3)D3). Is also active with 25-hydroxy-24-oxo-vitamin D3. Plays an important role in normal bone growth, calcium metabolism, and tissue differentiation.[UniProtKB/Swiss-Prot Function]