

Instruction manual FOR RESEARCH USE ONLY NOT FOR USE IN CLINICAL DIAGNOSTIC PROCEDURES

MRPL1, 51-325aa, Human, His tag, E.coli

Cat.NO.: TP03021

3th Edition

Synonyms:39S ribosomal protein L1, mitochondrial precursor, BM022, L1MT, MRP-L1

Description:39S ribosomal protein L1, mitochondrial precursor, also known as MRPL1, is a 338 amino acid mitochondrial protein that exists as a component of the 39S ribosomal subunit and works in conjunction with other MRPs to mediate protein synthesis. Mitochondrial ribosomes consist of a large 39S subunit and a small 28S subunit, both of which are comprised of multiple mitochondrial ribosomal proteins (MRPs) that are encoded by nuclear genes and are essential for protein synthesis within mitochondria. MRPL1 exists as two isoforms produced by alternative splicing. Isoform one of MRPL1 is ubiquitously expressed while isoform two is specifically expressed in heart. Recombinant human MRPL1 proteinto 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 0.1M NaCl, 30% glycerol, 1mM DTT

Molecular Weight:33.8kDa (298aa) confirmed by MALDI-TOF

Sequences:

MGSSHHHHHHSSGLVPRGSHMGSKKTKKGAKEKTPDEKKDEIEKIKAYPYMEGEPEDDVYLKRLYPRQIYEVEKA VHLLKKFQILDFTSPKQSVYLDLTLDMALGKKKNVEPFTSVLSLPYPFASEINKVAVFTENASEVKIAEENGAAFAGG TSLIQKIWDDEIVADFYVAVPEIMPELNRLRKKLNKKYPKLSRNSIGRDIPKMLELFKNGHEIKVDEERENFLQTKIATL DMSSDQIAANLQAVINEVCRHRPLNLGPFVVRAFLRSSTSEGLLLKIDPLLPKEVKNEESEKEDA

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.

1/1