

Product datasheet for **RG205380**

Rb2 p130 (RBL2) (NM_005611) Human Tagged ORF Clone

Product data:

| | |
|---------------------------|---|
| Product Type: | Expression Plasmids |
| Product Name: | Rb2 p130 (RBL2) (NM_005611) Human Tagged ORF Clone |
| Tag: | TurboGFP |
| Symbol: | Rb2 p130 |
| Synonyms: | P130; Rb2 |
| Mammalian Cell Selection: | Neomycin |
| Vector: | pCMV6-AC-GFP (PS100010) |
| E. coli Selection: | Ampicillin (100 ug/mL) |
| ORF Nucleotide Sequence: | >RG205380 representing NM_005611 Red=Cloning site Blue=ORF Green=Tags(s) |

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GCC**CGATCGCC**

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CATTTTCGTTTTGCGGAGATGCTTTACTATAAAGTATTAGAATCTGTTATTGAGCAGGAACAAAAAGAC
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ACGCGTACGCGGCCGCTCGAG – GFP Tag – GTTTAA

Protein Sequence:

>RG205380 representing NM_005611
 Red=Cloning site Green=Tags(s)

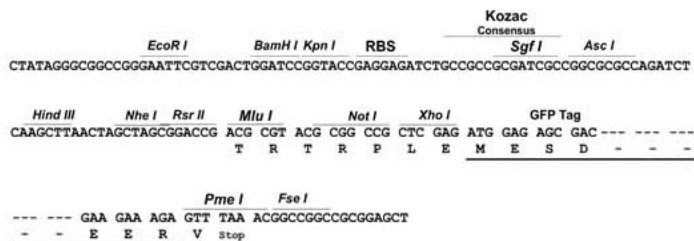
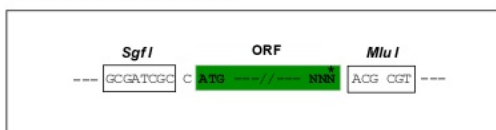
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 SSAPPTPRTL T GANS DM EEEERGLIQFYNNIYIKQIKTFAMKY SQANMDAPPLSPYFVRTGSPRRIQL
 SQNHPVYISPHKNETMLSPREKIFYYFSNSPSKRLREINSMIHTGETPTKKRGILLEDGSESPAKRICPE
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TRTRPLE – GFP Tag – V

Restriction Sites: SgfI-MluI

Cloning Scheme:

Cloning sites used for ORF Shuttling:



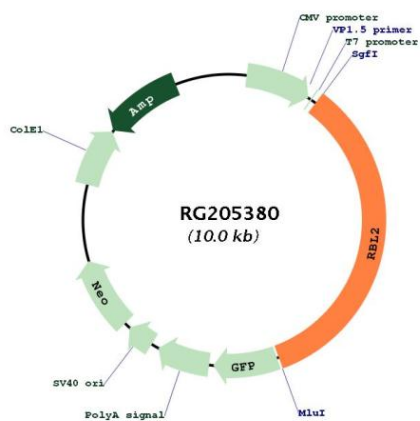
ACCN: NM_005611

ORF Size: 3417 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](#)

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| 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: | <ol style="list-style-type: none">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_005611.2 , NP_005602.2 |
| RefSeq Size: | 4853 bp |
| RefSeq ORF: | 3420 bp |
| Locus ID: | 5934 |
| UniProt ID: | Q08999 |
| Cytogenetics: | 16q12.2 |
| Domains: | RB_B, RB_A, CYCLIN |
| Protein Families: | Druggable Genome, Transcription Factors |
| Protein Pathways: | Cell cycle, TGF-beta signaling pathway |
| Gene Summary: | Key regulator of entry into cell division. Directly involved in heterochromatin formation by maintaining overall chromatin structure and, in particular, that of constitutive heterochromatin by stabilizing histone methylation. Recruits and targets histone methyltransferases KMT5B and KMT5C, leading to epigenetic transcriptional repression. Controls histone H4 'Lys-20' trimethylation. Probably acts as a transcription repressor by recruiting chromatin-modifying enzymes to promoters. Potent inhibitor of E2F-mediated trans-activation, associates preferentially with E2F5. Binds to cyclins A and E. Binds to and may be involved in the transforming capacity of the adenovirus E1A protein. May act as a tumor suppressor.[UniProtKB/Swiss-Prot Function] |

Product images:



Circular map for RG205380