

Product datasheet for RC201380

FAM62A (ESYT1) (NM_015292) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	FAM62A (ESYT1) (NM_015292) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	FAM62A
Synonyms:	FAM62A; MBC2
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
ORF Nucleotide Sequence:	>RC201380 ORF sequence Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGATCGCC**

ATGGAGCGATCTCCAGGAGAGGGCCCCAGCCCCAGCCCCATGGACCAGCCCTCTGCTCCCTCCGACCCCA
CTGACCAGCCCCCGCTGCTCACGCAAAGCCAGACCCAGGTTCTGGGGGCCAACCTGCTGGCCCTGGCGC
GGCGGGTGAAGCCCTGGCGGTGCTGACTTCATTCGGGAGGCGGTTGCTGGTGCTGATACCTGTGATTTG
GCCGGGGCAGTGGGACTCAGCGTGGTTTCGTGCTCTTCGGCCTCGCCCTCTACCTGGGCTGGCGCCGG
TCCGCGACGAGAAAGAACGGAGCCTTCGAGCAGCGAGGCAGCTACTGGACGACGAGGAGCAGCTCACTGC
GAAAACCTCTATATGAGTCATCGAGAGCTACCTGCCTGGGTGAGCTTCCAGACGTGAAAAGGCTGAA
TGCTCAATAAGATTGTGGCCAGGTCTGGCCCTCCTGGGCCAGTATATGGAGAAGCTTCTGGTGAAA
CTGTGGCTCCGGCTGTTAGGGGATCAACCCCATCTGCAAACATTTACATTTACACGAGTGAAGCTGGG
TGAAAAGCCATTGCGCATCATTGGAGTCAAGGTTACCCAGGTCAGAGAAAAGAGCAGATCCTGTGGAC
TTGAACATCAGCTATGTAGGTGATGTGCAGATTGATGTGGAAGTGAAGAAATATTTTTGCAAAGCAGGAG
TCAAGGGCATGCAGCTACATGGCGTTTTGCGGGTGATACTGGAGCCACTCATTGGGGACCTCCCTTCGT
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CTGGATATCCAGGACTTAGCTCACTCTGACACCATGATCATGGACTCCATTGCTGCCCTCCTCGTGT
TGCCCAACCGATTACTGGTGCCCTTGTGCCTGACCTTCAAGATGTGGCTCAGTTGCGTTCCCTCTGCC
CAGGGGCATTATTCGAATTCACCTGCTGGCTGCTCGAGGGCTGAGTTCCAAGGACAAATATGTGAAGGGC
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TTGATGAAGAACTCAACCCACAGTGGGAGAGACTTATGAGGTGATGGTACACGAGGTCACAGGGCAGGA
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TGAGGCTAGAATGGCTGCACTTTTGTGATGACAGAGAACTGGAGCAGGTTCTACAGTGAATTGGGG
AGTCTCCTCTCGACCAGATCCCCGTGAGTCCATCTTAGTTGTCTACCTGGATCGGGCCAGGATCTT



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CCTCTGAAGAAGGGGAACAAGGAACCAACCCTATGGTACAACGTCAATTCAGGATGTGACTCAGGAGA
 GCAAGGCTGTCTACAGTACCAACTGCCAGTGTGGGAGGAAGCGTTCCGGTTCTTCTACAAGACCCCTCA
 AAGCCAGGAGCTCGATGTGCAAGTGAAGGATGATTCCAGGGCCCTGACTTTAGGAGCACTGACGCTGCC
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 ACAGAAGAAGAGGACCCCTGAGTCTGAATTAATGAACGGTTTGGTGGGAACTCCCCCTGGATGAGGCC
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ACGCGTACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGATT
 ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence:

>RC201380 protein sequence
 Red=Cloning site Green=Tags(s)

MERSPGEGPSPSPMDQPSAPSDPTDQPPAAHAKPDPGSGGQPAGPGAAGEALAVLTSFGRRLVLPVYL
 AGAVGLSVGFVLFGLALYLWRRVRDEKERSLRAARQLLDDEEQLTAKTLYMSHRELPAWVSFPDVEKAE
 WLNKIVAQVWPFLGQYMEKLLAETVAPAVRGSNPHLQTFTRVELGKPLRIIGVKVHPGQRKEIILLD
 LNI SYVGDVQIDVEVKKYFCKAGVKGMQLHGVLRVILEPLIGDLPFVAVSMFFIRRPTLDINWGMTNL
 LDIPGLSSLSDTMIMDSIAAFLVLPNRLVPLVPDLQDVQALRSPLPRGIIRIHLAARGLSSKDKYVKG
 LIEGKSDPYALVRLGTQTFCSRVIDEELNPQWGETYEVVMHEVPGQIEIEVEVFDKDPDKDDLGRMKLDV
 GKVLQASVLDWFPLQGGQGVHLRLEWLSLLSDAEKLEQVLQNNWGVSSRPDPPSAAIILVVYLDRAQDL
 PLKKGKNEPNPMVQLSIQDVTQESKAVYSTNCPVWEEAFRFFLQDPQSQELDVQVKDDSRALTLGALTLP
 LARLLTAPELILDQWFQLSSSGPNSRLYMKLVMRILYLDSEICFPTVPGCPGAWDVDSENPQRGSSVDA
 PPRPCHTTPDSQFGTEHLRIHVLEAQDLIAKDRFLGGLVKGKSDPYVKLKLGRSFRSHVVREDLNPRW
 NEVFEVIVTSVPGQLEVEVFDKDLDKDDLGRCKVRLTTLNSGFLDEWLTLEDVPSGRHLHLRLERTP
 RPTAAELEEVQLVNSLIQTQKSAELAAALLSIYMERAEPLRKGTKHLSPYATLTVGDSSHKTITISQT
 SAPVWDESASFIRKPHTESLELQVRGEGTGVLSLPLSELLVADQLCLDRWFTLSSGQGVLLRAQL
 GILVVSQHSQVGAHSHSYSHSSSLSEPELSSGPPHITSAPELRQRLTHVDSPLEAPAGPLGQVKLTLW
 YYSEERKLVSIHGCRLRQNGRDPDPYVSLLLLDPKNRGTRRRTSQKKRRLSPEFNERFEWELPLDEA
 QRRKLDVSVKSNSSFMSRERELLGKVQLDLAETDL SQGVARWYDLMDNKDKGSS

TRTRPLEQKLI SEEDLAANDILDYKDDDDKV

Chromatograms: https://cdn.origene.com/chromatograms/mk6204_d05.zip

Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN: NM_015292

ORF Size: 3312 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_015292.3](#)

RefSeq Size: 4255 bp

RefSeq ORF: 3315 bp
 Locus ID: 23344

UniProt ID: [Q9BSJ8](#)
 Cytogenetics: 12q13.2

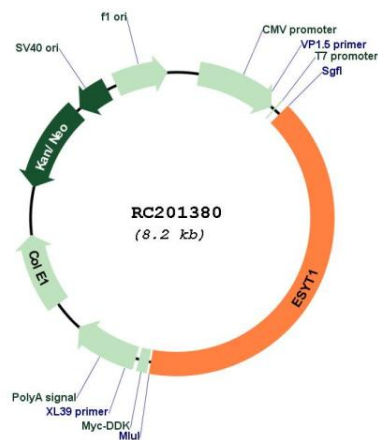
Domains: C2

Protein Families: Druggable Genome, Transmembrane

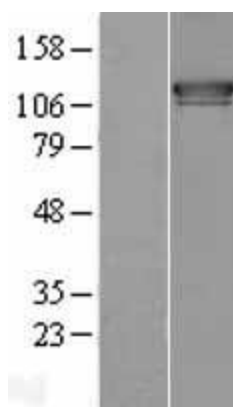
MW: 122.9 kDa

Gene Summary: Binds glycerophospholipids in a barrel-like domain and may play a role in cellular lipid transport (By similarity). Binds calcium (via the C2 domains) and translocates to sites of contact between the endoplasmic reticulum and the cell membrane in response to increased cytosolic calcium levels. Helps tether the endoplasmic reticulum to the cell membrane and promotes the formation of appositions between the endoplasmic reticulum and the cell membrane.[UniProtKB/Swiss-Prot Function]

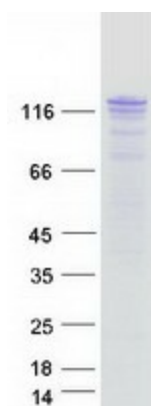
Product images:



Circular map for RC201380



Western blot validation of overexpression lysate (Cat# [LY402421]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC201380 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).



Coomassie blue staining of purified ESYT1 protein (Cat# [TP301380]). The protein was produced from HEK293T cells transfected with ESYT1 cDNA clone (Cat# RC201380) using MegaTran 2.0 (Cat# [TT210002]).