

Product datasheet for MR201739

Ift27 (NM_025931) Mouse Tagged ORF Clone

Product data:

Product Type: Expression Plasmids

Product Name: Ift27 (NM_025931) Mouse Tagged ORF Clone

Tag: Myc-DDK

Symbol: Ift27

Synonyms: 2600013G09Rik; Rabl4

Mammalian Cell

Selection:

Neomycin

Vector:pCMV6-Entry (PS100001)E. coli Selection:Kanamycin (25 ug/mL)ORF Nucleotide>MR201739 ORF sequence

Sequence: Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC

GCCGCGATCGCC

ATGGTGAAGCTAGCTGCCAAATGCATCCTGGCAGGGGACCCAGCCGTAGGCAAGACGGCCCTGGTGCAGA
TGTTCCGCAGCGACGGACCGACCATTTCCAGAAGAACTACACCCTGACAACTGGAGTGGATTTGGTGGTGAA
GACAGTGCCAGTTCTTGACACAAATGACAGTGTGGAACTCTTCATTTTTGACTCAGCCGGCAAGGAGCTG
TTCTCTGAAATGCTGGATAAGTTGTGGGAGAATCCCAACGTCCTGTGCCTTGTCTATGATGTGACCAATG
AACAGTCCTTCATCAGCTGCACCAAGTGGTTGGAGAAGGTCCGGTCTCAGACTTCAGCCTCCCC
AGGTGTTTTAGTGGGAACTAAGACAGACCTGGCTGGCCGACAAACAGTGGATTCAGCTCAGGCCCAGGTA
TGGGCACTGAGTCAAGGCCTGGAATTCTTTTGAGACATCTGTGAAGGAGATGGATAATTACCAAGGCCCCGT
TCCACTGTCTGGCCAAGCAGTTCTACCAGCTGTACCGGGAAAAAAGTGGACATATTCCATACCCTGGTG

ACGCGTACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT

ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >MR201739 protein sequence

Red=Cloning site Green=Tags(s)

MVKLAAKCILAGDPAVGKTALVQMFRSDGTHFQKNYTLTTGVDLVVKTVPVLDTNDSVELFIFDSAGKEL FSEMLDKLWENPNVLCLVYDVTNEQSFISCTKWLEKVRSQTSGISLPGVLVGTKTDLAGRQTVDSAQAQV

WALSQGLEFFETSVKEMDNYEAPFHCLAKQFYQLYREKVDIFHTLV

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Restriction Sites: Sgfl-Mlul



OriGene Technologies, Inc. 9620 Medical Center Drive, Ste 200

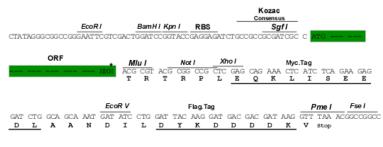
CN: techsupport@origene.cn

Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com



Cloning Scheme:





^{*} The last codon before the Stop codon of the ORF

ACCN: NM 025931

ORF Size: 561 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.

RefSeg: NM 025931.3

RefSeq Size: 1050 bp
RefSeq ORF: 561 bp
Locus ID: 67042
UniProt ID: Q9D0P8
Cytogenetics: 15 E1



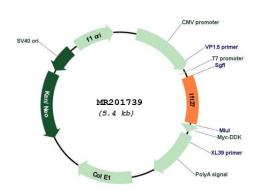
MW:

20.8 kDa

Gene Summary:

Small GTPase-like component of the intraflagellar transport (IFT) complex B that promotes the exit of the BBSome complex from cilia via its interaction with ARL6 (PubMed:25446516). Not involved in entry of the BBSome complex into cilium. Prevents aggregation of GTP-free ARL6. Required for hedgehog signaling (PubMed:25446516). Forms a subcomplex within the IFT complex B with IFT25 (By similarity). Its role in intraflagellar transport is mainly seen in tissues rich in ciliated cells such as kidney and testis. Essential for male fertility, spermiogenesis and sperm flagella formation (PubMed:28964737). Plays a role in the early development of the kidney (PubMed:29626631). May be involved in the regulation of ureteric bud initiation (PubMed:29626631).[UniProtKB/Swiss-Prot Function]

Product images:



Circular map for MR201739