

## Product datasheet for SC119263

### EDG2 (LPAR1) (NM\_001401) Human Untagged Clone

#### Product data:

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|---------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Product Type:             | Expression Plasmids                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| Product Name:             | EDG2 (LPAR1) (NM_001401) Human Untagged Clone                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Tag:                      | Tag Free                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| Symbol:                   | EDG2                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| Synonyms:                 | edg-2; EDG2; Gpcr26; LPA1; Mrec1.3; rec.1.3; vzg-1; VZG1                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| Mammalian Cell Selection: | None                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| Vector:                   | <u>pCMV6-XL5</u>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| E. coli Selection:        | Ampicillin (100 ug/mL)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| Fully Sequenced ORF:      | <p>&gt;OriGene ORF within SC119263 sequence for NM_001401 edited (data generated by NextGen Sequencing)</p> <pre> ATGGCTGCCATCTCTACTTCCATCCCTGTAATTTACAGCCCCAGTTCACAGCCATGAAT GAACCACAGTGCTTCTACAACGAGTCCATTGCCTTCTTTTATAACCGAAGTGGAAGCAT CTTGCCACAGAATGGAACACAGTCAGCAAGCTGGTGATGGGACTTGAATCACTGTTTGT ATCTTCATCATGTTGGCCAACCTATTGGTCATGGTGGCAATCTATGTCAACCGCCGCTTC CATTTTCTATTATTACCTAATGGCTAATCTGGCTGCTGCAGACTTCTTTGCTGGGTTG GCCTACTTCTATCTCATGTTCAACACAGGACCAATACTCGGAGACTGACTGTTAGCACA TGGCTCCTTCGTCAGGGCCTCATTGACACCAGCCTGACGGCATCTGTGGCCAACCTACTG GCTATTGCAATCGAGAGGCACATTACGGTTTTCCGCATGCAGCTCCACACACGGATGAGC AACCGGCGGGTAGTGGTGGTCATTGTGGTCATCTGGACTATGGCCATCGTTATGGGTGCT ATACCCAGTGTTGGCTGGAAGTGTATCTGTGATATTGAAAATTGTTCCAACATGGCACCC CTCTACAGTGACTCTTACTTAGTCTTCTGGGCCATTTTCAACTTGGTGACCTTTGTGGTA ATGGTGGTTCTCTATGCTCACATCTTTGGCTATGTTCCGAGAGGACTATGAGAAATGCTC CGGCATAGTTCTGGACCCCGCGGAATCGGGATACCATGATGAGTCTTCTGAAGACTGTG GTCATTGTGCTTGGGCTTTATCATCTGCTGGACTCCTGGATTGGTTTTGTTACTTCTA GACGTGTGCTGTCCACAGTGCAGCTGCTGGCCTATGAGAAATTTCTTCTCTCCTTGCT GAATTCAACTCTGCCATGAACCCCATCATTTACTCCTACCGCGACAAAGAAATGAGCGCC ACCTTTAGGCAGATCCTCTGCTGCCAGCGCAGTGAGAACCCACCGGCCCCACAGAAGGC TCAGACCGCTCGGCTTCTCCCTCAACACACCATCTTGCTGGAGTTTACAGCAATGAC CACTCTGTGGTTAG </pre> |

Clone variation with respect to NM\_001401.3



[View online »](#)

**5' Read Nucleotide Sequence:**

>OriGene 5' read for NM\_001401 unedited  
 GGGTTCACATTTTGTAAACGACTTACTATAGGGCGGCCGCGCAATTCGCACGAGGCTTC  
 TCCTAGCATGACTTCGATCTGATCAGCAAAACAAGAAATTGTCTCCCGTAGTTCTGGGGC  
 GTGTTACACACCTACAACCACAGAGCTGTCATGGCTGCCATCTCTACTTCCATCCCTGTA  
 ATTTACAGACCCAGTTCACAGCCATGAATGAACCACAGTGCTTCTACAACGAGTCCATT  
 GCCTTCTTTTATAACCGAAGTGGAAAGCATCTTGCCACAGAATGGAACACAGTCAGCAAG  
 CTGGTGATGGGACTTGGAACTACTGTTTGTATCTTCATCATGTTGGCCAACTATTGGTC  
 ATGGTGGCAATCTATGTCAACCGCGCTTCCATTTTCTATTTATTACCTAATGGCTAAT  
 CTGGCTGCTGCAGACTTCTTTGCTGGGTTGGCCTACTTCTATCTCATGTTCAACACAGGA  
 CCCAATACTCGGAGACTGACTGTTAGCACATGGCTCCTTCGTGAGGGCCTCATTGACACC  
 AGCCTGACGGCATCTGTGGCCAACTTACTGGCTATTGCAATCGAGAGGACTTTTACGGGT  
 TTCCGCATGCAGCTCCACACACGGATGAGCAACCGCGGGTAGTGGTGGTCATTGTGGTC  
 ATCTGGACTATGGCCATCGTTATGGGTGCTATACCCAGTGTGGGCTGGGACTGTATCTGT  
 GATATTGAAAATTGTTCCAACATGGCACCCCTCTACAGTACTTACTTAGTCTTCTGG  
 GCCATTTTCAACTTGGTGACCTTTGTGGAAGGGGGGCTCTATGCTCACACTCTTGGC  
 TATGGTCCCGAGAGAACATGAGAATGTCTCGGATAATTCTGGACCCGCCCATCGGGAAA  
 CATGC

**3' Read Nucleotide Sequence:**

>OriGene 3' read for NM\_001401 unedited  
 CGGCACGCAATCTAGTATCGAGTTTTTTTTTTTTTTTTTGTATGACAATCCTTTATTC  
 ACTCGGCACATTTGGTTTCTTTGCATTTTCTTCCATTTTACATTGCAGGTGTGGCTACCA  
 AGAGCTGGATAACGAGTCCCTCAAACAAAGTTTGAATTGCGAGATATATTGGGGTACCT  
 TGATTCTTGAGACAGTTGAATTCTTCTAGTTGATCTTGTGTATTTAAAGTCACTCTCA  
 ACTGAAGTGACCACTGCATTTCTTTGTAAAAAGGTCATTTGACTGGCTTTTCTCACAA  
 CTGCCACCCATGCAGTACAAAAGCAGGAAATCCCTTTGCATGAAAGGTGTAAGTACAAGA  
 TGACATTTACATTTTTTTAAAAAAGAATCCTTCATGGGAATATATCCTAATAATCAAT  
 TATATGGAGACAGTTTTATGTACACCAATTTCTGCACTTTATAATAATCAAAATTAGA  
 AACAACCTAAATAGTTAACAACATGGGAATGGTTAAATAAACTGAGTTGCATCCATTAA  
 TGGAATATAATATAGCCATTTAAATTATGTTTTGTAAAAATTTTAAATGCCATAAGAAAA  
 TGTGGCAATTTTGAATGAAAAAGATCTACTTATAAACTGTTTACAGTATGACTCCAAT  
 TATGTAAAAAAGTATACAATACACATATAGGCCTACATGGGGGTTGCTTTTTAAGGAGG  
 CTACTTCTGGGTTGCGATATTATAGAAATATTTTGCCTTTTATACATTNCGTATTTTTCA  
 AGTTTCTTGATGAGTTATTATTTTCAAAGACTACCAATTTTCTCTGAATACTGGAATTA  
 AATGTACCTGGGATTTTTAATTATGGGAACAACTTAGGCTTCTCTTCTGACTTTTAGA  
 TAACTACACTGGGATAAACTCCTTCTGTTTAACTGGTC

**Restriction Sites:**

NotI-NotI

**ACCN:**

NM\_001401

**Insert Size:**

2910 bp

|                               |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
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| <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>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_001401.3</a> , <a href="#">NP_001392.2</a>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| <b>RefSeq Size:</b>           | 3104 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>RefSeq ORF:</b>            | 1095 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Locus ID:</b>              | 1902                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| <b>UniProt ID:</b>            | <a href="#">Q92633</a>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Cytogenetics:</b>          | 9q31.3                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Domains:</b>               | 7tm_1                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| <b>Protein Families:</b>      | Druggable Genome, GPCR, Transmembrane                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| <b>Protein Pathways:</b>      | Gap junction, Neuroactive ligand-receptor interaction                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| <b>Gene Summary:</b>          | <p>The integral membrane protein encoded by this gene is a lysophosphatidic acid (LPA) receptor from a group known as EDG receptors. These receptors are members of the G protein-coupled receptor superfamily. Utilized by LPA for cell signaling, EDG receptors mediate diverse biologic functions, including proliferation, platelet aggregation, smooth muscle contraction, inhibition of neuroblastoma cell differentiation, chemotaxis, and tumor cell invasion. Many transcript variants encoding a few different isoforms have been identified for this gene. [provided by RefSeq, Oct 2020]</p> <p>Transcript Variant: This variant (1) represents the shorter transcript. Variants 1-26 encode the same protein.</p>                                                                                                                                                                                                                                                                                                             |