

Product datasheet for RC205127L4

PDK1 (NM_002610) Human Tagged Lenti ORF Clone

Product data:

Product Type: Expression Plasmids

Product Name: PDK1 (NM_002610) Human Tagged Lenti ORF Clone

Tag: mGFP Symbol: PDK1

Mammalian Cell Puromycin

Selection:

Vector:

pLenti-C-mGFP-P2A-Puro (PS100093)

E. coli Selection: Chloramphenicol (34 ug/mL)

ORF Nucleotide The ORF insert of this cl

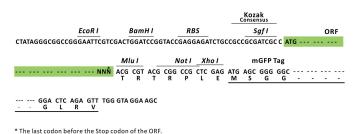
Sequence:

The ORF insert of this clone is exactly the same as(RC205127).

Restriction Sites: Sgfl-Mlul

Cloning Scheme:





ACCN: NM_002610

ORF Size: 1308 bp



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OTI Disclaimer:

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 custsupport@origene.com or by calling 301.340.3188 option 3 for pricing and delivery.

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. <u>More info</u>

OTI Annotation: This clone was engineered to express the complete ORF with an expression tag. Expression

varies depending on the nature of the gene.

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).

Reconstitution Method: 1. Centrifuge at 5,000xg for 5min.

2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.

3. Close the tube and incubate for 10 minutes at room temperature.

4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid

at the bottom.

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.

RefSeq: <u>NM 002610.3</u>

 RefSeq Size:
 4674 bp

 RefSeq ORF:
 1311 bp

 Locus ID:
 5163

 UniProt ID:
 Q15118

 Cytogenetics:
 2q31.1

Domains: HATPase c

Protein Families: Druggable Genome, Protein Kinase

Protein Pathways: Fc epsilon RI signaling pathway, Neurotrophin signaling pathway, T cell receptor signaling

pathway

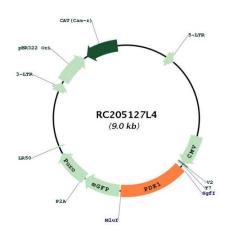
MW: 49.2 kDa



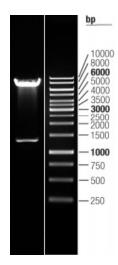
Gene Summary:

Pyruvate dehydrogenase (PDH) is a mitochondrial multienzyme complex that catalyzes the oxidative decarboxylation of pyruvate and is one of the major enzymes responsible for the regulation of homeostasis of carbohydrate fuels in mammals. The enzymatic activity is regulated by a phosphorylation/dephosphorylation cycle. Phosphorylation of PDH by a specific pyruvate dehydrogenase kinase (PDK) results in inactivation. Multiple alternatively spliced transcript variants have been found for this gene. [provided by RefSeq, Jun 2013]

Product images:



Circular map for RC205127L4



Double digestion of RC205127L4 using Sgfl and Mlul