

## Product datasheet for **RG201967**

### ARSG (NM\_014960) Human Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	ARSG (NM_014960) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	ARSG
Synonyms:	USH4
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

**ORF Nucleotide Sequence:**

>RG201967 representing NM\_014960  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGGATCGCC**

ATGGGCTGGCTTTTTCTAAAGTTTTGTTGGCGGGAGTGAGTTTCTCAGGATTTCTTATCCTCTTGTTGG  
 ATTTTTGCATCAGTGGGAAAACAAGAGGACAGAAGCCAACTTTGTGATTATTTGGCCGATGACATGGG  
 GTGGGGTGACCTGGGAGCAAACCTGGGCAGAAAACAAGGACACTGCCAACCTTGATAAGATGGCTTCGGAG  
 GGAATGAGGTTTTGTGATTTCCATGCAGCTGCCTCCACCTGCTCACCTCCCGGGCTTCCTTGCTCACCG  
 GCCGGCTTGGCCTTCGCAATGGAGTCACACGCAACTTTGCAGTCACTTCTGTGGGAGGCCTTCGGCTCAA  
 CGAGACCACCTTGGCAGAGGTGCTGCAGCAGCGGGTTACGTCACTGGGATAATAGGCAATGGCATCTT  
 GGACACCAGGCTCTTATCACCCAACTCCGTGGTTTTGATTACTACTTTGGAATCCCATATAGCCATG  
 ATATGGGCTGACTGATACTCCAGGCTACAACCACCTCCTTGTCCAGCGTGTCCACAGGGTGATGGACC  
 ATCAAGGAACCTTCAAAGAGACTGTTACTGACGTGGCCCTCCCTCTTTATGAAAACCTCAACATTGTG  
 GAGCAGCCGGTGAACCTTGAAGCAGCTTGGCCAGAAGTATGCTGAGAAAGCAACCCAGTTCATCCAGCGTG  
 CAAGCACCAGCGGGAGGCCCTTCCTGCTCTATGTGGCTCTGGCCACATGCACGTGCCCTTACCTGTGAC  
 TCAGTACCAGCAGCGCCACGGGCGAGAAGCCTGTATGGTGCAGGGCTCTGGGAGATGGACAGTCTGGTG  
 GGCCAGATCAAGGACAAAGTTGACCACACAGTGAAGGAAAACACATTCCTCTGGTTTACAGGAGACAATG  
 GCCCGTGGGCTCAGAAGTGTGAGCTAGCGGGCAGTGTGGGTCCCTTCACTGGATTTTGGCAAACCTCGTCA  
 AGGGGGAAGTCCAGCCAAGCAGACGACCTGGGAAGGAGGGCACCGGGTCCCAGCACTGGCTTACTGGCCT  
 GGCAGAGTCCAGTTAATGTACCAGCACTGCCTTGTAAAGCGTGTGGACATTTTCCAACCTGTGGTGTG  
 CCCTGGCCAGGCCAGCTTACCTCAAGGACGGCGCTTTGATGGTGTGGAGCTCCGAGGTGCTCTTTGG  
 CCGGTACACAGCCTGGGCACAGGGTGTGTTCCACCCCAACAGCGGGCAGCTGGAGAGTTTGGAGCCCTG  
 CAGACTGTCCGCCTGGAGCGTTACAAGGCTTCTACATTACCGGTGGAGCCAGGGCGTGTGATGGGAGCA  
 CGGGGCTGAGCTGCAGCATAAGTTTCTCTGATTTTCAACCTGGAAGACGATACCGCAGAAGCTGTGCC  
 CCTAGAAAAGAGGTGGTGCAGGAGTACCAGGCTGTGCTGCCCGAGGTGAGAAAGTTCTTGCAGACGCTCTC  
 CAAGACATTGCCAACGACAACATCTCCAGCGCAGATTACTCAGGACCCTTCACTAACCTCCCTGCTGTA  
 ATCCCTACCAAATTGCCTGCCGCTGTCAAGCCGCA

**ACGCGTACGCGGCCGCTCGAG** - GFP Tag - GTTTAA

**Protein Sequence:**

>RG201967 representing NM\_014960  
 Red=Cloning site Green=Tags(s)

MGWFLKLVLLAGVSFSGFLYPLVDFCISGKTRGQKPNFVILADDMGWDLGANWAETKDTANLDMKASE  
 GMRFVDFHAAASTCSPSRASLLTGRLGLRNGVTRNFAVTSVGGPLPLNETTLAEVLQAGYVTGIIGKWHL  
 GHHGSYHPNFRGFDYFIPYSHDMGCTDTPGYNHPPCPACPDGSPRNLQRDCYTDVALPLYENLNIV  
 EQPVNLSLAQKYAEKATQFIQRASTSGRPFLLYVALAHMHVPLPVTQLPAAPRGRSLYAGLWEMDSL  
 GQIKDKVDHTVKENTFLWFTGDNWPWAQKCELAGSVGPF TGFQWTRQGGSPAKQTTWEGGHRVPALAYWP  
 GRVPVNVSTALLSVLDIFPTVVALAQASLPQGRRF DGVDVSEVLFGRSQPGRVLFHPNSGAAGEFGAL  
 QTVRLERYKAFYITGGARACDGTGPELQHKFPLIFNLEDDTAEAVPLERGAQYAVLPEVRKVLADVL  
 QDIANDNISSADYTDPSVTPCCNPYQIACRCQAA

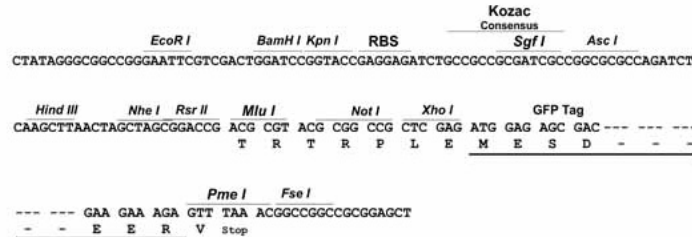
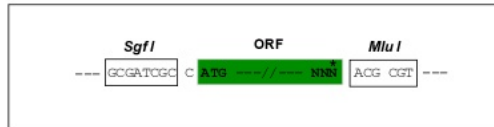
**TRTRPLE** - GFP Tag - V

**Restriction Sites:**

Sgfl-MluI

**Cloning Scheme:**

Cloning sites used for ORF Shutting:


**ACCN:** NM\_014960

**ORF Size:** 1575 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:** [NM\\_014960.5](#)
**RefSeq Size:** 2028 bp

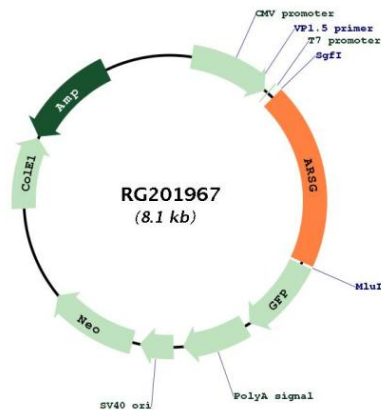
**RefSeq ORF:** 1578 bp

**Locus ID:** 22901

**UniProt ID:** [Q96EG1](#)
**Cytogenetics:** 17q24.2

Domains:	Sulfatase
Protein Families:	Druggable Genome
Protein Pathways:	Lysosome
Gene Summary:	The protein encoded by this gene belongs to the sulfatase enzyme family. Sulfatases hydrolyze sulfate esters from sulfated steroids, carbohydrates, proteoglycans, and glycolipids. They are involved in hormone biosynthesis, modulation of cell signaling, and degradation of macromolecules. This protein displays arylsulfatase activity at acidic pH, as is typical of lysosomal sulfatases, and has been shown to localize in the lysosomes. Alternatively spliced transcript variants have been found for this gene. [provided by RefSeq, Jun 2012]

### Product images:



Circular map for RG201967