

MVK, 1-396aa Human, His tag, E.coli

Cat.NO.: TP03054

3th Edition

Synonyms: Mevalonate kinase, LRBP, MK, MVLK

Description: Mevalonate kinase, also known as MVK, belongs to the GHMP kinase family. Mevalonate is a key intermediate, and mevalonate kinase a key early enzyme, in isoprenoid and sterol synthesis. Mevalonate kinase deficiency caused by mutation of this gene results in mevalonic aciduria, a disease characterized psychomotor retardation, failure to thrive, hepatosplenomegaly, anemia and recurrent febrile crises. Defects in this gene also cause hyperimmunoglobulinaemia D and periodic fever syndrome, a disorder characterized by recurrent episodes of fever associated with lymphadenopathy, arthralgia, gastrointestinal dismay and skin rash. Recombinant human MVK protein, fused to His-tag at N-terminus, was expressed in E.coli and purified by using conventional chromatography techniques.

Form: Liquid. In 20mM Tris-HCl buffer (pH 8.0) containing 0.15M NaCl, 10% glycerol, 1mM DTT

Molecular Weight: 44.8 kDa (419aa) confirmed by MALDI-TOF

Sequences:

MGSSHHHHHSSGLVPRGSHMGSMMLSEVLLVSAPGKVLHGEHAVVHGKVALAVSLNLRRTFLRLQPHSNGKVDLS
LPNIGIKRAWDVARLQSLDTSFLEQGDVTTPTSEQVEKLKEVAGLPDDCAVTERLAVLAFLYLYLSICRKQRALPSLD
IVVWSELPPGAGLGSSAAYSVCCLAAALLTVCEEIPNPLKDGDCVNRWTKEDLELINKWAFQGERMIHGPNPSGVDNA
VSTWGGALRYHQGKISSLKRSPALQILLTNTKVPRNTRALVAGVRNRLKFPFIVAPLLTSIDAISELCERVLGEMGE
APAPEQYLVLEELIDMNQHHLNALGVGHASLDQLCQVTRARGLHSKLTGAGGGGCGITLLKPGLEQPEVEATKQAL
TSCGFDCLETSIGAPGVSIHSATSLDSRVQQALDGL

Purity: > 95% by HPLC

Concentration: 0.5 mg/ml (determined by Bradford assay)

Endotoxin Level: <1.0 EU per 1 ug of protein (determined by LAL method)

Storage: Can be stored at +4°C short term (1-2 weeks). For long term storage, aliquot and store at -20°C or -70°C. Avoid repeated freezing and thawing cycles.