

## Product datasheet for **RG226726**

### **CPT1C (NM\_001136052) Human Tagged ORF Clone**

#### **Product data:**

Product Type:	Expression Plasmids
Product Name:	CPT1C (NM_001136052) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	CPT1C
Synonyms:	CATL1; CPT1-B; CPT1P; CPTI-B; CPTIC; SPG73
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

**ORF Nucleotide Sequence:**

>RG226726 representing NM\_001136052  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGGATCGCC**

ATGGCTGAAGCGCACCAGGCCGTGGCTTCCGACCCTCGCTGACCTCGGACGGGGCTGAAGTGGAACTCA  
 GTGCCCTGTGCTGCAGGAGATCTACCTCTGGCCTGCGCTCCTGAAAAGGCATCTCTCACGTTTCTG  
 GAATGACTTTCTACCGGTGTGTTTCTGCCAGCCCCCTCAGTTGGCTTTTCTCTTTCAGTGCCATCCAG  
 CTTGCCTGGTTCCAGCTGGATCCTTCTTAGGACTGATGGAGAAGATCAAAGAGTTGCTGCCTGACT  
 GGGGTGGACAACACCACGGGCTCCGGGGGCTCTGGCAGCCGCGCTGTTTGCCTCGTGTGTTGGGGAGC  
 CCTGATCTTACACTGCACGTGGCCCTGAGGCTGCTTCTGTCTACCACGGCTGGCTTCTGAGCCCCAC  
 GGAGCCATGTCTCCCCACCAAGACCTGGCTGGCCCTGGTCCGCATCTTCTGCGCCGCCACCCGATGC  
 TGTTCAAGTACCAGCGCTCCCTGCCACGCCAGCCCGTCCCTCTGTGCAGGACACCGTGCACAAGTACCT  
 GGAGTCGG[AT]CCGGCCATCCTCTCCGACGAGGACTTCGACTGGACCGCGGTCTGGCGCAGGAATTC  
 CTGAGGCTGCAGGCGTCCCTGTGCAGTGGTACCTGCGGCTCAAGTCTGGTGGGCGTCCAATTATGTCA  
 GTGACTGGTGGGAGGAATTTGTGTACCTGCGCTCCCGAAATCCGCTGATGGTGAACAGCAACTATTACAT  
 GATGGCAGCTCGCGCTGGGAATGCCGTCCATGCCCTCCTCTGTACCGCCACCGCCTGAACCGCCAGGAG  
 ATACCCCGACTTTGCTGATGGGAATGCCCCCTTATGCTCTGCCAGTACGAGAAGATCTTCAACACCA  
 CGCGGATTCAGGGGTCCAAAAGACTACATCCGCCACCTCCATGACAGCCAACAGTGGCTGTCTTCCA  
 CCGGGGCCGATTTCTCCGCATGGGGACCACTCCCGAAACAGCCTGCTTCCCGAGAGCCCTGGAGCAG  
 CAGTTTCAGAGAATCTGGATGATCCCTACCGGCCTGCCCCACGAGGAACATCTGGCAGCTCTGACAG  
 CTGCTCCAGGGGCACGTGGGCCAGGTGCGGACATCCCTGAAGACCCAGGCAGCGGAGCCCTGGAGGC  
 GGTGGAAGGGGCCGCTTTCTTTGTGACTGGATGCTGAGCCCGGGGGCTCACCAAGGAGGACCCGGCA  
 CGTCTGTGGATGCCTACGCCATGCTCTGCTGGCCGGCCGGGGCCATGATCGTGGTTTGACAAATCCT  
 TCACCCTAATCGTCTTCTAACGGGAAGCTGGGCCTCAGCGTGGAGCACTCCTGGGCCGACTGCCCCAT  
 CTCAGGACACATGTGGGAGTTCCTCTGGCTACAGAATGCTTTCAGTGGGCTACTCAACAGACGGCCAC  
 TGCAAGGGGCACCCGACCCCACTACCCAGCCCGAGCGGCTGCAATGGGACCTTCCAGACCAGATCC  
 ACTCCTCCATCTCTAGCCCTGAGGGGAGCCAAGATCTTGTCTGAAAATGTCGACTGCCATGTCGTTCC  
 ATTCTCCCTATTTGGCAAGAGCTTCATCCGACGCTGCCACCTCTTTCAGACAGCTTCATCCAGATCGCC  
 TTGCAACTGGCCACTTCCGGGACAGGGGTCAATTCTGCCTGACTTATGAGTCGGCCATGACTCGCTTAT  
 TCCTGGAAGGCCGAGCGGAGACGGTGGCTTTCGACGAGGGAGGCTGCAACTTTGTGAGGGCCATGGA  
 GGACAAAGAGAAGACGGACCCACAGTGCCTCGCCCTGTTCCGCGTGGCAGTGGACAAGCACCAGGCTCTG  
 CTGAAGGCAGCCATGAGCGGGCAGGGAGTTGACCGCCACCTGTTTGGCTGTACATCGTGTCCCATTCC  
 TCCACCTGCAGTCGCCCTTCTGACCCAGGTCCATTCCGAGCAGTGGCAGCTGTCCACCAGCCAGATCCC  
 TGTTTCAGCAAATGCATCTGTTTGACGTCCACAATTACCCGACTATGTTTCTCAGGCGGTGGATTCCGGG  
 CCTGCTGATGACCATGGTTATGGTGTCTTATATCTTTCATGGGGATGGCATGATCACCTTCCACATCT  
 CCAGCAAAAAATCAAGCAGAAAAACGGATTCCACAGGCTGGGGCAGCACATTGAGGACGCACTGCTGGA  
 TGTGGCCTCCCTGTTCCAGGCGGGACAGCATTTTAAGCGCCGGTTCAGAGGGTCAGGGAAGGAGAACTCC  
 AGGCACAGGTGTGGATTTCTCTCCGCCAGACTGGGGCCTCCAAGGCCTCAATGACATCCACCGACTTC

**ACGCGT**ACGCGGCCGCTCGAG – GFP Tag – GTTTAA

**Protein Sequence:** >RG226726 representing NM\_001136052  
 Red=Cloning site Green=Tags(s)

```

MAEAHQAVGFRPSLTS DGA EVEL SAPVLQEIYLSGLRSWKRHL SRFW NDFLTGVFPASPLSWLFLFSAIQ
LAWFLQLDPSLGLMEKIKELL PDWGGQHHLRGVLAALFASCLWGALIFTLHVALRLLLSYHGWLLEPH
GAMSSPTKTWLALVRIFSGRHPMLFSYQRSLPRQPVSVQDTRVKYLESXXRPILSDEDFDWTAVLAQEF
LRLQASLLQWYLR LKSWASNYVSDWEEFVYLR SRNPLMVNSNYMMAARAGNAVHALLLYRHRLNRQE
IPPTLLMGM RPLCSAQYEKIFNTTRIPGVQKDYIRHLHDSQHVAVFHRGRFFRMGTHSRNSLLSPRALEQ
QFQRILDDPSPACPHEEHLAALTAAPRGTWAQVRTSLKTQAAEAL EAVEGAAFFVSLDAEPAGLTREDPA
ASLDAYAHALLAGRGH RWFDFKSFTLIVFSNGKLG LSVESWADCPISGHMWEFTLATECFQLGYSTDGH
CKGHPDPTLPQPQLQWDL PDQIHSSISLALRGAKILSENVDCHVVPFSLFGKSFIR RCHLSSDSFIQIA
LQLAHFRDRGQFCLTYESAMTRLFLEGR TETVRSCTREACNFVRAMEDKEKTD PQC LALFRVAVDKHQAL
LKAAMSGQGVDRHLFALYIVSRFLHLQSPFLTQVHSEQWQLSTSQIPVQQMHLFDVHNYPDYVSSGGGFG
PADDHGYVSYIFMGDGMITFHISSKKSSTKTDSHRLGQHIEDALLDVASLFQAGQHFKRRFRGSGKENS
RHRCGFLSRQTGASKASMTSTDF
  
```

TRTRPLE - GFP Tag - V

**Restriction Sites:** SgfI-MluI

**Cloning Scheme:**

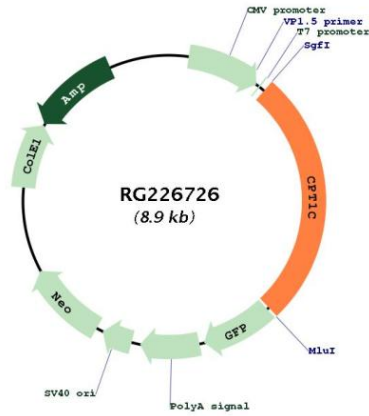


**ACCN:** NM\_001136052

**ORF Size:** 2379 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>	<p>This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.</p>
<b>Components:</b>	<p>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).</p>
<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>	<p><a href="#">NM_001136052.2</a>, <a href="#">NP_001129524.1</a></p>
<b>RefSeq Size:</b>	<p>2853 bp</p>
<b>RefSeq ORF:</b>	<p>2379 bp</p>
<b>Locus ID:</b>	<p>126129</p>
<b>UniProt ID:</b>	<p><a href="#">Q8TCG5</a></p>
<b>Cytogenetics:</b>	<p>19q13.33</p>
<b>Protein Families:</b>	<p>Druggable Genome, Transmembrane</p>
<b>Protein Pathways:</b>	<p>Adipocytokine signaling pathway, Fatty acid metabolism, PPAR signaling pathway</p>
<b>Gene Summary:</b>	<p>This gene encodes a member of the carnitine/choline acetyltransferase family. The encoded protein regulates the beta-oxidation and transport of long-chain fatty acids into mitochondria, and may play a role in the regulation of feeding behavior and whole-body energy homeostasis. Alternatively spliced transcript variants encoding multiple protein isoforms have been observed for this gene. [provided by RefSeq, Dec 2010]</p>

Product images:



Circular map for RG226726