PRODUCT INFORMATION

Expression system E.coli

Domain 1-192aa

UniProt No. Q15126

NCBI Accession No. NP_006547

Alternative Names Phosphomevalonate kinase, HuMPMKI, PMK, PMKA, PMKASE, Phosphomevalonate kinase

PRODUCT SPECIFICATION

Molecular Weight 24.1 kDa (212aa) confirmed by MALDI-TOF

Concentration 1mg/ml (determined by Bradford assay)

Formulation Liquid in. 20mM Tris-HCl buffer (pH 7.5) containing 1mM DTT, 10% glycerol, 0.1M NaCl

Purity > 95% by SDS-PAGE

Tag His-Tag

Application SDS-PAGE

Storage Condition

Can be stored at +2C to +8C for 1 week. For long term storage, aliquot and store at -20C to -80C. Avoid repeated freezing and thawing cycles.

BACKGROUND

Description

Phosphomevalonate kinase, also known as PMVK, is a cytosolic enzyme. It was expressed highly in heart, liver, skeletal muscle, kidney and pancreas and slightly lower in brain, placenta, and lung. Induced by sterol, PMVK participates in isopentenyl diphosphate biosynthesis via the mevalonate pathway. PMVK catalyzes the conversion of mevalonate 5-phosphate into mevalonate 5-diphosphate in the fifth reaction of the cholesterol biosynthetic pathway. Recombinant human PMVK protein, fused to His-tag at N-terminus, was expressed in E. coli and purified by using conventional chromatography techniques.



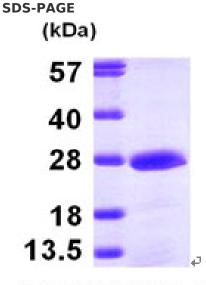
Amino acid Sequence

MGSSHHHHHH SSGLVPRGSH MAPLGGAPRL VLLFSGKRKS GKDFVTEALQ SRLGADVCAV LRLSGPLKEQ YAQEHGLNFQ RLLDTSTYKE AFRKDMIRWG EEKRQADPGF FCRKIVEGIS QPIWLVSDTR RVSDIQWFRE AYGAVTQTVR VVALEQSRQQ RGWVFTPGVD DAESECGLDN FGDFDWVIEN HGVEQRLEEQ LENLIEFIRS RL

General References

Cho Y K., et al. (2001) J Biol chem. 278:4510-4515. Hogenboom S., et al. (2004) J Lipid Res. 45:697-705.

DATA



3ug by SDS-PAGE under reducing condition and visualized by coomassie blue stain.

15% SDS-PAGE (3ug)