

## **Product datasheet for RG205803**

## RPS19 (NM 001022) Human Tagged ORF Clone

**Product data:** 

**Product Type:** Expression Plasmids

Product Name: RPS19 (NM\_001022) Human Tagged ORF Clone

Tag: TurboGFP

Symbol: RPS19

Synonyms: DBA; DBA1; eS19; LOH19CR1; S19

Mammalian Cell

Selection:

Neomycin

**Vector:** pCMV6-AC-GFP (PS100010)

E. coli Selection: Ampicillin (100 ug/mL)

ORF Nucleotide >RG205803 representing NM\_001022

Sequence: Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC

GCCGCGATCGCC

ATGCCTGGAGTTACTGTAAAAGACGTGAACCAGCAGGAGTTCGTCAGAGCTCTGGCAGCCTTCCTCAAAA AGTCCGGGAAGCTGAAAGTCCCCGAATGGGTGGATACCGTCAAGCTGGCCAAGCACAAAGAGCTTGCTCC CTACGATGAGAACTGGTTCTACACGCGAGCTGCTTCCACAGCGCGGCACCTGTACCTCCGGGGTGGCGCT GGGGTTGGCTCCATGACCAAGATCTATGGGGGACGTCAGAGAAACGGCGTCATGCCCAGCCACTTCAGCC GAGGCTCCAAGAGTGTGGCCCGCCGGGTCCTCCAAGCCCTGGAGGGGCTGAAAATGGTGGAAAAGGACCA AGATGGCGGCCGCAAACTGACACCTCAGGGACAAAGAGATCTGGACAGATCGCCGGACAGGTGGCAGCT

**GCCAACAAGAAGCAT** 

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >RG205803 representing NM\_001022

Red=Cloning site Green=Tags(s)

MPGVTVKDVNQQEFVRALAAFLKKSGKLKVPEWVDTVKLAKHKELAPYDENWFYTRAASTARHLYLRGGA GVGSMTKIYGGRQRNGVMPSHFSRGSKSVARRVLQALEGLKMVEKDQDGGRKLTPQGQRDLDRIAGQVAA

ANKKH

TRTRPLE - GFP Tag - V

Restriction Sites: Sgfl-Mlul



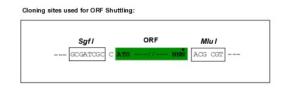
**OriGene Technologies, Inc.** 9620 Medical Center Drive, Ste 200

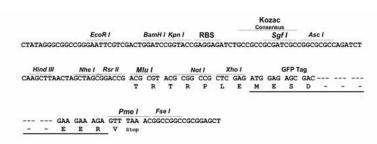
CN: techsupport@origene.cn

Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com

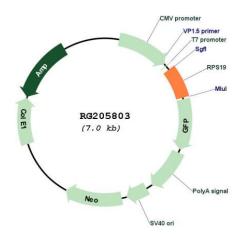


## **Cloning Scheme:**





## Plasmid Map:



**ACCN:** NM 001022

ORF Size: 435 bp

**OTI Disclaimer:** The molecular sequence of this clone aligns with the gene accession number as a point of

reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing

variants is recommended prior to use. More info

**OTI Annotation:** This clone was engineered to express the complete ORF with an expression tag. Expression

varies depending on the nature of the gene.



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).

**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:** <u>NM 001022.4</u>

 RefSeq Size:
 872 bp

 RefSeq ORF:
 438 bp

 Locus ID:
 6223

 UniProt ID:
 P39019

 Cytogenetics:
 19q13.2

**Domains:** Ribosomal\_S19e

**Protein Families:** Druggable Genome

Protein Pathways: Ribosome

**Gene Summary:** Ribosomes, the organelles that catalyze protein synthesis, consist of a small 40S subunit and

a large 60S subunit. Together these subunits are composed of 4 RNA species and

approximately 80 structurally distinct proteins. This gene encodes a ribosomal protein that is

a component of the 40S subunit. The protein belongs to the S19E family of ribosomal proteins. It is located in the cytoplasm. Mutations in this gene cause Diamond-Blackfan anemia (DBA), a constitutional erythroblastopenia characterized by absent or decreased erythroid precursors, in a subset of patients. This suggests a possible extra-ribosomal function for this gene in erythropoietic differentiation and proliferation, in addition to its ribosomal function. Higher expression levels of this gene in some primary colon carcinomas compared to matched normal colon tissues has been observed. As is typical for genes

encoding ribosomal proteins, there are multiple processed pseudogenes of this gene

dispersed through the genome. [provided by RefSeq, Jul 2008]