

## Product datasheet for **RC209478**

### MRPS27 (NM\_015084) Human Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	MRPS27 (NM_015084) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	MRPS27
Synonyms:	MRP-S27; S27mt
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
ORF Nucleotide Sequence:	>RC209478 ORF sequence Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**CGATCGCC**

ATGGCTGCCTCCATAGTGCGGCGGGATGCTCCTGGCGCGGCAAGTGGTTCTTCCTCAGCTCTCTCCTG  
CAGGTAAGATACTGCTTTCTCAGCCTATGTAGACAGCCACAAATGGGAAGCAAGAGAAAAAGAACA  
TTACTGTCTTGCTGATCTTGCATCTTTAATGGATAAAACATTTGAGAGAAAGTTGCCTGTTAGTTCTTTA  
ACAATATCACGGCTTATAGACAACATTTCTCCTCGGGAAGAGATAGATCATGCAGAGTATTACCTTTACA  
AGTTTCGACACAGCCCAACTGCTGGTACCTGAGAACTGGACTATCCACACCTGGATTAGCGAGTGTCT  
AAAATATGATGCACAAGACAAAGCCCTATATACCCTTGTAAATAAGGTTCAATATGGAATTTTTCCAGAT  
AACTTTACATTCATTTACTGATGGATTCTTTATAAAGAAAGAAAATTACAAAGATGCTTTATCTGTGG  
TTTTTGAGGTCATGATGCAAGAAGCCTTTGAAGTGCCTCCACCAACTTCTCTCCCTCTATGTTTTATT  
TCATTGCCTGGCAAGAAGACAGACTTCAGTTGGGAAGAGGAGAGGAACCTTTGGTGCATCCCTTTTGCTT  
CCAGGCCATAAACAAGAACTCAGTGGGTTTCAGTCCAGTTGTATGGCTATGCATCTTTGGGAAGG  
TGGAGTTGCAGCAAGGGCTACGGGCTGTGTACCACAACATGCCTCTGATATGAAACCAGGCTACCTTGA  
CAGAGCCCTTCAAGTGTGAGAAAGTGGCTGCCTCCCCAGAAGACATAAAGCTGTGTAGAGAAGCGCTC  
GATGCTGGTGCAGTCTGAAGGCTCTGACTCAGCTGATGGGGCTTCAGAGGAGCAGTCCCAAAATG  
ATGAAGACAACCAGGGTTCAGAAAACTGGTGGAGCAGTTAGACATCGAGGAAACAGAGCAGTCCAAGCT  
TCCTCAATACCTGGAACGATTTAAGGCCTTACATTCTAAGCTTCAAGCTCTGGGCAAAATTGAGTCAGAA  
GGTCTTTAAGTCTGACCACCCAGCTTGTCAAGGAAAACTCTCCACCTGTGAAGCAGAGGACATCGCCA  
CCTATGAGCAGAACTGCAGCAGTGGCATCTAGACCTTGTACAGTTGATCCAGAGAGAACAGCAACAGAG  
GGAGCAAGCGAAGCAGGAGTACCAGGCTCAGAAAGCAGCAAAGGCATCTGCC

**ACGCGT**ACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCTGGATT  
ACAAGGATGACGACGATAAGGTTTAA





**Reconstitution Method:**

1. Centrifuge at 5,000xg for 5min.
2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
5. 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:** [NM\\_015084.3](#)

**RefSeq Size:** 2797 bp

**RefSeq ORF:** 1245 bp

**Locus ID:** 23107

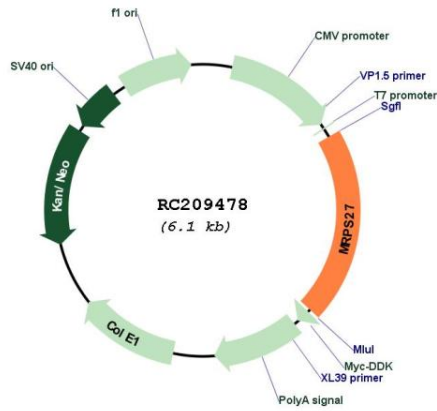
**UniProt ID:** [Q92552](#)

**Cytogenetics:** 5q13.2

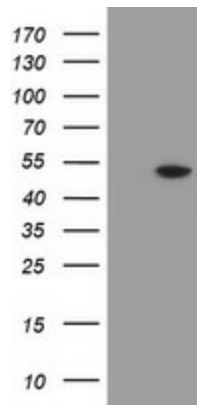
**MW:** 47.6 kDa

**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 28S subunit protein that may be a functional partner of the death associated protein 3 (DAP3). Alternative splicing results in multiple transcript variants encoding different isoforms. [provided by RefSeq, Nov 2013]

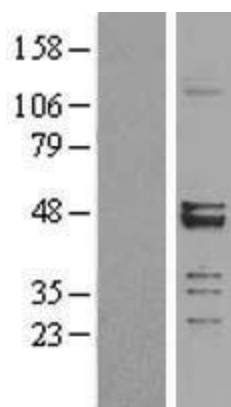
Product images:



Circular map for RC209478



HEK293T cells were transfected with the pCMV6-ENTRY control (Cat# [PS100001], Left lane) or pCMV6-ENTRY MRPS27 (Cat# RC209478, Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-MRPS27(Cat# [TA800244]). Positive lysates [LY402416] (100ug) and [LC402416] (20ug) can be purchased separately from OriGene.



Western blot validation of overexpression lysate (Cat# [LY402416]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC209478 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).