

## Product datasheet for RC202712L3V

## OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

## Phospholamban (PLN) (NM 002667) Human Tagged ORF Clone Lentiviral Particle

**Product data:** 

**Product Type:** Lentiviral Particles

**Product Name:** Phospholamban (PLN) (NM\_002667) Human Tagged ORF Clone Lentiviral Particle

Symbol: Phospholamban

Synonyms: CMD1P; CMH18; PLB

**Mammalian Cell** 

Selection:

Puromycin

**Vector:** pLenti-C-Myc-DDK-P2A-Puro (PS100092)

Tag: Myc-DDK

**ACCN:** NM\_002667

ORF Size: 156 bp

**ORF Nucleotide** 

The ORF insert of this clone is exactly the same as(RC202712).

Sequence:

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.

**RefSeg:** NM 002667.2

 RefSeq Size:
 1742 bp

 RefSeq ORF:
 159 bp

 Locus ID:
 5350

 UniProt ID:
 P26678

Cytogenetics: 6q22.31

**Protein Families:** Transmembrane

**Protein Pathways:** Calcium signaling pathway, Dilated cardiomyopathy





MW:

6.1 kDa

**Gene Summary:** 

The protein encoded by this gene is found as a pentamer and is a major substrate for the cAMP-dependent protein kinase in cardiac muscle. The encoded protein is an inhibitor of cardiac muscle sarcoplasmic reticulum Ca(2+)-ATPase in the unphosphorylated state, but inhibition is relieved upon phosphorylation of the protein. The subsequent activation of the Ca(2+) pump leads to enhanced muscle relaxation rates, thereby contributing to the inotropic response elicited in heart by beta-agonists. The encoded protein is a key regulator of cardiac diastolic function. Mutations in this gene are a cause of inherited human dilated cardiomyopathy with refractory congestive heart failure, and also familial hypertrophic cardiomyopathy. [provided by RefSeq, Apr 2016]