

Product datasheet for RC201819

Synaptogyrin 2 (SYNGR2) (NM_004710) Human Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: Synaptogyrin 2 (SYNGR2) (NM_004710) Human Tagged ORF Clone
Tag: Myc-DDK
Symbol: Synaptogyrin 2
Mammalian Cell Selection: Neomycin
Vector: pCMV6-Entry (PS100001)
E. coli Selection: Kanamycin (25 ug/mL)
ORF Nucleotide Sequence: >RC201819 ORF sequence
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGATCGCC**

ATGGAGAGCGGGCCTACGGCGCGGCCAAGCGGGCGGCTCCTTCGACCTGCGGCGCTTCTGACGCAGC
 CGCAGGTGGTGGCGCGCCCGTGTGCTTGGTCTTCGCCTTGATCGTGTTCTCTGCATCTATGGTGGGG
 CTACAGCAATGCCACGAGTCTAAGCAGATGACTGCGTGTTCAACCGCAACGAGGATGCCTGCCGCTAT
 GGCAGTGCATCGGGGTGCTGGCCTTCTGGCCTCGGCCCTTCTTCTTGGTGGTGCAGCGTATTTCCCCC
 AGATCAGCAACGCCACTGACCGCAAGTACCTGGTCAATTGGTGACCTGCTTCTCAGCTCTGGACCT
 CCTGTGGTTTGTGGTTTCTGCTTCTCCTACCAACCAAGTGGGCAAGTCAACCAACCGAAGGACGTGCTGGT
 GGGCCGACTCTGTGAGGGCAGCCATCACCTTCAGCTTCTTTCCATCTTCTCCTGGGGTGTGCTGGCCT
 CCCTGGCCTACCAGCGCTACAAGGCTGGCGTGGACGACTTCATCCAGAATTACGTTGACCCCACTCCGGA
 CCCCACACTGCCTACGCCTCTACCCAGGTGCATCTGTGGACAACCAACAGCCACCCTTACCCAG
 AACCGGGAGACCACCGAGGGCTACCAGCCGCCCTGTGTAC

AG**CGGACCG**ACGCGTACGGCGCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCC
 TGGATTACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RC201819 protein sequence
 Red=Cloning site Green=Tags(s)

MESGAYGAAKAGGSFDLRRFLTQPQVVARAVCLVFALIVFSCIYEGEYSNAHESKQMYCVFNRNEDACRY
 GSAIGVLAFLASAFFLVVDAYFPQISNATDRKYLVIIGDLLFSALWTFWLVGFCFLTQWAVTNPKDVLV
 GADSVRAAITFSFFSIFSWGLASLAYQRYKAGVDDFIQNYVDPTPDPNTAYASYPGASVDNYQQPPFTQ
 NAETTEGYQPPVY

SGP**TRTRPLEQKLI**SEEDLAANDILDYKDDDDKV



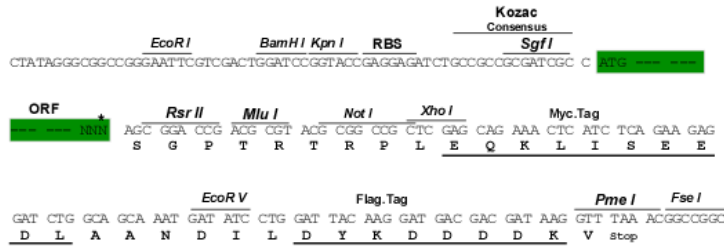
[View online »](#)

Chromatograms: https://cdn.origene.com/chromatograms/mk6614_a08.zip

Restriction Sites: SgfI-RsrII

Cloning Scheme:

Cloning sites used for ORF Shuttling:



* The last codon before the Stop codon of the ORF

ACCN: NM_004710

ORF Size: 672 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_004710.7](#)

RefSeq Size: 1694 bp

RefSeq ORF: 675 bp

Locus ID: 9144

UniProt ID: [O43760](#)

Cytogenetics: 17q25.3

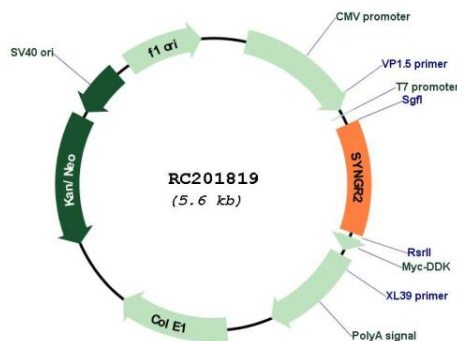
Domains: Synaptogyrin

Protein Families: Transmembrane

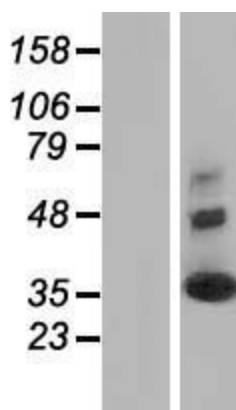
MW: 24.8 kDa

Gene Summary: This gene encodes an integral membrane protein containing four transmembrane regions and a C-terminal cytoplasmic tail that is tyrosine phosphorylated. The exact function of this protein is unclear, but studies of a similar rat protein suggest that it may play a role in regulating membrane traffic in non-neuronal cells. The gene belongs to the synaptogyrin gene family. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Feb 2016]

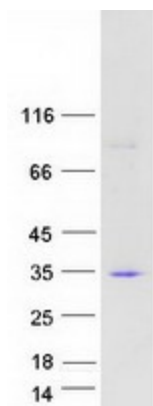
Product images:



Circular map for RC201819



Western blot validation of overexpression lysate (Cat# [LY417807]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC201819 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).



Coomassie blue staining of purified SYNGR2 protein (Cat# [TP301819]). The protein was produced from HEK293T cells transfected with SYNGR2 cDNA clone (Cat# RC201819) using MegaTran 2.0 (Cat# [TT210002]).