

Product datasheet for **RG216845**

ARHGEF4 (NM_032995) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Tag:	TurboGFP
Symbol:	ARHGEF4
Synonyms:	ASEF; ASEF1; GEF4; STM6
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

ORF Nucleotide Sequence: >RG216845 representing NM_032995
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCCGCGATCGCC

ATGCCCTGGGAAGAACCAGCAGGTGAGAAGCCCAGTTGCTCTCACAGTCAGAAGCGTTCCACATGGAGC
 CTGCCCAGAAGCCCTGCTTCACCACTGACATGGTGACATGGGCCCTCCTCTGCATCTCTGCAGAGACTGT
 GCGTGGGGGAGGCTCCTTCACAGCCTAGGGGCATCCCTACCGCTCGCCCGTCAGTGTGGATGACCTGTGG
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 GCGGAAGCGGAGACTTGAGAACATCGACAAGATTGCTCAGTGGCAGAGCTCCATAGAGGACTGGGAGGGA
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 GGTGACAGTGGACAGGAGACAGGCTTCTCCATCACTGAACTGCAGAGGAAGCAGGCCATGCTGAATGCC
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ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

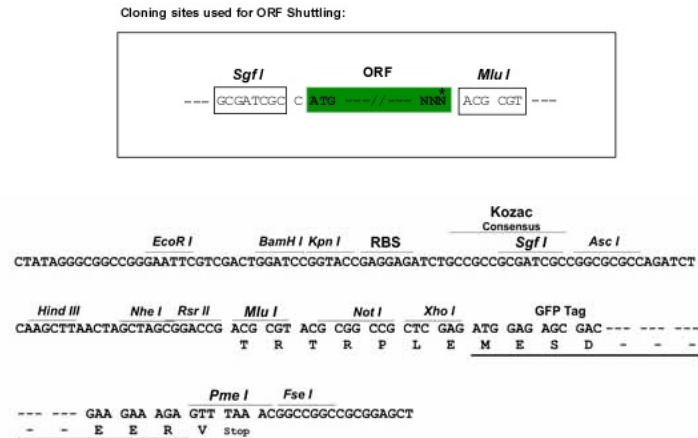
Protein Sequence: >RG216845 representing NM_032995
 Red=Cloning site Green=Tags(s)

MPWEEPAGEKPSCHSQKAFHMEPAQKPCFTTDMVTWALLCISAETVRGEAPSQPRGIPHRSPVSVDDLW
 LEKTQRKKLQKAHVERRLHIGAVHKDGVKWRKTIITSPESLNLPRRSHPLSQSAPTGLNHMGWPEHTP
 GTAMPDGLDITAVCADEVGSEEDLYDDLHSSSHHYSHPGGGGQLAINELISDGSVVCAEALWDHVTMDD
 QELGFKAGDVEVMDATNREWWGRVADGEGWFPASFVRLRVNQDEPADDDAPLAGNSGAEDGGAEQSS
 KDQMRTNVINEILSTERDYIKHLRDICEGYVRQCRKRAMFSEEQLRTIFGNIEDIYRCQKAFVKALEQR
 FNRERPHLSELGACFLEHQADFQIYSEYCNHNPACVELSRLTKLSKYVYFEEACRLLQKMIDISLDGFL
 LTPVQKICKYPLQLAELLKYTHPQHRDFKDVEAALHAMKNVAQLINERKRRLNIDKIAQWQSSIEDWEG
 EDLLVRSSSELIYSSELTRVTQPAKQQRMFFLFDHQLIYCKKDLLRRDVLYYKGRLLMDGLEVDLEDG
 KDRDLHVSIIKNAFRLHRGATGDSHLLCTRKEQKQRLKAFAREREQVQLDQETGFSITELQRKQAMLNA
 SKQQVTGKPKGRRTAAPPRLPGYPADIIPFSEPQSQAS

TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN: NM_032995

ORF Size: 2010 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.

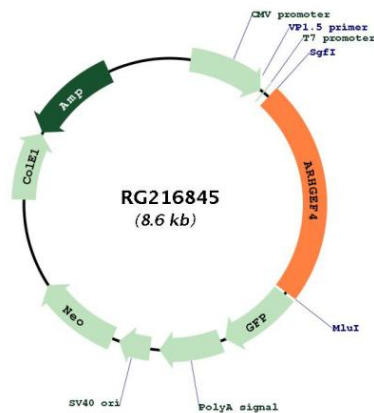
Note: Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.

RefSeq: [NM_032995.2](#), [NP_127462.1](#)

RefSeq Size: 4258 bp

RefSeq ORF:	2013 bp
Locus ID:	50649
UniProt ID:	Q9NR80
Cytogenetics:	2q21.1
Protein Families:	Druggable Genome
Protein Pathways:	Regulation of actin cytoskeleton
Gene Summary:	Rho GTPases play a fundamental role in numerous cellular processes that are initiated by extracellular stimuli that work through G protein coupled receptors. The protein encoded by this gene may form complex with G proteins and stimulate Rho-dependent signals. Multiple alternatively spliced transcript variants encoding different isoforms have been found, but the full-length nature of some variants has not been determined. [provided by RefSeq, Jun 2013]

Product images:



Circular map for RG216845