

Product datasheet for **RC201833**

EIF3S2 (EIF3I) (NM_003757) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Tag:	Myc-DDK
Symbol:	EIF3S2
Synonyms:	eIF3-beta; eIF3-p36; EIF3S2; PRO2242; TRIP-I; TRIP1
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)

ORF Nucleotide Sequence: >RC201833 ORF sequence
Red=Cloning site Blue=ORF Green=Tags(s)

TTTGTGAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGCATCGCC**

ATGAAGCCGATCCTACTGCAGGGCCATGAGCGGTCCATTACGCAGATTAAGTATAACCGCGAAGGAGACC
TCCTCTTTACTGTGGCCAAGGACCCCTATCGTCAATGTATGGTACTCTGTGAATGGTGAGAGGCTGGGCAC
CTACATGGGCCATACCGGAGCTGTGTGGTGTGTGGACGCTGACTGGGACCAAGCATGTCCTCACTGGC
TCAGCTGACAACAGCTGTCGTCTCTGGGACTGTGAAACAGGAAAGCAGCTGGCCCTTCTCAAGACCAATT
CGGCTGTCCGGACCTGCGGTTTTGACTTTGGGGGCAACATCATGTTCTCCACGGACAAGCAGATGGG
CTACCAAGTGCTTTGTGAGCTTTTTGACCTGCGGGATCCGAGCCAGATTGACAACAATGAGCCCTACATG
AAGATCCCTTGCAATGACTCTAAAATCACCAGTGCTGTTGGGGACCCCTGGGGAGTGCATCATCGCTG
GCCATGAGAGTGGAGAGCTCAACCAGTATAGTGCCAAGTCTGGAGAGGTGTTGGTGAATGTTAAGGAGCA
CTCCCGGCAGATCAACGACATCCAGTTATCCAGGGACATGACCATGTTTGTGACCGCGTCCAAGGACAAC
ACAGCCAAGCTTTTGAATCCCAACTCTTGAACATCAGAAGACTTTCCGGACAGAAGCTCTGTCAACT
CAGCTGCCCTCTCCCCAACTATGACCATGTGGTCTGGGCGGTGGTCAAGAGCCATGGATGTAACAC
AACCTCCACCAGGATTGGCAAGTTTGAGGCCAGGTTCTTCCATTTGGCCTTTGAAGAAGAGTTTGAAGA
GTCAAGGGTCACTTTGGACCTATCAACAGTGTTCCTTCCATCCTGATGGCAAGAGCTACAGCAGCGGCC
GCGAAGATGGTTACGTCGTATCCATTACTTCGACCCACAGTACTTCAATTTGAGTTTGAAGCT

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA



Protein Sequence:

>RC201833 protein sequence
Red=Cloning site Green=Tags(s)

MKPILLQGHERSITQIKYNREGDLLFTVAKDPIVNVWYSVNGERLGTYMIGHTAVWCVADADWDTHKVLTG
 SADNSCRLWDCETGKQLALLKTNSAVRTCGDFDGGNIIMFSTDKQMGYQCFVSFFDLRDPQIDNNEPYM
 KIPCNDSKITSAVWGPLGECIIAGHESGLNLQYSAKSGEVLVNVKEHSRQINDIQLSRDMTMFVYASKDN
 TAKLFDSTTLEHQKFTDRTERPYNNSAALSPNYDHVVLGGQGEAMDVTTTSTRIGKFEARFHLAFEEFEGR
 VGHGFGPINSVAFHPDGKSYSGSGEDGYVRTHYDFDPQVFEFEEA

TRTRPLEOKLISEEDLAANDILDYKDDDDKV

Chromatograms:

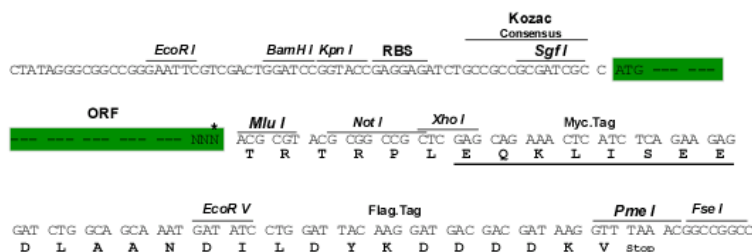
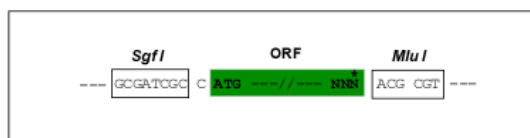
https://cdn.origene.com/chromatograms/mk6144_g12.zip

Restriction Sites:

Sgfl-MluI

Cloning Scheme:

Cloning sites used for ORF Shuttling:



* The last codon before the Stop codon of the ORF

ACCN:

NM_003757

ORF Size:

975 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:

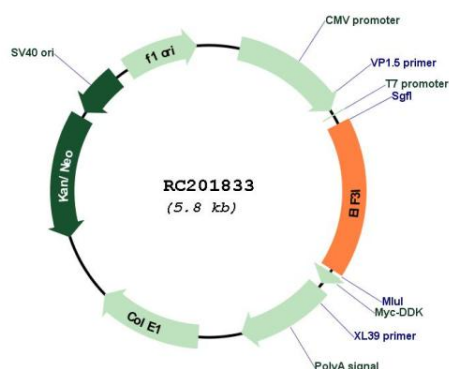
This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

Components:

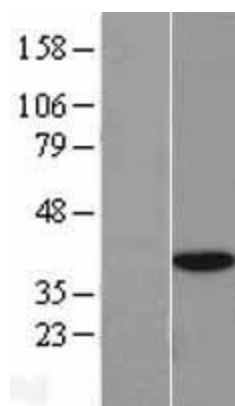
The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

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.
Note:	Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.
RefSeq:	<u>NM_003757.3</u>
RefSeq Size:	1458 bp
RefSeq ORF:	978 bp
Locus ID:	8668
UniProt ID:	<u>Q13347</u>
Cytogenetics:	1p35.2
Domains:	WD40
MW:	36.5 kDa
Gene Summary:	Component of the eukaryotic translation initiation factor 3 (eIF-3) complex, which is required for several steps in the initiation of protein synthesis (PubMed:17581632, PubMed:25849773, PubMed:27462815). The eIF-3 complex associates with the 40S ribosome and facilitates the recruitment of eIF-1, eIF-1A, eIF-2:GTP:methionyl-tRNAi and eIF-5 to form the 43S pre-initiation complex (43S PIC). The eIF-3 complex stimulates mRNA recruitment to the 43S PIC and scanning of the mRNA for AUG recognition. The eIF-3 complex is also required for disassembly and recycling of post-termination ribosomal complexes and subsequently prevents premature joining of the 40S and 60S ribosomal subunits prior to initiation (PubMed:17581632). The eIF-3 complex specifically targets and initiates translation of a subset of mRNAs involved in cell proliferation, including cell cycling, differentiation and apoptosis, and uses different modes of RNA stem-loop binding to exert either translational activation or repression (PubMed:25849773).[UniProtKB/Swiss-Prot Function]

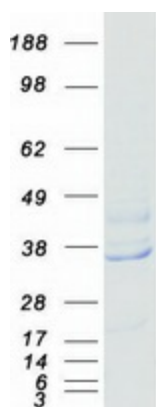
Product images:



Circular map for RC201833



Western blot validation of overexpression lysate (Cat# [LY401235]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from un-transfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC201833 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).



Coomassie blue staining of purified EIF3I protein (Cat# [TP301833]). The protein was produced from HEK293T cells transfected with EIF3I cDNA clone (Cat# RC201833) using MegaTran 2.0 (Cat# [TT210002]).