

## Product datasheet for **SC302894**

### **PDE4 (PDE4B) (NM\_001037340) Human Untagged Clone**

#### **Product data:**

Product Type:	Expression Plasmids
Product Name:	PDE4 (PDE4B) (NM_001037340) Human Untagged Clone
Tag:	Tag Free
Symbol:	PDE4
Synonyms:	DPDE4; PDEIVB
Vector:	<u>pCMV6 series</u>



[View online »](#)

**Fully Sequenced ORF:** >NCBI ORF sequence for NM\_001037340, the custom clone sequence may differ by one or more nucleotides

```

ATGACAGCAAAAGATTCTTCAAAGGAACCTACTGCTTCTGAACCTGAGGTTTGCATAAAG
ACTTTCAAGGAGCAAATGCATTTAGAATTGAGCTTCCGAGATTACCAGGAAACAGACCT
ACATCTCCTAAAATTTCTCCACGCAGTTCACCAAGGAACCTACCATGCTTTTTCAGAAAG
TTGCTGGTGAATAAAAGCATTTCGGCAGCGTCGTCGCTTCACTGTGGCTCATAATGCTTT
GATGTGGAAAATGGCCCTTCCCCAGGTCGGAGTCCACTGGATCCCAGGCCAGCTCTTCC
GCTGGGCTGGTACTTTCAGCCACCTTTCCTGGGCACAGCCAGCGCAGAGAGTCATTTCTC
TACAGATCAGACAGCGACTATGACTTGTACCAAAGGCGATGTCGAGAAACTCTTCTCTT
CCAAGCGAGCAACACGGCGATGACTTGATTGTAACCTCTTTGCCCAGGTCCTTGCCAGC
TTGCGAAGTGTGAGAAACAATTCACTATACTGACAAACCTTCATGGTACATCTAACAAG
AGGTCCCAGCTGCTAGTCAGCCTCCTGTCTCCAGAGTCAACCCACAAGAAGAATCTTAT
CAAAAATTAGCAATGGAAACGCTGGAGGAATTAGACTGGTGTAGACCAGCTAGAGACC
ATACAGACCTACCGTCTGTCAGTGAGATGGCTTCTAACAAGTTCAAAAGAATGTGAAC
CGGGAGCTGACACACCTCTCAGAGATGAGCCGATCAGGGAACCAGGTGTCTGAATACATT
TCAAATACTTTCTTAGACAAGCAGAATGATGTGGAGATCCCATCTCTACCCAGAAAAGAC
AGGGAGAAAAAGAAAAGCAGCAGCTCATGACCCAGATAAGTGGAGTGAAGAAAATTAATG
CATAGTTCAAGCCTAAACAATACAAGCATCTCACGCTTTGGAGTCAACACTGAAAATGAA
GATCACCTGGCCAAGGAGCTGGAAGACCTGAACAAATGGGGTCTTAACATCTTTAATGTG
GCTGGATATTCTACAATAGACCCTAACATGCATCATGTATGTATATTCCAGGAAAGA
GACCTCCTAAAGACATTCAGAATCTCATCTGACACATTTATAACCTACATGACTTTA
GAAGACCATTACCATTCTGACGTGGCATATCACAAACAGCCTGCACGCTGCTGATGTAGCC
CAGTCGACCCATGTTCTCCTTTCTACACCAGCATTAGACGCTGTCTTACAGATTTGGAG
ATCCTGGCTGCCATTTTTGACAGTGCATCCATGACGTTGATCATCCTGGAGTCTCCAAT
CAGTTTCTCATCAACACAATTCAGAACTTGCTTTGATGTATAATGATGAATCTGTGTTG
GAAAATCATCACCTTGCTGTGGGTTTCAAACCTGCTGCAAGAAGAACAACACTGTGACATCTT
ATGAATCTACCAAGAAGCAGCGTCAGACACTCAGGAAGATGGTTATTGACATGGTGTTA
GCAACTGATATGTCTAACATATGAGCCTGCTGGCAGACCTGAAGACAATGGTAGAAACG
AAGAAAGTTACAAGTTCAGGCGTCTTCTCCTAGACAACATAACCGATCGCATTACAGGTC
CTTCGCAACATGGTACACTGTGCAGACCTGAGCAACCCCAAGTCTTGGAAATGTAT
CGGCAATGGACAGACCGCATCATGGAGGAATTTTCCAGCAGGGAGACAAAGAGCGGGAG
AGGGGAATGGAATAGCCCAATGTGTGATAAACACACAGCTTCTGTGGAAAAATCCCAG
GTTGGTTTCATCGACTACATTGTCCATCCATTGTGGGAGACATGGGCAGATTTGGTACAG
CCTGATGCTCAGGACATTCTCGATACCTTAGAAGATAACAGGAACCTGGTATCAGAGCATG
ATACCTCAAAGTCCCTCACCCACTGGACGAGCAGAACAGGGACTGCCAGGGTCTGATG
GAGAAGTTTCAGTTTGAACCTGACTCTCGATGAGGAAGATTCTGAAGGACCTGAGAAGGAG
GGAGAGGGACACAGCTATTTACAGCAGCACAAGACGCTTGTGTGATTGATCCAGAAAAC
AGAGATTCCTGGGAGAGACTGACATAGACATTGCAACAGAAGACAAGTCCCCCGTGGAT
ACATAA
    
```

**Restriction Sites:** Please inquire

**ACCN:** NM\_001037340

**OTI Disclaimer:** Our molecular clone sequence data has been matched to the reference identifier above as a point of reference. Note that the complete sequence of our molecular clones may differ from the sequence published for this corresponding reference, e.g., by representing an alternative RNA splicing form or single nucleotide polymorphism (SNP).

**OTI Annotation:** 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>RefSeq:</b>	<u>NM_001037340.1, NP_001032417.1</u>
<b>RefSeq Size:</b>	4273 bp
<b>RefSeq ORF:</b>	2166 bp
<b>Locus ID:</b>	5142
<b>UniProt ID:</b>	<u>Q07343</u>
<b>Cytogenetics:</b>	1p31.3
<b>Protein Families:</b>	Druggable Genome
<b>Protein Pathways:</b>	Progesterone-mediated oocyte maturation, Purine metabolism
<b>Gene Summary:</b>	<p>This gene is a member of the type IV, cyclic AMP (cAMP)-specific, cyclic nucleotide phosphodiesterase (PDE) family. The encoded protein regulates the cellular concentrations of cyclic nucleotides and thereby play a role in signal transduction. Altered activity of this protein has been associated with schizophrenia and bipolar affective disorder. Alternative splicing and the use of alternative promoters results in multiple transcript variants encoding different isoforms. [provided by RefSeq, Jul 2014]</p> <p>Transcript Variant: This variant (c) differs in the 5' UTR and lacks a portion of the 5' coding region, compared to variant a. It represents use of an alternate promoter and initiates translation at an alternate start codon. The encoded isoform (3, also known as PDE4B3) has a shorter and distinct N-terminus when compared to isoform 1.</p>