

## Datasheet for ABIN7554695

# Myosin VI Protein (MYO6) (AA 1-1294) (His tag)



#### Overview

Quantity:	1 mg
Target:	Myosin VI (MYO6)
Protein Characteristics:	AA 1-1294
Origin:	Human
Source:	HEK-293 Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This Myosin VI protein is labelled with His tag.

#### **Product Details**

1 Todact Details	
Purpose:	Custom-made recombinant MYO6 Protein expressed in mammalian cells.
Sequence:	MEDGKPVWAP HPTDGFQMGN IVDIGPDSLT IEPLNQKGKT FLALINQVFP AEEDSKKDVE
	DNCSLMYLNE ATLLHNIKVR YSKDRIYTYV ANILIAVNPY FDIPKIYSSE AIKSYQGKSL
	GTRPPHVFAI ADKAFRDMKV LKMSQSIIVS GESGAGKTEN TKFVLRYLTE SYGTGQDIDD
	RIVEANPLLE AFGNAKTVRN NNSSRFGKFV EIHFNEKSSV VGGFVSHYLL EKSRICVQGK
	EERNYHIFYR LCAGASEDIR EKLHLSSPDN FRYLNRGCTR YFANKETDKQ ILQNRKSPEY
	LKAGSMKDPL LDDHGDFIRM CTAMKKIGLD DEEKLDLFRV VAGVLHLGNI DFEEAGSTSG
	GCNLKNKSAQ SLEYCAELLG LDQDDLRVSL TTRVMLTTAG GTKGTVIKVP LKVEQANNAR
	DALAKTVYSH LFDHVVNRVN QCFPFETSSY FIGVLDIAGF EYFEHNSFEQ FCINYCNEKL
	QQFFNERILK EEQELYQKEG LGVNEVHYVD NQDCIDLIEA KLVGILDILD EENRLPQPSD
	QHFTSAVHQK HKDHFRLTIP RKSKLAVHRN IRDDEGFIIR HFAGAVCYET TQFVEKNNDA
	LHMSLESLIC ESRDKFIREL FESSTNNNKD TKQKAGKLSF ISVGNKFKTQ LNLLLDKLRS
	TGASFIRCIK PNLKMTSHHF EGAQILSQLQ CSGMVSVLDL MQGGYPSRAS FHELYNMYKK

YMPDKLARLD PRLFCKALFK ALGLNENDYK FGLTKVFFRP GKFAEFDQIM KSDPDHLAEL
VKRVNHWLTC SRWKKVQWCS LSVIKLKNKI KYRAEACIKM QKTIRMWLCK RRHKPRIDGL
VKVGTLKKRL DKFNEVVSVL KDGKPEMNKQ IKNLEISIDT LMAKIKSTMM TQEQIQKEYD
ALVKSSEELL SALQKKKQQE EEAERLRRIQ EEMEKERKRR EEDEKRRRKE EEERRMKLEM
EAKRKQEEEE RKKREDDEKR IQAEVEAQLA RQKEEESQQQ AVLEQERRDR ELALRIAQSE
AELISDEAQA DLALRRSLDS YPVSKNDGTR PKMTPEQMAK EMSEFLSRGP AVLATKAAAG
TKKYDLSKWK YAELRDTINT SCDIELLAAC REEFHRRLKV YHAWKSKNKK RNTETEQRAP
KSVTDYDFAP FLNNSPQQNP AAQIPARQRE IEMNRQQRFF RIPFIRPADQ YKDPQSKKKG
WWYAHFDGPW IARQMELHPD KPPILLVAGK DDMEMCELNL EETGLTRKRG AEILPRQFEE
IWERCGGIQY LQNAIESRQA RPTYATAMLQ SLLK Sequence without tag. The proposed
Purification-Tag is based on experiences with the expression system, a different complexity
of the protein could make another tag necessary. In case you have a special request, please
contact us.

Specificity:

If you are looking for a specific domain and are interested in a partial protein or a different isoform, please contact us regarding an individual offer.

Characteristics:

Key Benefits:

- Made to order protein from design to production by highly experienced protein experts.
- Protein expressed in mammalian cells and purified in one-step affinity chromatography
- The optimized expression system ensures reliability for intracellular, secreted and transmembrane proteins.
- State-of-the-art algorithm used for plasmid design (Gene synthesis).

This protein is a made-to-order protein and will be made for the first time for your order. Our experts in the lab try to ensure that you receive soluble protein.

If you are not interested in a full length protein, please contact us for individual protein fragments.

The big advantage of ordering our made-to-order proteins in comparison to ordering custom made proteins from other companies is that there is no financial obligation in case the protein cannot be expressed or purified.

Purity:

> 90 % as determined by Bis-Tris PAGE, anti-tag ELISA, Western Blot and analytical SEC (HPLC)

Grade:

custom-made

### **Target Details**

Target:	Myosin VI (MYO6)
Alternative Name:	MY06 (MY06 Products)
Background:	Unconventional myosin-VI (Unconventional myosin-6),FUNCTION: Myosins are actin-based
	motor molecules with ATPase activity (By similarity). Unconventional myosins serve in
	intracellular movements (By similarity). Myosin 6 is a reverse-direction motor protein that
	moves towards the minus-end of actin filaments (PubMed:10519557). Has slow rate of actin-
	activated ADP release due to weak ATP binding (By similarity). Functions in a variety of
	intracellular processes such as vesicular membrane trafficking and cell migration (By
	similarity). Required for the structural integrity of the Golgi apparatus via the p53-dependent
	pro-survival pathway (PubMed:16507995). Appears to be involved in a very early step of
	clathrin-mediated endocytosis in polarized epithelial cells (PubMed:11447109). Together with
	TOM1, mediates delivery of endocytic cargo to autophagosomes thereby promoting
	autophagosome maturation and driving fusion with lysosomes (PubMed:23023224). Links
	TOM1 with autophagy receptors, such as TAX1BP1, CALCOCO2/NDP52 and OPTN
	(PubMed:31371777). May act as a regulator of F-actin dynamics (By similarity). As part of the
	DISP complex, may regulate the association of septins with actin and thereby regulate the acti
	cytoskeleton (PubMed:29467281). May play a role in transporting DAB2 from the plasma
	membrane to specific cellular targets (By similarity). May play a role in the extension and
	network organization of neurites (By similarity). Required for structural integrity of inner ear ha
	cells (By similarity). Modulates RNA polymerase II-dependent transcription
	(PubMed:16949370). {ECO:0000250 UniProtKB:Q29122, ECO:0000250 UniProtKB:Q64331,
	ECO:0000269 PubMed:10519557, ECO:0000269 PubMed:11447109,
	ECO:0000269 PubMed:16507995, ECO:0000269 PubMed:16949370,
	ECO:0000269 PubMed:23023224, ECO:0000269 PubMed:29467281,
	ECO:0000269 PubMed:31371777}.
Molecular Weight:	149.7 kDa
UniProt:	Q9UM54
Pathways:	Sensory Perception of Sound, Dicarboxylic Acid Transport, Asymmetric Protein Localization
Application Details	
Application Notes:	We expect the protein to work for functional studies. As the protein has not been tested for
	functional studies yet we cannot offer a guarantee though.
Restrictions:	For Research Use only

# Handling

Format:	Liquid
Buffer:	The buffer composition is at the discretion of the manufacturer.
Handling Advice:	Avoid repeated freeze-thaw cycles.
Storage:	-80 °C
Storage Comment:	Store at -80°C.
Expiry Date:	12 months