

Product datasheet for RC228904L4

OriGene Technologies, Inc.

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NDUFV1 (NM_001166102) Human Tagged Lenti ORF Clone

Product data:

Product Type: Expression Plasmids

Product Name: NDUFV1 (NM_001166102) Human Tagged Lenti ORF Clone

Tag: mGFP

Synonyms: CI-51K; CI51KD; MC1DN4; UQOR1

NDUFV1

Mammalian Cell Puromycin

Selection:

Symbol:

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

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

ORF Nucleotide The ORF insert of this clone is exactly the same as(RC228904).

Sequence:

Restriction Sites: Sgfl-Mlul

Cloning Scheme:





^{*} The last codon before the Stop codon of the ORF

ACCN: NM_001166102

ORF Size: 1365 bp





NDUFV1 (NM_001166102) Human Tagged Lenti ORF Clone - RC228904L4

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

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 001166102.1</u>

RefSeq ORF: 1368 bp Locus ID: 4723 UniProt ID: P49821

Cytogenetics: 11q13.2

Protein Families: Druggable Genome

Protein Pathways: Alzheimer's disease, Huntington's disease, Metabolic pathways, Oxidative phosphorylation,

Parkinson's disease

MW: 49 kDa

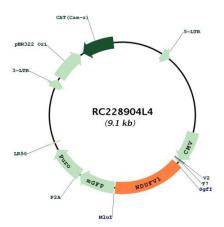
Gene Summary: The mitochondrial respiratory chain provides energy to cells via oxidative phosphorylation

and consists of four membrane-bound electron-transporting protein complexes (I-IV) and an ATP synthase (complex V). This gene encodes a 51 kDa subunit of the NADH:ubiquinone oxidoreductase complex I; a large complex with at least 45 nuclear and mitochondrial encoded subunits that liberates electrons from NADH and channels them to ubiquinone. This subunit carries the NADH-binding site as well as flavin mononucleotide (FMN)- and Fe-S-biding sites. Defects in complex I are a common cause of mitochondrial dysfunction; a syndrome that occurs in approximately 1 in 10,000 live births. Mitochondrial complex I deficiency is linked to myopathies, encephalomyopathies, and neurodegenerative disorders such as Parkinson's disease and Leigh syndrome. Alternative splicing results in multiple

transcript variants encoding distinct isoforms.[provided by RefSeq, Oct 2009]



Product images:



Circular map for RC228904L4