

Product datasheet for **MG226120**

Aqp4 (NM_009700) Mouse Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Aqp4 (NM_009700) Mouse Tagged ORF Clone
Tag:	TurboGFP
Symbol:	Aqp4
Synonyms:	aqua; WCH4
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)
ORF Nucleotide Sequence:	>MG226120 representing NM_009700 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGATCGCC**

ATGAGTGACAGAGCTGCGGCAAGGCGGTGGGTAAGTGTGGACATTCCTGCAGTAGAGAGAGCATCATGG
TGGCTTCAAAGGAGTCTGGACTCAGGCTTCTGGAAGGCAGTCTCAGCAGAATTTCTGGCCACGCTTAT
CTTTGTTTGGCTCGGTGTGGATCCACCATAAACTGGGGTGGCTCAGAAAACCCCTTACCTGTGGACATG
GTCCTCATCTCCCTTTGCTTTGGACTCAGCATTGCTACCATGGTGCAGTGTCTTGGCCACATCAGTGGT
GCCACATCAATCCCGCTGTGACTGTAGCCATGGTGTGCACACGAAAGATCAGCATCGCTAAGTCCGTCTT
CTACATCATTGCACAGTGCCTGGGGCCATCATTGGAGCCGGCATCCTCTACCTGGTACACCTCCCAGT
GTGGTTGGAGGATTGGGAGTCAACACGGTTCATGGAAACCTCACCGCTGGCCATGGGCTCCTGGTGGAGT
TAATAACTACTTTCCAGTTGGTGTCTACTATTTTTGCCAGCTGTGATTCCAAACGAACTGATGTTACTGG
TTCAATAGCTTTAGCAATTGGATTTTCCGTTGCAATTGGACATTTGTTTGAATCAATTATACTGGAGCC
AGCATGAATCCAGCTCGATCTTTTGGACCCGAGTTATCATGGGAACTGGGCAAACCACTGGATATATT
GGGTTGGACCAATCATGGGCGTGTGCTGGCAGGTGCCCTTTATGAGTATGTCTTCTGTCTGATGTGGA
GCTCAAACGTGCCTTAAGGAAGCCTTCAGCAAAGCCGCGCAGCAGACAAAAGGGAGCTACATGGAGGTG
GAGGACAACCGGAGCCAAGTGGAGACGGAAGACTTGATCCTGAAGCCGGAGTGGTGCATGTGATTGACA
TTGACCGTGGAGAAGAGAAGAAGGGGAAAGACTTTCGGGAGAGGTATTGTCTCCGTA

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA



[View online »](#)

Protein Sequence: >MG226120 representing NM_009700
 Red=Cloning site Green=Tags(s)

```
MSDRAAARRWGKCGHSCSRESIMVAFKGVWTQAFWKAWSAEFLATLIFVLLGVGSTINWGGSENPLPVDM
VLISLFCGLSIATMVQCFGHISGGHINPAVTVMVCTRKISIAKSVFYIIAQCLGAIIGAGILYLVTTPS
VVGGLGVTTVHGNTAGHLLVELIITFQLVFTIFASCDKRTDVTGSIALAIGFSVAIGHLFAINYTGA
SMNPARSFGPAVIMGNWANHWIYWVGPIMGAVLAGALYEYVFCPDVELKRRLKEAFSKAAQQTKGSYMEV
EDNRSQVETEDLILKPGVVHVIDIDRGEKKGKDSSEVLSSV
```

TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN: NM_009700

ORF Size: 969 bp

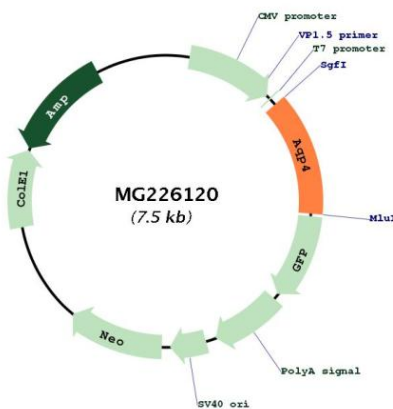
OTI Disclaimer: Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in E. coli are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at custsupport@origene.com or by calling 301.340.3188 option 3 for pricing and delivery.

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:	<ol style="list-style-type: none"> 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:	<u>NM_009700.3</u>
RefSeq Size:	5082 bp
RefSeq ORF:	972 bp
Locus ID:	11829
UniProt ID:	<u>P55088</u>
Cytogenetics:	18 8.74 cM
Gene Summary:	This gene encodes a member of the aquaporin family of intrinsic membrane proteins that function as water-selective channels in the plasma membranes of many cells. This protein is the predominant aquaporin found in brain and has an important role in brain water homeostasis. Alternatively spliced transcript variants encoding different isoforms have been described for this gene. A recent study provided evidence for translational readthrough in this gene and expression of an additional C-terminally extended isoform via the use of an alternative in-frame translation termination codon. [provided by RefSeq, Dec 2015]

Product images:



Circular map for MG226120