

## Product datasheet for **MR206055**

### Selenoi (NM\_027652) Mouse Tagged ORF Clone

#### Product data:

|                           |                                                                                            |
|---------------------------|--------------------------------------------------------------------------------------------|
| <b>Product Type:</b>      | Expression Plasmids                                                                        |
| <b>Symbol:</b>            | Selenoi                                                                                    |
| <b>Synonyms:</b>          | 4933402G07Rik; AI448296; AI452230; C79563; D5Wsu178; D5Wsu178e; Ept; Ept1; mKIAA1724; SELI |
| <b>Mammalian Cell</b>     | Neomycin                                                                                   |
| <b>Selection:</b>         |                                                                                            |
| <b>Vector:</b>            | pCMV6-Entry (PSI00001)                                                                     |
| <b>E. coli Selection:</b> | Kanamycin (25 ug/mL)                                                                       |

**ORF Nucleotide Sequence:** >MR206055 ORF sequence  
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCCGCGATCGCC

ATGGCTGGCTACGAATACGTGAGCCAGAGCAGCTGTCGGGCTTTGACAAGTACAAGTACAGCGCTTTGG  
ATACCAACCCACTCTCTGTATATCATGCATCCATTTTGAACACTATAGTGAAGGTGTTTCTACTTG  
GCTGGCTCCCAATCTTATAACCTTTTCTGGCTTTATGCTGCTTGTGTCAATTTCTACTCCTGACATAC  
TTCGACCCTGACTTCTATGCTTCAGCCCTGGTCATAAGCATGTGCCTGACTGGGTTTGGATTGTCGTGG  
GCATCCTCACTTTGCTGCCTACACTCTAGATGGAGTGGATGGAAGCAAGCACGGAGAACCAATCCAG  
CACCCCGTTAGGGGAGCTGTTTGACCATGGCCTGGACAGTTGGTCGTGTGTTTACTTTGTTGTGACTGTG  
TACTCCATCTTTGGACGAGGACCGACTGGCGTCAGTGTGTTTTGTTCTTTATCTCCTGCTATGGGTAGTTT  
TGTTTTCTTTATCCTGTCTCACTGGGAGAAGTATAACACAGGCGTTCTTTCTGCCATGGGGATATGA  
CATTAGCCAAGTGACTATTTCTTTGTCTACATAGTGACTGCGGTTGTGGGAGTTGAGGCCTGGTATGAA  
CCTTTCTGTTTAATTTCTTATATAGAGACCTATTCAGTCAATGATTATTGGGTGTGATTATGTGTGA  
CTCTTCCAATGAGTTTATTAACTTTTTAGAACTATAAAAGCAACACGCTGAAGCACAAGTCCGTCTA  
TGAAGCCATGGTCCCCTTCTTCTCCGTGTTTGTCTTCACTTTGTGTACAGTGTGGATCCTCTGGTCA  
CCTTCAGATATCTTAGAAATACACCCTAGAATATTCTACTTCATGGTTGGAACAGCTTTTGCCAATATCA  
CATGTCAGCTAATTGTTTGCCAAATGAGCAGCAGCGGTGCCGACTTTGAAGTGGTTACTGCTTCCTCT  
CCTCTTGTTGTGGCAGCGGTGATCGTAGGTGCAGCCACCTCCGCTTGAGAGCGCCCTCCTTTACACA  
CTCACGGCTGCCTTCACTCTGGCTCACATCCATTATGGCGTACAAGTGGTGAAGCAGCTGAGCCGACATT  
TTCAGATTTATCCTTTTTCATTGAGGAAACCAACTCAGATTGACTAGGAATGGAAGACAGAATATCGG  
CCTG

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGATT  
ACAAGGATGACGACGATAAGGTTTAA



Protein Sequence:

>MR206055 protein sequence  
Red=Cloning site Green=Tags(s)

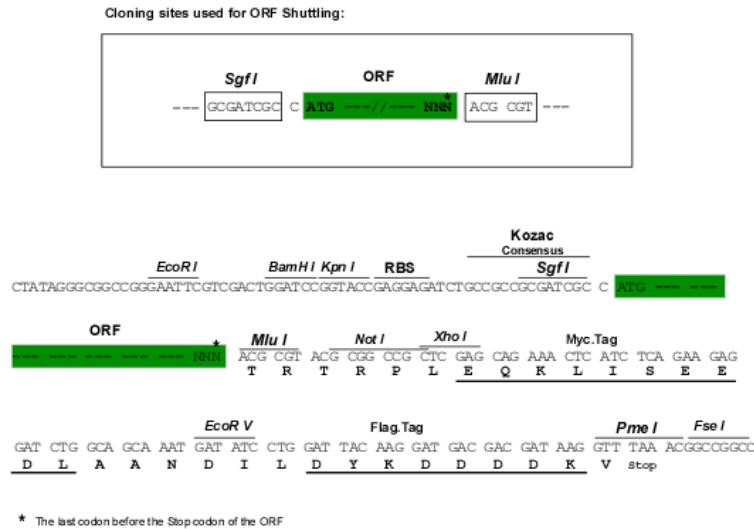
MAGYEYVSPEQLSGFDKYKYSALDTNPLSLYIMHPFWNTIVKVFTWLPANLITFSGFMLLVFNFLLLTY  
FDPDFYASAPGHKHVPDWVWVIVVGILNFAAYTLDGVDGKQARRTNSSTPLGELFDHGLDSWCVYFVTV  
YSIFGRGPTGVSVFVLYLLLVVLFVSILSHWEKYNTGVFLPWGVDISQVTISFVYIVTAVVGVEAWYE  
PFLFNFLYRDLFTAMIIGCALCVTLPMSELLNFFRSYKSNLKHKSVEAMVPFFSPCLLFTLCTVWILWS  
PSDILEIHPRIIFYFMVGTAFANITCQLIVCQMSSTRCPTLNWLLPLLLVVAIVGAATSRLESALLYT  
LTAAFTLAHIHYGVQVVKLSRHFQIYPFSLRKPNSD\*LGMEEQNIGL

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Restriction Sites:

SgfI-MluI

Cloning Scheme:



ACCN:

NM\_027652

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](#) The expression of this clone is not guaranteed due to the nature of selenoproteins.

OTI Annotation:

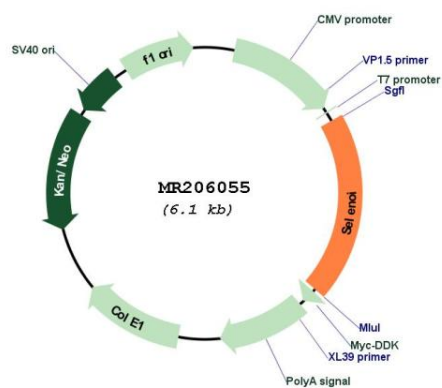
This clone encodes a selenoprotein containing the rare amino acid selenocysteine (Sec). Sec is encoded by UGA codon, which normally signals translational termination. Expression of this clone is not guaranteed due to the nature of selenoproteins.

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).

|                               |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
|-------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <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>                | <u>NM_027652.3</u> , <u>NP_081928.2</u>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| <b>RefSeq Size:</b>           | 6769 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| <b>RefSeq ORF:</b>            | 1197 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| <b>Locus ID:</b>              | 28042                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| <b>UniProt ID:</b>            | <u>Q80TA1</u>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Cytogenetics:</b>          | 5 16.22 cM                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| <b>Gene Summary:</b>          | <p>The multi-pass transmembrane protein encoded by this gene belongs to the CDP-alcohol phosphatidyltransferase class-I family. It catalyzes the transfer of phosphoethanolamine from CDP-ethanolamine to diacylglycerol to produce phosphatidylethanolamine, which is involved in the formation and maintenance of vesicular membranes, regulation of lipid metabolism, and protein folding. This protein is a selenoprotein, containing the rare selenocysteine (Sec) amino acid at its active site. Sec is encoded by the UGA codon, which normally signals translation termination. The 3' UTRs of selenoprotein mRNAs contain a conserved stem-loop structure, designated the Sec insertion sequence (SECIS) element, that is necessary for the recognition of UGA as a Sec codon rather than as a stop signal. Alternatively spliced transcript variants have been found for this gene. [provided by RefSeq, Jul 2016]</p> |

Product images:



Circular map for MR206055