

## Product datasheet for **SC304581**

### **MCTP2 (NM\_018349) Human Untagged Clone**

#### **Product data:**

|                                  |                        |
|----------------------------------|------------------------|
| <b>Product Type:</b>             | Expression Plasmids    |
| <b>Tag:</b>                      | Tag Free               |
| <b>Symbol:</b>                   | MCTP2                  |
| <b>Mammalian Cell Selection:</b> | Neomycin               |
| <b>Vector:</b>                   | pCMV6-Entry (PS100001) |
| <b>E. coli Selection:</b>        | Kanamycin (25 ug/mL)   |



**Fully Sequenced ORF:** >SC304581 representing NM\_018349.  
Blue=Insert sequence Red=Cloning site Green=Tag(s)

GCTCGTTTAGTGAACCGT CAGAAATTTGTAATACGACTACTATAGGGCGCGGGAATTCGTCGACTG  
GATCCGGTACCGAGGAGATCTGCCGCCGCGATCGCC  
ATGGATCTGGATAAACCATCTGTTTGGGGCTCATTAACAGCGGACCGCCATTGTTGATCAACTTG  
AGCAAGAAGAAGGTGAAAAAGAACCCAAGTAAGCCCCAGATCTACGGGCAAGGCATCACTTGGACCGC  
CGTCTCAGCCTCTCTGTGCCTGATCTGCTGGAGGCTGAGGCCCTGGCCCCAGAGGGCCGGCCTTACTCC  
GGCCACAGCTCTTCTACACCTCGTGCCAGCAGTCTGCCATCAGGGGATCTTTCCCAAGACGAGC  
AGTAGCTCCTTGAACAGCTGGAAGAAGAAATGGATTGGAGCAGGAAGAAGCCAGTCACTTCATGTG  
GTGGAACAGACTCAGAGGAGGCCTATGCCTCTCTGCTGAGCGGAGACGGGTGTCCAGCAACGGCATG  
TTTGATCTTCAGAAAACCTCCCTTGGAGGGGATGCACCAGAAGAGCCAGAGAAGCTATGTGGAAGCAGT  
GACCTGAATGCTTCTATGACATCTCAACATTTTGAAGAACATCTGTACCGGGGAAGCCAGTGATGGC  
TTAGTAACCTCCCCAGCCCTTTTGCCTACCTCCTACCATACACCTGAAGGAAGGCCGGAACCTGTTT  
GTCCGAGATCGCTGTGGCACAAGTGATCCTTATGTGAAATTTAAGCTGAATGGGAAGACGCTGTACAAA  
AGTAAAGTCATATATAAGAACTTGAACCCAGTATGGGATGAGATAGTTGTATTGCCAATCCAAAGCCTT  
GATCAAAAGCTACGTTGAAGGTATATGATCGAGATTTAACACATCTGATTTCTGGGTTCTGCATTT  
GTCTTCTCAGTAGTCTTGACCTTAACAGCAACTGAACATATTTTAAACTGGAAGATCCAAACAGT  
TTAGAAGATGACATGGGAGTGATCGTGTTAAATTTGAACCTAGTGGTAAACAGGCGATTTCAGAGA  
CACCGTTGGTCAAATCGGAAGCGATTAAGTGCCAGCAAGTCTCTTTGATACGCAACCTACGGCTCTCT  
GAGTCCTTGAAAAAGAACCACTCTGGAACGGGATTATAAGTATAACTTTGTTGGAAGGGAAGAATGTC  
TCAGGAGGAAGCATGACAGAGATGTTTGTCCAGTTAAACTGGGAGATCAGAGGTATAAAAGTAAGACA  
CTGTGTAAAGAGTGCAAAATCCGAGTGGCAGGAACAGTTTGACTTTCACACTTCTCTGACAGGATGGGC  
ATTTTGGACATTGAAGTGTGGGGAAGGACAACAAAAAGCATGAGGAACGCTCTGGGCACGTGTAAGATG  
GATATCTCGGCACTCCCTCTGAAGCAAGCCAACCTGCCTGGAGCTGCCACTGGACAGCTGTCTGGGGCT  
CTCCTTATGTTGGTCACACTTACACCCCTGTCGGGGGCTCTCCGCTCTGATCTGTGTGCTGCCCTTA  
GCAGACCTCAGCGAAGGAAGACAGATACCCAGCATATTGCTTACAGAACTCCCTGAAAGATGTGAAA  
GAGCTCGGCATTCTACAAGTGAAGGTTTTAAAGGCAGCAGATCTCTAGCGGCAGATTTCTCAGGGAAG  
AGTGACCCATTTTGCTTGTGGAGTTAGGCAATGACCGACTTCAGACGCATACCGTCTACAAAAACCTC  
AACCTGAATGGAACAAAGTTTTTACATTTCCCATTAAGATATCCATGATGTTTTGGAAGTGACAGTG  
TTTGATGAAGATGGAGATAAACCCCCAGATTTTCTTGAAAAAGTTGCCATTCCCTTGCTGTCCATTAGA  
GATGGACAACCGAATTGTATGTACTAAAGAATAAAGATTTAGAACAGCTTTTAAAGGAGTATTTAC  
TTAGAGATGGACCTTATATATAATCCGGTGAAAGCAAGTATTAGGACTTTTACTCCCCGGGAAAAGCGC  
TTTGTGGAAGACAGCGCAAGCTGTCCAAAAAGATCTTATCAAGAGATGTGGACCGTGTGAAAAAGATC  
ACTATGGCAATATGGAATACAATCGAGTCTCTTAAAGCTGCTCCAGTGGGAATCCCATATGAAGAGT  
ACAATAGCATTCGCGGTATTTTGTACTGCTGTCTGGAATTTGAACTATATGATCCCTTGCGATTG  
TTGCTGATCTTTGCTACAATTTCTCAGACCTGTGAAAGGCAAGGTGAGCAGCATCCAGGACAGCCAG  
GAGAGCACAGACATAGATGACGAGGAGGATGAAGATGACAAGGAATCTGAGAAAAAGGGGTTGATTGAA  
AGAATCTATATGTTACAGGATATTGTTTCACTGTTCAAAACGCTCTGGAGGAAAATAGCTTCTTTTGA  
GAAAGGATTAAGAACACATTTAACTGGACGGTCCCCTTCTTTTATCTCTGGCCTGTTTGATTCTGGCA  
GCAGCCACCATCATTTTGTATTTCATTCCACTGCGGTACATCATTTTAATCTGGGCGATAAATAAATTT  
ACTAAGAAGCTTCGAATCCCTATTCCATCGACAATAATGAGCTACTAGACTTCTCTCTAGGGTACCG  
TCTGATGTTCAAAGGTGCGATATGCAGAATTGAAACTCTGCAGCAGCCACAGCCCCCTGCGGAAGAAG  
CGCGCGCTCAAAAGTCCG  
ACGCGTACGCGGCGCTCGAGCGAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGAT  
TACAAGGATGACGACGATAAGGTTTAAACGGCCGGC

**Restriction Sites:** SgfI-MluI

ACCN: NM\_018349

**Insert Size:** 2637 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 TrueClone is provided through our Custom Cloning Process that includes sub-cloning into OriGene's pCMV6 vector and full sequencing to provide a non-variant match to the expected reference without frameshifts, and is delivered as lyophilized plasmid DNA.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| <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>Note:</b>                  | Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| <b>RefSeq:</b>                | <a href="#">NM_018349.3</a>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| <b>RefSeq Size:</b>           | 7637 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>RefSeq ORF:</b>            | 2637 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Locus ID:</b>              | 55784                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| <b>UniProt ID:</b>            | <a href="#">Q6DN12</a>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Cytogenetics:</b>          | 15q26.2                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Protein Families:</b>      | Transmembrane                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| <b>MW:</b>                    | 99.6 kDa                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |

**Gene Summary:**

Might play a role in the development of cardiac outflow tract.[UniProtKB/Swiss-Prot Function]

Transcript Variant: This variant (1) encodes the longest isoform (1).