

Product datasheet for **RR205894**

AcsI4 (NM_053623) Rat Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	AcsI4 (NM_053623) Rat Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	AcsI4
Synonyms:	Acs4; Facl4
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Cell Selection:	Neomycin



[View online »](#)

ORF Nucleotide
Sequence:

>RR205894 representing NM_053623
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCCCGCATCGCC

ATGGCAAAGAGAATAAAGCTAAGCCACTTCAGACAAACCCGGAAGTCCATATCGCTCTGTACGCACT
 TCGACTACTAGCTGTATAGACATCCCTGGAGCAGATACTCTGGATAAAATTATTTGACCATGCTGTAGC
 CAAGTTTGGGAAGAAGGACAGCCTGGGGACCCGGGAGATCCTGAGCGAAGAAAATGAAATGCAGCCAAAT
 GGAAAGGTTTTAAGAAGTTAATCTTGGGAATTATAAATGGATAAACTATCTTGAAGTGAAGTGGCGAG
 TGAATAACTTTGGAAGTGGCCTCACTGCCTGACTGGGACTGAAACCAAGAACACCATTGCCATTTCTGTGA
 GACCAGGGCGGAGTGGATGATTGCAGCGCAGACCTGCTTAAAGTACAACCTTCCGCTTGTGACTTTATAT
 GCTACCCTTGGCAAAGAAGCTGTCGTTTCAATGATTAAATGAGTCTGAGGCTTCTATCTGATTACTAGTG
 TTGAACCTCTGGAAAGCAAACCTGAAGGCGGCATTATTAGATATCAATTGTGTTAAACATATCATTATGT
 GGATAACAAGACTATCAATAGAGCGGAGTACCCCGAGGGGCTTGAGATTCACAGCATGCAGTCAGTAGAG
 GAGCTGGGATCCAAGCCAGAAAACCTCAAGCATTCTCCAAGTAGACCAACTCCTTCGGACATGGCCATTG
 TCATGTACACCAGTGGCTCTACTGGCCGCCCAAGGGAGTGTATGCACCATAGCAATCTGATAGCTGG
 GATGACAGGCCAGTGTGAGCGCATACCTGGATTAGGACCAAGGACACATATATTGGCTACTTACCTTTG
 GCTCATGTGCTGGAAGTACAGCAGAGATCTCCTGCTTACCTACGGCTGTAGGATTGGATATTCGTCAC
 CACTCACACTGTCTGACCAGTCCAGCAAATCAAGAAGGGAAGCAAGGGTATTGTACTGTACTGAAACC
 TACACTTATGGCGGCCGTTCCGGAAATCATGGATAGAAATTTACAAGAATGTTATGAGCAAGGTTCAAGAG
 ATGAATTATATTCAGAAGACTCTATTTAAAATTTGGGTATGATTATAAATTAGAGCAAATCAAGAAAGGAT
 ATGATGCCCTCTTTGTAATCTGATACTGTTTAAAGAAGTGAAGGCTCTTCTAGGAGGAAATGTCGCGCAT
 GATGCTGTCCGGCGGTGCCCACTGTCCCCCAGACACACCGATTATGAATGTCTGCTTCTGCTGCCCC
 ATTGGTCAGGGCTATGGGCTGACAGAATCATGCGGTGCTGGAACAGTTACTGAAGTTACCGACTACACTA
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 ATATTGGAGAATCCACCCTGATGGATGCTTACAGATTATCGATCGTAAGAAAGATCTGGTGAAGCTGCA
 AGCCGGAGAGTACGTGTCTCTTGGGAAAGTCAAGCCGCACTGAAGAATTGTCCACTGATCGACAACATC
 TGTGCTTTTGCCAAAAGTGACCAGTCTTATGTGATCAGTTTTGTGTTCCCAACCAGAAAAGTTGACTC
 TTTTGGCACAACAGAAGGGGTAGAAGGATCTTGGGTTGATATTTGCAATAATCCTGCCATGGAAGCTGA
 AATACTGAAAGAAATTCGAGAAGCTGCAATGCCATGAAATTGGAACGATTTGAAATCCAATCAAAGTT
 CGATTGAGCCAGAGCCATGGACCCCTGAAACTGGTTTGGTAACAGATGCCTTCAAGCTGAAAAGGAAGG
 AACTGAAGAACCATTATCTTAAAGACATTGAGCGGATGTATGGGGGCAA

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
 ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RR205894 representing NM_053623
 Red=Cloning site Green=Tags(s)

MAKRKAKPTSDKPGSPYRSVTHFDSLAVIDIPGADTLDKLFDHAVAKFGKKDSLGTREILSEENEMQPN
 GKVFKKLILGNYKWINYLEVNCRVNNFGSGLTALGLKPKNTIAIFCETRAEWMIAAQTCFKYNFPLVTLTY
 ATLGKEAVVHGLNESEASYLITSVELLESKKAALLDINCVKHIIYVDNKTINRAEYPEGLEIHSMQSVE
 ELGSKPENSSIPPSRPTPSDMAIVMYTSGSTGRPKGVMMHHSNLIAGMTGQCERIPGLGPKDITYIGYLP
 AHVLELTAEISCFYGRIGYSSPLTLDQSSKIKKSGDCTVLKPTLMAAVPEIMDRIYKNVMSKVQE
 MNYIQKTLFKIGYDYKLEQIKKGYDAPLNLILFKKVKALLGGNVRMMLSGGAPLSPQTHRFMNVCFCCP
 IGQGYGLTESCGAGTVTEVDYTTGRVGAPLICCEIKLKDQEGGYTVHDKPNRGEIVIGGQNIISMGYF
 KNEEKTAEDYSVDENGRWFCTGDIGEFHPDGCLQIIDRKKDLVKLQAGEYVSLGKVEAALKNCPLIDNI
 CAFAKSDQSYVISFVVPNQKLLTLLAQQKGVESWVDICNNPAMEAEILKEIREANAMKLERFEIPIKV
 RLSPEPWPETGLVTDFAFKLKRKELKNHYLKDIERMYGGK

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

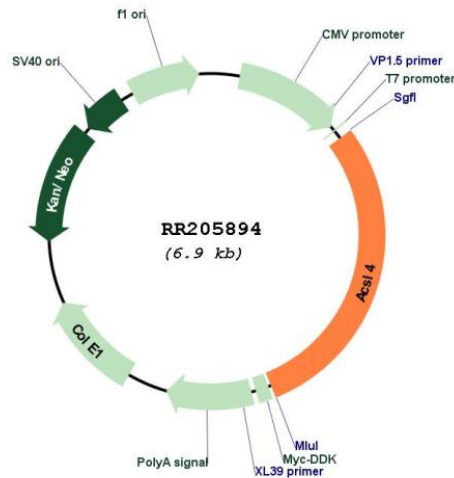
Restriction Sites:

SgfI-MluI

Cloning Scheme:



Plasmid Map:



ACCN: NM_053623

ORF Size: 2010 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:

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_053623.1](#), [NP_446075.1](#)

RefSeq Size: 4862 bp

RefSeq ORF: 2013 bp

Locus ID: 113976

UniProt ID: [O35547](#)

Cytogenetics: Xq33

MW: 74.3 kDa

Gene Summary: catalyzes the ligation of a fatty acid to produce acyl Co-A; acts on a wide range of fatty acids with preferential activity for arachidonate and eicosapentaenoate; plays a role in fatty acid metabolism [RGD, Feb 2006]