

## Product datasheet for **RG228405**

### **RANBP3L (NM\_001161429) Human Tagged ORF Clone**

#### Product data:

|                           |                         |
|---------------------------|-------------------------|
| <b>Product Type:</b>      | Expression Plasmids     |
| <b>Tag:</b>               | TurboGFP                |
| <b>Symbol:</b>            | RANBP3L                 |
| <b>Mammalian Cell</b>     | Neomycin                |
| <b>Selection:</b>         |                         |
| <b>Vector:</b>            | pCMV6-AC-GFP (PS100010) |
| <b>E. coli Selection:</b> | Ampicillin (100 ug/mL)  |

**ORF Nucleotide Sequence:** >RG228405 representing NM\_001161429  
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**CGCATCGC**C

ATGACTACCATACCAAGAAAAGGCAGCAGCCACCTGCCTGGCAGTTTGCACACCTGTAACCTGAAGCTGC  
AGGAGGACCGGCGACAGCAAGAAAAATCTGTCATTGCTCAACCCATATTTGTTTTGAAAAGGGAGAACA  
AACTTTTAAGAGACCTGCAGAAGACACCCTGTATGAAGCAGCAGAACCAAGATGTAATGGTTTTCCAACA  
AAGCGTGACGGTCTTCATCTTTTACTTTTCATATTACAGATTCTCAGTCCCAGGGAGTGCAACCTTGT  
CTCAGAAGCAATGAGATGTTTCATCCGTCCTAACCCTCCCAACCTTCCCCATTCTGGGCCAGTGAGGAA  
AAACAATGTTTTATGACATCAGCTCTTGTGCAAGTAGTGTGATATAAGAGTGCTGAACAAGTCTCT  
GTGAAACATTCTAAACATGTTATTAGACCTGCTATTTTGCAGCTACCTCAAGCTCGAAGTTGTGCAAAAG  
TAAGAAAAACATTTGGACACAAGGCACTGGAATCTTGCAAGACTAAAGAAAAACAATAATAAGATTTTC  
TGAGGGAAATTCCTATTTGTTAAGTGAATTTATCAAGGGCTAGAATTCAGTCCAGCTGTCTACTAAC  
CAGGACTTTTTAGGTGCAACATCAGTAGGATGTCAACCAATGAAGATAAATGTTCTTTTAAAGCTGCA  
GTTCCAATTTTGTGTTTGGAGAAAACATGGTAGAAAGAGTTTTGGGTACTCAAAAACTCACCAGCCTCA  
ACTTGAATGATTGATGATGCAAGGAAAAACCATTCAAATCCATTCCGAAATTTCTGTCAACTTTTTTA  
AGTTCAAGAACAGACTCTATTAATAACTTCCCTAATTGAATCAGCTGCTGCATTCTCTTCCCAACCAT  
CACGAAATGCTTGTGCTGGAGAAAATGATGTTATAACAGGGGAGGAAACAGAACATAATGTGTTAAGAT  
AACTGCAAGCTTTTCATATTCAACAAAAACAACAATCCTGGATTGAAAGGGGAGAGGAACGTTGAGA  
CTGAATGACACAGCAAGCACTGACTGTGGAACATTACAGTCAAGACTAATTATGCGCAATCAAGGCAGTC  
TAAGGTGATCCTCAACAGCAAACTCTGGGCCCAATGAAGATTCAAGAGCAAACCACAAAAATGTACG  
AATAACAGCTACTGATTAGAAGACTATAGCATCAAAATATTTTAAATTCAGGCCAGTGCCCAAGATACA  
GCATATTTGTATGCAGCAATACATCATCGTCTTGTGCACTTCAAAGCTTCAATAAGCAGAGAGATGTCA  
ATCAAGCTGAAAGCCTGTCAGAAACAGCCCAACAATTGAACTGCGAAAGCTGTGATGAGAATGAGGATGA  
TTTCATCCAAGTCACTAAAAATGGATCAGATCCTTCTAGTTGGACTCACAGACAGTCGGTTGCCCTGTTCA

**ACGCGTACGCGGCCGCTCGAG** - GFP Tag - GTTTAA



**Protein Sequence:**

>RG228405 representing NM\_001161429

Red=Cloning site Green=Tags(s)

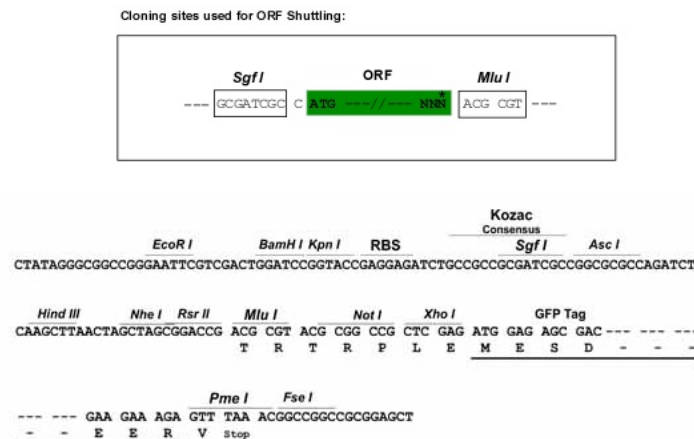
MTTIPRKGGSSHLPGSLHTCKLKLQEDRRQKEKSVIAQPIFVFEKGEQTFKRPAEDTLYEAAEPECNGFPT  
KRVRSSSTFFHITDSQSQGVSTLSQKQMRCSSTNLPTFPHSGPVRKNNVMTSALVQSSVDIKSAEQGP  
VKHSHVIRPAILQLPQARSCAKVRKTFGHKALESCCKTEKTNKISEGNSYLLSENLSRARISVLSTN  
QDFLGATSVGCQPNEDKCSFKSCSSNFVFGENMVERVLGTQKLTPQLENDYAKEKPFKSIPKFPVNF  
SSRTDSIKNTSLIESAAAFSSQPSRKCLLEKIDVITGEETEHNVLKINCKLIFNKTTQSWIERGRGTLR  
LNDTASTDCGTLQSRLIMRNQGLRLILNSKLWAQMKIQRANHKNVRITATDLEDYSIKIFLIQASAQDT  
AYLYAAIHRLVALQSFNKQRDVNQAESLSETAQQLNCECDENEDDFIQVTKNGSDPSSWTHRQSVACS

TRTRPLE - GFP Tag - V

**Restriction Sites:**

SgfI-MluI

**Cloning Scheme:**



**ACCN:**

NM\_001161429

**ORF Size:**

1470 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:**

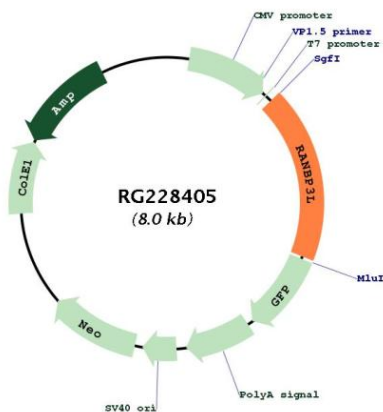
This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

**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).

|                               |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|-------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <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>Note:</b>                  | Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.                                                                                                                                                                                                                                                                                                                                                                                                |
| <b>RefSeq:</b>                | <u>NM_001161429.3</u>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| <b>RefSeq Size:</b>           | 2635 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| <b>RefSeq ORF:</b>            | 1473 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| <b>Locus ID:</b>              | 202151                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| <b>UniProt ID:</b>            | <u>Q86VV4</u>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| <b>Cytogenetics:</b>          | 5p13.2                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| <b>Gene Summary:</b>          | Nuclear export factor for BMP-specific SMAD1/5/8 that plays a critical role in terminating BMP signaling and regulating mesenchymal stem cell differentiation by blocking osteoblast differentiation to promote myogenic differentiation. Directly recognizes dephosphorylated SMAD1/5/8 and mediates their nuclear export in a Ran-dependent manner.[UniProtKB/Swiss-Prot Function]                                                                                                                                    |

## Product images:



Circular map for RG228405