

Product datasheet for **RG203842**

Granuphilin (SYTL4) (NM_080737) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Granuphilin (SYTL4) (NM_080737) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	Granuphilin
Synonyms:	SLP4
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

ORF Nucleotide Sequence:

>RG203842 representing NM_080737
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGGATCGCC**

ATGTCGGAGTTACTGGACCTTTCTTTCTGTCTGAGGAGGAAAAGGATTTGATTCTCAGTGTCTACAGC
 GAGATGAAGAGGTCCGGAAGCAGATGAGAAAAGGATTAGGCGACTAAAGAATGAGTTACTGGAGATAAA
 AAGGAAAGGGGCCAAGAGGGGCAGCCAACACTACAGTGATCGGACCTGTGCCCGGTGCCAGGAGAGCCTG
 GGCCGTTTGAGTCCAAAACCAATACTGTGGGGTTGTAATCACCTGGTGTGTCGGGACTGCCGCATAC
 AGGAAAGCAATGGTACCTGGAGGTGCAAGGTGTGCGCCAAGGAAATAGAGTTGAAGAAAGCAACTGGGGA
 CTGGTTTTATGACCAGAAAGTGAATCGCTTTGCTTACCGCACAGGTAGTGAGATAATCAGGATGTCCCTG
 CGCCACAAACCTGCAGTGAGTAAAAGAGAGACAGTGGGACAGTCCCTCCTCATCAGACACAGATGGGTG
 ACATCTGGCCAGGAAGAAAGATCATTGAGGAGCGGCAGAAAGGAGCCAGTGTGCTATTTGAAGTGCCAAA
 GCTGAAAAGTGGAAAGAGTGCATTGGAAGCTGAGAGTGAAGTCTGGATAGCTTACAGCTGACTCGGAT
 AGCACCTCCAGGAGAGACTCTCTGGATAAATCTGGCCTCTTCCAGAATGGAAGAAGATGTCTGCTCCCA
 AATCTCAAGTAGAAAAGGAAACTCAGCCTGGAGGTCAAAATGTGGTATTTGTGGATGAGGGTGAGATGAT
 ATTTAAGAAGAACCAGAAAAATCCTCAGGCCTTACAGTACACTAAATCTGTGATAGATCTTCGCCCA
 GAAGATGTGGTACATGAAAGTGGCTCCTTGGGAGACAGAAGCAAAATCCGTCACAGGCCTCAATGTGGATA
 TGGAAAGAGGAAGAAGAAGAAGACATTGACCACCTAGTGAAGTTACATCGCCAGAAGCTAGCCAGAAG
 CAGCATGCAAAGTGGCTCCTCCATGAGTACGATCGGCAGCATGATGAGCATCTACAGTGAAGCTGGTGAT
 TTCGGGAACATCTTTGTGACTGGCAGGATTGCCTTTCCCTGAAGTATGAGCAGCAAACCCAGAGTCTGG
 TTGTCCATGTGAAGGAGTGCCATCAGCTGGCCTATGCTGATGAAGCCAAGAAGCGCTCTAACCCATATGT
 GAAGACTTACCTTCTGCCTGACAAGTCCCGCCAAGGAAAAAGAAAAACCAGCATCAAGCGGGACACTGTT
 AATCCACTATATGATGAGACGCTGAGGTATGAGATCCCAGAATCTCTCCTGGCCCAGAGGACCTGCAGT
 TCTCAGTTTGGCATCATGGTCGTTTTGGCAGAAACACTTTCTTGGAGAGGCAGAGATCCAGATGGATTC
 CTGGAAGCTTGATAAGAACTGGATCATTGCCTCCCTTACATGGAAAGATCAGTGTGAGTCCCGGACT
 GGCTTGCCATCACACAAAGGCGAGTTGGTGGTTTCATTGAAATACATCCCAGCCTCCAAAACCCCTGTTG
 GAGGTGACCGGAAAAAGAGTAAAGGTGGGAAGGGGAGAGCTCCAGGTGTGGATCAAAGAAGCCAAGAA
 CTTGACGGCTGCCAAAGCAGGAGGGACTTCAGACAGCTTTGTCAAGGGATACCTCCTCCCATGAGGAAC
 AAGGCCAGTAAACGTAAACTCCTGTGATGAAGAAGACCCTGAATCCTCACTACAACCATACATTTGTCT
 ACAATGGTGTGAGGCTGGAAGATCTACAGCATATGTGCCTGGAAGTACTGTGTGGGACCGGGAGCCCT
 GGCCAGCAATGACTTCTGGGAGGGGTCAGGCTGGGTGTTGGCACTGGGATCAGTAATGGGGAAGTGGTG
 GACTGGATGGACTCGACTGGGGAAGAAGTGAAGCTGTGGCAGAAGATGCGACAGTACCGAGGCTCTTGGG
 CAGAAGGGACTCTGCAGCTCCGTTCTCAATGGCCAAGCAGAAGCTGGGTTTA

ACGCGTACGCGGGCCGCTCGAG – GFP Tag – GTTTAA

Protein Sequence: >RG203842 representing NM_080737
 Red=Cloning site Green=Tags(s)

MSELLDL SFLSEEEKDL ILSVLQRDEEVKKADEKRIRRLKNELLEIKRKGAKRGSQHYSDRTCARCQESL
 GRLSPKTNTCRGCNHLVCRDCRIQESNGTWRCKVCAKEIELKKGATGDFYDQKVNRFAYRTGSEIIRMSL
 RHKPAVSKRET VGQSL LHQTQMGDIWPRKIIQERQKEPSVLFEVPKLKS GKSALEAESESLDSFTADSD
 STSRRDSL DKSGLFPEWKKMSAPK SQVEKETQPGGQNVV FVDEGEMIFKKNTRKILRPSEYTKSVIDL RP
 EDVVHESGLGDRSKSVPLNVDMEEEEEEDIDHLVKLHRQKLARSSMQSGSSMSTIGSMMSIYSEAGD
 FGNIFVTGRIAFSLKYEQQTQSLVHVHKECHQLAYADEAKKRSNPYVKTYLLPDKSRQGRKRTSIKRDTV
 NPLYDETLRYEIPESLLAQRTLQFSVWHHGRFGRNTFLGEAEIQMDSWKLDKKLDHCLPLHGKISAESPT
 GLPSHGELVVS LKYIPASKTPVGGDRKSKGEGGELQVWIKEAKNL TAAKAGGTSDFS VKGYLLPMRN
 KASKRKT PVMKKTLPNPHNHTFVYNGVRLLEDLQHMCL ELTVWDREPLASNDFLGGVRLGVGTGISNGEVV
 DWMDSTGEEVSLWQKMRQYPGSWAEGTLQLRSSMAKQKLG L

TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN: NM_080737

ORF Size: 2013 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_080737.1](#), [NP_542775.1](#)

RefSeq Size: 3914 bp

RefSeq ORF: 2016 bp

Locus ID: 94121

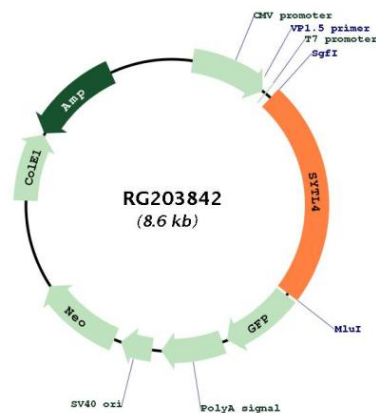
UniProt ID: [Q96C24](#)

Cytogenetics: Xq22.1

Domains: C2, RPH3A_effector

Gene Summary: This gene encodes a member of the synaptotagmin like protein family. Members of this family are characterized by an N-terminal Rab27 binding domain and C-terminal tandem C2 domains. The encoded protein binds specific small Rab GTPases and is involved in intracellular membrane trafficking. This protein binds Rab27 and may be involved in inhibiting dense core vesicle exocytosis. Alternate splicing results in multiple transcript variants that encode the same protein. [provided by RefSeq, Mar 2010]

Product images:



Circular map for RG203842