

Product datasheet for SC334603

MRPL2 (NM_001300848) Human Untagged Clone

Product data:

OriGene Technologies, Inc.

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Product Type:	Expression Plasmids
Product Name:	MRPL2 (NM_001300848) Human Untagged Clone
Tag:	Tag Free
Symbol:	MRPL2
Synonyms:	CGI-22; MRP-L14; RPML14
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Fully Sequenced ORF:	>NCBI ORF sequence for NM_001300848, the custom clone sequence may differ by one or more nucleotides
	ATGGCCCTGTGCGCACTGACCCGCGCTCTGCGCTCTCTGAACCTGGCGCCCCCGACCGTCGCCGCCCCTG CCCCGAGTCTGTTCCCCGCCCCAGATGATGAACAATGGCCTCCTCCAACAGCCCTCTGCCTTGATGTT GCTCCCCTGCCGCCCAGTTCTTACTTCTGTGGCCCTTAATGCCAACTTTGTGTCCTGGAAGAGTCGTACC AAGTACACCATTACACCAGTGAAGATGAGGGAAGTCTGGGGGGCCGAGACCACACAGGCCGAATCCGGGTGC ATGGTATTGGCGGGGGCCACAAGCAACGTTATCGAATGATTGACTTTCTGCGTTTCCGGCCTGAGGAGAC CAAGTCAGGACCCTTTGAGGAGAAGGTTATCCAAGTCCGCTATGATCCTGTAGGTCAGCAGACATAGCT CTGGTTGCTGGGGGCCACCAGCAACGCTGATCGCCCCCCACAGAAAACATGCAGGCTGGAGAAAACATCT TGAACTCTAACCACATAGGCCGAATGGCAGTTGCTGCTGCGGGAAGGGGATGCGCCATCCTCTTGGGGCTCT GCCTGTGGGGGACCCTCATCAACAGTGGAAAGTGAGCCAGGCCGGGGGCCCCAATATATCCGAGCTGCA GGTGCTGGAAACGTGCTAGCAACGTAGGCCGAGTATCCAACGTTGA
Restriction Sites:	Sgfl-Mlul
ACCN:	NM_001300848
OTI Disclaimer:	Our molecular clone sequence data has been matched to the reference identifier above as a point of reference. Note that the complete sequence of our molecular clones may differ from the sequence published for this corresponding reference, e.g., by representing an alternative RNA splicing form or single nucleotide polymorphism (SNP).
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).



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Reconstitution Method:	 Centrifuge at 5,000xg for 5min. Carefully open the tube and add 100ul of sterile water to dissolve the DNA. Close the tube and incubate for 10 minutes at room temperature. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom. 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 001300848.1, NP 001287777.1</u>
RefSeq Size:	1259 bp
RefSeq ORF:	678 bp
Locus ID:	51069
UniProt ID:	<u>Q5T653</u>
Cytogenetics:	6p21.1
Gene Summary:	Mammalian mitochondrial ribosomal proteins are encoded by nuclear genes and help in protein synthesis within the mitochondrion. Mitochondrial ribosomes (mitoribosomes) consist of a small 28S subunit and a large 39S subunit. They have an estimated 75% protein to rRNA composition compared to prokaryotic ribosomes, where this ratio is reversed. Another difference between mammalian mitoribosomes and prokaryotic ribosomes is that the latter contain a 5S rRNA. Among different species, the proteins comprising the mitoribosome differ greatly in sequence, and sometimes in biochemical properties, which prevents easy recognition by sequence homology. This gene encodes a 39S subunit protein that belongs to the EcoL2 ribosomal protein family. A pseudogene corresponding to this gene is found on chromosome 12q. Alternative splicing results in multiple transcript variants encoding distinct isoforms. [provided by RefSeq, Jul 2014]

Transcript Variant: This variant (2) lacks an exon in the 3' coding region, which results in a frameshift and an early stop codon, compared to variant 1. The encoded isoform (2) has a shorter and distinct C-terminus, compared to isoform 1.

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