

Product datasheet for **MG201819**

Akirin1 (NM_023423) Mouse Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: Akirin1 (NM_023423) Mouse Tagged ORF Clone
Tag: TurboGFP
Symbol: Akirin1
Synonyms: 6330407G11Rik
Mammalian Cell Selection: Neomycin
Vector: pCMV6-AC-GFP (PS100010)
E. coli Selection: Ampicillin (100 ug/mL)
ORF Nucleotide Sequence: >MG201819 representing NM_023423
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGATCGCC**

ATGGCGTGCAGGGCGACACTGAAGCGGCCCATGGAGTTCGAGGCGGCGCTGCTGAGCCCCGGTCCCGA
 AGCGGCGACGCTGCGCCCTCTGCCCGGCCCACTCCGGGCTCAGGCCCGGACGCCAGCCGCCGCC
 GCTTCAGATGCAGACGCCCGCGGAGCCTCCAGCAGCCTGCCCAACCGGACGAGCGTCTTCCA
 ACTCCCGAGCAAATTTTTCAGAACATAAAACAAGAATATAATCGTTACCAGAGATGGAGACATTTAGAAG
 TTGTTCTCAGTCAAAGCGAAGCCTGTACTTCAGAACTCAGCCTTCCTCCTCGGCACTTACTGCACCAGG
 TTCTCCAGGTGCTTTCTGGATGAAGAAGGACCAGCCACCTTTACCCTTCGACAAGTGGGATAATATGT
 GAGCGTCTCTTAAAGACTATGAAGATAAAGTCCGAGAGGAGATGAGCAAATCCTCAGTACCAAACCG
 CAGAACAGTATGAATCGTTGTGAAATTCACGCATGATCAGATCATGCGGCGATACGGGACAAGGCCAAC
 AAGCTATGTATCC

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >MG201819 representing NM_023423
 Red=Cloning site Green=Tags(s)

MACGATLKRPMFEAALLSPGSPKRRRCAPLPGPTPGLRPPDAEPPPLQMOTPPASLQQPAPPGSERRLP
 TPEQIFQNIKQEYNRYQRWRHLEVLSQSEACTSETQPSSSALAPGSPGAFWMKKDQPTFLRQVGIIC
 ERLLKDYEDKVREEYEQILSTKLAEQYESFVKFTHDQIMRRYGRPTSYVS

TRTRPLE - GFP Tag - V

Restriction Sites: Sgfl-MluI



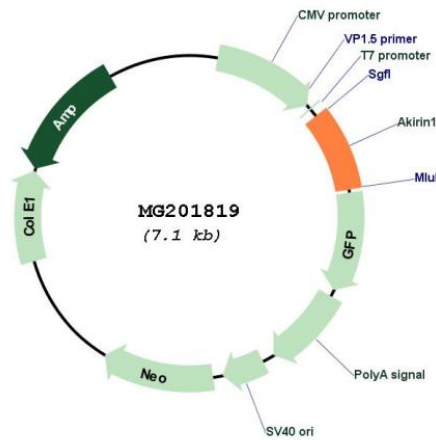
[View online »](#)

Cloning Scheme:

Cloning sites used for ORF Shutting:



	Kozac Consensus										
<i>EcoRI</i>	<i>BamHI</i> <i>KpnI</i>	RBS	<i>SgfI</i>	<i>AscI</i>							
CTATAGGGCGGCCGGGAATTCGTGACTGGATCCGGTACCGAGSAGATCTGCCGCCSGATCGCCGGCGCCAGATCT											
<i>HindIII</i>	<i>NheI</i> <i>RsrII</i>	<i>MluI</i>	<i>NotI</i>	<i>XhoI</i>	GFP Tag						----
CAAGCTTAAGCTAGCTAGCGGACCG											
		ACG CGT	ACG CGG CCG	CTC GAG	ATG GAG AGC GAC						----
		T R T R P L E			M E S D						----
-----GAA GAA AGA GTT TAA ACGGCCGGCCCGGAGCT											
		<i>PmeI</i>	<i>FseI</i>								
	- - E E R V	Stop									

Plasmid Map:

ACCN: NM_023423

ORF Size: 573 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_023423.3](#), [NP_075912.2](#)

RefSeq Size: 2383 bp

RefSeq ORF: 576 bp

Locus ID: 68050

UniProt ID: [Q99LF1](#)

Cytogenetics: 4 D2.2

Gene Summary: Functions as signal transducer for MSTN during skeletal muscle regeneration and myogenesis (PubMed:19406121, PubMed:18255059). May regulates chemotaxis of both macrophages and myoblasts by reorganising actin cytoskeleton, leading to more efficient lamellipodia formation via a PI3 kinase dependent pathway (PubMed:19406121).[UniProtKB/Swiss-Prot Function]