

## Product datasheet for **RG235166**

### REST (NM\_001193508) Human Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	REST (NM_001193508) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	REST
Synonyms:	DFNA27; GINGF5; HGF5; NRSF; WT6; XBR
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)
ORF Nucleotide Sequence:	>RG235166 representing NM_001193508 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**CGATCGCC**

ATGGCCACCCAGGTAATGGGGCAGTCTTCTGGAGGAGGAGGGCTGTTTACCAGCAGTGGCAACATTGGAA  
TGGCCCTGCCTAACGACATGTATGACTTGCATGACCTTCCAAAGCTGAACTGGCCGCACCTCAGCTTAT  
TATGCTGGCAAATGTGGCCTTAAGTGGGAAGTAAATGGCAGCTGCTGTGATTACCTGGTCGGTGAAGAA  
AGACAGATGGCAGAACTGATGCCGGTGGGGATAACAACCTTTCAGATAGTGAAGAAGGAGAAGGACTTG  
AAGAGTCTGCTGATATAAAAGGTGAACCTCATGGACTGGAAAACATGGAAGTGAAGTTTGAAGTCTCAG  
CGTCGTAGAACCTCAGCCTGATTTGAGGCATCAGGTGCTCCAGATATTTACAGTTCAAATAAAGATCTT  
CCCCCTGAAACACCTGGAGCGGAGGACAAAGGCAAGAGCTCGAAGACCAACCCTTTCGCTGTAAGCCAT  
GCCAATATGAAGCAGAATCTGAAGAACAGTTTGTGCATCACATCAGAGTTCACAGTGCTAAGAAATTTT  
TGTGGAAGAGAGTGCAGAGAAGCAGGCAAAAGCCAGGGAATCTGGCTCTTCCACTGCAGAAGAGGGAGAT  
TTCTCCAAGGGCCCCATTCGCTGTGACCGCTGCGGCTACAATACTAATCGATATGATCACTATACAGCAC  
ACCTGAAACACCACACCAGAGCTGGGGATAATGAGCGAGTCTACAAGTGTATCATTTGCACATACACAAC  
AGTGAGCGAGTATCACTGGAGGAAACATTTAAGAAACATTTTCCAAGGAAAGTATACACATGTGGAAAA  
TGCAACTATTTTTCAGACAGAAAAACAATTATGTTTCAGCATGTTAGAAGTCTACAGGAGAACGCCCAT  
ATAAATGTGAACCTTTCCTTACTCAAGTTCTCAGAAGACTCATCTAACTAGACATATGCGTACTCATT  
AGGTGAGAAGCCATTTAATGTGATCAGTGCAGTTATGTGGCCTTAATCAACATGAAGTAAACCCGCCAT  
GCAAGACAGGTTCAATGGCCCTAAACCTCTTAATTGCCACACTGTGATTACAAAACAGCAGATAGAA  
GCAACTTCAAAAAACATGTAGAGCTACATGTGAACCCACGGCAGTTCAATTGCCCTGTATGTGACTATGC  
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GATGTCTCAAAGTGAACCTAAAGAAAACAAAAACGAGAGGCTGACTTGCCTGATAATATTACCAATG  
AAAAACAGAAATAGAACAAACAAAAATAAAGGGGATGTGGCTGAAAAGAAAAATGAAAAGTCCGTCAA  
AGCAGAGAAAAGAGATGTCTCAAAGAGAAAAAGCCTTCTAATAATGTGTCAGTATCCAGTGACTACC



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AGAACTCGAAAATCAGTAACAGAGGTGAAAGAGATGGATGTGCATACAGGAAGCAATTCAGAAAAATTCAGT  
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 CACCACCCTGCCAAAGGAAAATTTAAGAGAAGAGGCATCAGGAGACCAAAAATTAACAACACAGGTGA  
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 TGATGATTCTGGATTGCATGGGGCTCGGCCAGTTCACACAAGAATCTAGCAGAAAAAATGCAAAGGAAGCC  
 TTGGCAGTCAAAGCGGCTAAGGGAGATTTGTTTGTATCTTGTGATGTTCTTTCAGAAAGGGAAAAAG  
 ATTACAGCAAACCTCAATCGCCATTTGGTTAATGTGTACTATCTTGAAGAAGCAGCTCAAGGGCAGGA  
 G

ACGCGTACGCGGCCGCTCGAG – GFP Tag – GTTTAA

**Protein Sequence:**

>RG235166 representing NM\_001193508  
 Red=Cloning site Green=Tags(s)

MATQVMGQSSGGGLFTSSGNIGMALPNDMYDLHDL SKAELAAPQLIMLANVALTGEVNGSCCDYLVGEE  
 RQMAELMPVGDNNFSDSEEGLEESADIKGEPHLENMELRLEL SVVEPQPVF EASGAPDIYSSNKDL  
 PPETPGAEDKKGSSKTKPFRCKPCQYEAEESEQFVHHIRVHSAKFFVEESA EKQAKARESGSSTAEED  
 FSKGPIRCDRCGYNTNRYDHYTAHLKHHTRAGDNERVYKCI ICTYTTVSEYHWRKHLRNHFPRKVYTCGK  
 CNYFSDRKNNYVQHVRHTHTGERPYKCELCYSSSQKTHL TRHMRTHS GEKPFKCDQCSYVASNQHEVTRH  
 ARQVHNGPKPLNCPHCDYKTADRSNFKKHVELHVNPRQFNCPVCDYAASKCNLQYHFKSKHPTCPNKT  
 DVSKVKLKKTKKREADLPDNITNEKTEIEQTKIKGDVAGKKNEKSVKAEKRDVSKKPKSPNNVSIQVTT  
 RTRKSVTEVKEMDVHTGNSSEKFSKTKKSKRKLVDVSHSLHGPVNDEESSTKTKKVEKSKNNSQEVPK  
 GDSKVEENKQNTCMKSTKTKLTKNSKSKSPPQKEPVEKGS AQMDPPQMPAPTEAVQKGPVQVEP  
 PPPMEHAQMEGAQIRPAPDEPVQMEVVQEGPAQKELLPPVEPAQMVGAQIVLAHME LPPPMETAQTEVAQ  
 MGPAPMEPAQMEVAQVESAPMQVVQKEPVQME LSPPMVVQKEPVQIELSPPMEVVQKEPVKIELSPPIE  
 VVQKEPVQME LSPPMGVVQKEPAQREPPPPREPPLHMEPI SKKPPLRKDKKEKSNMQSERARKEQV LIEV  
 GLVPVKDSWLLKESVSTEDLSPSPPLPKENLREEASGDQKLLNTGEGNKEAPLQKVGAEEADESLPGLA  
 ANINESTHISSSGQNLNTEGETLNGKHQTD SIVCEMKMDTDQNTRENLTGINSTVEEPVSPMLPPSAVE  
 EREAVSKTALASPPATMAANESQIDEDEGIHSHEGSDLSDNMSEGSDDSGLHGARPVPQESSRKNKAE  
 LAVKAAKGDFVCIFCDRSFRKGDYSKHLNRHLVNVYYLEEAAQQQE

TRTRPLE – GFP Tag – V

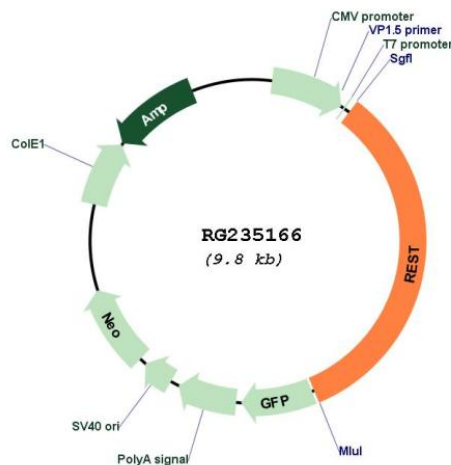
**Restriction Sites:**

Sgfl-MluI

Cloning Scheme:



Plasmid Map:



ACCN: NM\_001193508

ORF Size: 3291 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.

<b>Components:</b>	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).
<b>Reconstitution Method:</b>	<ol style="list-style-type: none"><li>1. Centrifuge at 5,000xg for 5min.</li><li>2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.</li><li>3. Close the tube and incubate for 10 minutes at room temperature.</li><li>4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.</li><li>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.</li></ol>
<b>RefSeq:</b>	<u><a href="#">NM_001193508.1</a></u> , <u><a href="#">NP_001180437.1</a></u>
<b>RefSeq Size:</b>	7122 bp
<b>RefSeq ORF:</b>	3294 bp
<b>Locus ID:</b>	5978
<b>UniProt ID:</b>	<u><a href="#">Q13127</a></u>
<b>Cytogenetics:</b>	4q12
<b>Protein Families:</b>	Transcription Factors
<b>Protein Pathways:</b>	Huntington's disease
<b>Gene Summary:</b>	This gene was initially identified as a transcriptional repressor that represses neuronal genes in non-neuronal tissues. However, depending on the cellular context, this gene can act as either an oncogene or a tumor suppressor. The encoded protein is a member of the Kruppel-type zinc finger transcription factor family. It represses transcription by binding a DNA sequence element called the neuron-restrictive silencer element. The protein is also found in undifferentiated neuronal progenitor cells and it is thought that this repressor may act as a master negative regulator of neurogenesis. Alternatively spliced transcript variants have been described. [provided by RefSeq, May 2018]