

Product datasheet for **RG205537**

TMEM170A (NM_145254) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Tag:	TurboGFP
Symbol:	TMEM170A
Synonyms:	TMEM170
Mammalian Cell	Neomycin
Selection:	
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)

ORF Nucleotide Sequence: >RG205537 representing NM_145254
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCCGCGATCGCC

ATGGAGCGCGAGGGGAGCGGCGGCAGCGCGGGTCTCGGCCGGCTCCTGCAGCAGATCCTGAGCCTGAAGG
TTGTGCCCGCGGGTGGGCAACGGGACCTGTGCCCAACTCTACTTCCCTCTGCTCCTTCCCAGAGATGTG
GTATGGTGTATTCTGTGGCACTGGTGTCTTCTCTCTTTTATGTCCTGCTGGATTACTGGCCCTC
TTCACCCTCAGACATCACAATATGGTAGGTTCATGTCTGTAAGCATCCTGTTGATGGGCATCGTGGGAC
CAATTACTGCTGGAATCTTGACAAGTGCAGCTATTGCTGGAGTTTACCGAGCAGCAGGGAAGGAAATGAT
ACCATTTGAAGCCCTCACACTGGGCACTGGACAGACATTTTGCCTTGGTGGTCTCCTTTTACGGATT
TTAGCTACTCTA

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >RG205537 representing NM_145254
Red=Cloning site Green=Tags(s)

MEREGSGSGGSAGLLQQILSLKVVPRVGNGLCPNSTSLCSFPEMWWGVFLWALVSSLFFHVPAGLLAL
FTLRHHKYGRFMSVSILLMGIVGPITAGILTSAAIAGVYRAAGKEMIPFEALTLGTGQTFCVLVVSFLRI
LATL

TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI



Cloning Scheme:



ACCN: NM_145254

ORF Size: 432 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_145254.3](#)

RefSeq Size: 1068 bp
 RefSeq ORF: 435 bp
 Locus ID: 124491

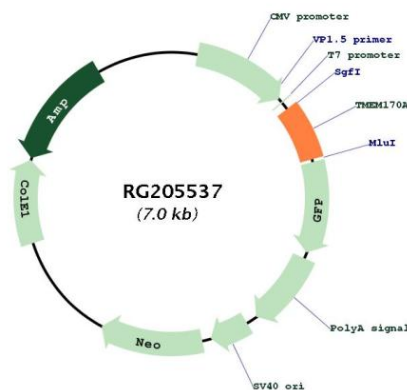
UniProt ID: Q8WVE7

Cytogenetics: 16q23.1

Protein Families: Transmembrane

Gene Summary: Acts as a regulator of endoplasmic reticulum (ER) and nuclear envelope (NE) morphogenesis. Affects the ratio between tubular ER and ER sheets by promoting sheet formation at the expense of tubules. Influences NE expansion, nuclear pore complex formation and proper localization of inner nuclear membrane proteins (PubMed:26906412).[UniProtKB/Swiss-Prot Function]

Product images:



Circular map for RG205537