

## Product datasheet for MR202602

### Chmp3 (NM\_025783) Mouse Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	Chmp3 (NM_025783) Mouse Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	Chmp3
Synonyms:	25.1; 4921505F14Rik; 9130011K15Rik; CGI-49; D6Ertd286e; NEDF; Vps24
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
ORF Nucleotide Sequence:	>MR202602 ORF sequence Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**CGATCGCC**

ATGGGACTCTTTGGAAAAACCCAGGAGAAGCCTCCCAAAGAGCTGGTTAATGAATGGTCACTGAAGATCA  
GAAAGGAAATGAGAGTTGTTGACAGGCAAATAAGAGATATCCAAAGAGAAGAAGAGAAAAGTAAAACGGTC  
TGTGAAAGATGCAGCCAAGAAGGGCCAAAAGGAAGTCTGTGTGGTTCTGGCCAAGGAGATGATCAGGTCA  
AGGAAAGCCGTGAGCAAGCTCTATGCCTCAAAGCACACATGAACTCTGTGCTCATGGGCATGAAGAACC  
AACTCGCGGTCTGCGAGTAGCTGGTTCTCTGCAGAAGAGCACAGAAGTATGAAGGCAATGCAGAGTCT  
TGTGAAGATCCCAGAAATCCAGGCCACCATGCGGGAGCTGTCAAAGAGATGATGAAGGCTGGAATCATA  
GAGGAGATGTTAGAGGATACATTTGAAAGCATGGATGATCAAGAAGAAATGGAAGAAGCAGCTGAGATGG  
AGATTGACAGAATCCTCTTTGAAATCACAGCAGGAGCCTTGGGCAAAGCACCCAGTAAAGTAAACCGATGC  
CCTTCTGAGCCTGAACCCGAGGAGCGATGGCTGCCTCCGAAGAGGGAGAAGAGGAAGAAGATGAAGAG  
GACCTGGAGGCTATGCAGTCACGGCTGGCCACACTCAGAAGC

**ACGCGT**ACGCGGCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT  
ACAAGGATGACGACGATAAGGTTTAA



[View online »](#)

**Protein Sequence:** >MR202602 protein sequence  
Red=Cloning site Green=Tags(s)

MGLFGKTQEKPPKELVNEWSLKIRKEMRVVDRQIRDIQREEEKVKRSVKDAAKKGQKEVCVVLAKEMIRS  
 RKAVSKLYASKAHMNSVLMGMKNQLAVLRVAGSLQKSTEVMMKAMQSLVKIPEIQATMRELKEMMKAGII  
 EEMLEDTFESMDDQEEMEEAAEMEIDRILFEITAGALGKAPSKVTDALPEPEPAGAMAASEEGEEEEDEE  
 DLEAMQSRLATLRS

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

**Restriction Sites:** SgfI-MluI

**Cloning Scheme:**

Cloning sites used for ORF Shuttling:



**ACCN:** NM\_025783

**ORF Size:** 675 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.

**RefSeq:** [NM\\_025783.4](#)

**RefSeq Size:** 2592 bp

**RefSeq ORF:** 675 bp

**Locus ID:** 66700

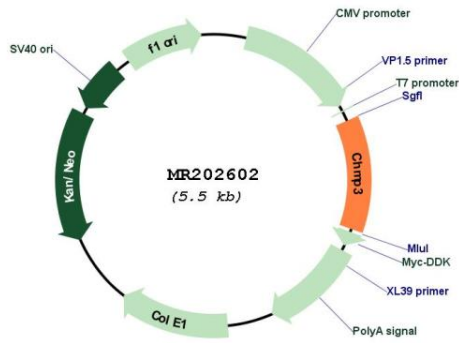
**UniProt ID:** [Q9CQ10](#)

**Cytogenetics:** 6 32.17 cM

**MW:** 25.2 kDa

**Gene Summary:** Probable core component of the endosomal sorting required for transport complex III (ESCRT-III) which is involved in multivesicular bodies (MVBs) formation and sorting of endosomal cargo proteins into MVBs. MVBs contain intraluminal vesicles (ILVs) that are generated by invagination and scission from the limiting membrane of the endosome and mostly are delivered to lysosomes enabling degradation of membrane proteins, such as stimulated growth factor receptors, lysosomal enzymes and lipids. The MVB pathway appears to require the sequential function of ESCRT-O, -I, -II and -III complexes. ESCRT-III proteins mostly dissociate from the invaginating membrane before the ILV is released. The ESCRT machinery also functions in topologically equivalent membrane fission events, such as the terminal stages of cytokinesis. ESCRT-III proteins are believed to mediate the necessary vesicle extrusion and/or membrane fission activities, possibly in conjunction with the AAA ATPase VPS4. Selectively binds to phosphatidylinositol 3,5-bisphosphate PtdIns(3,5)P2 and PtdIns(3,4)P2 in preference to other phosphoinositides tested. Involved in late stages of cytokinesis. Plays a role in endosomal sorting/trafficking of EGF receptor (By similarity). [UniProtKB/Swiss-Prot Function]

Product images:



Circular map for MR202602