

Product datasheet for SC303374

IRS2 (NM_003749) Human Untagged Clone

Product data:

Product Type: Expression Plasmids
Product Name: IRS2 (NM_003749) Human Untagged Clone
Tag: Tag Free
Symbol: IRS2
Synonyms: IRS-2
Mammalian Cell Selection: None
Vector: pCMV6-XL5
E. coli Selection: Ampicillin (100 ug/mL)

Fully Sequenced ORF: >OriGene sequence for NM_003749 edited
GCCTGAAGCGCCCGCATGGCGAGCCCGCGGCACGGGCCCGCCGGGCGCGAGCGG
AGACGGCCCAACCTCAACAACAACAACAACAACAACAACCACAGCGTGCGCAAGTGC
CTACCTGCGCAAGCAGAAGCATGGCCACAAGCGTTCTTCGTGCTGCGCGACCCGGCGC
GGCGGGCGACGAGGCGACGGCGGGGGTTCGGCGCCGCAACCGCCGGCTCGAGTA
CTACGAGAGCGAGAAAAAGTGGCGGAGCAAGGCAGGCGCGCGAAACGGGTGATCGCTCT
CGACTGCTGCCTGAACATCAACAAGCGCGCCGACGCCAAGCACAAGTACCTGATCGCCCT
CTACACCAAGGACGAGTACTTCGCCGTGGCCGCCGAGAACGAGCAGGAGCAGGAGGGCTG
GTACCGCGCGCTACCGACCTGGTCAGCGAGGGCCGCGCGCCGGAGACGCGCCCC
CGCGCCCGCGCCCGCGTCTGCAGCGCTCCCTGCCCGCGCCCTGGCGGGCTGTC
CGGCGCCCGGGGCGGAGGACGCTACGGGCTGGTGGTCCCGCCACGGCCGCTACCG
TGAGGTGTGGCAGGTGAACCTGAAGCCCAAGGGTCTGGGCCAGAGCAAGAACCTGACGGG
GGTGTACCGTCTGTGCCTGTCTGCGCGCACCATCGGCTTCGTGAAGCTCAACTGCAGCA
GCCGTGCGTGACGCTGCAGCTCATGAACATCCGCCGCTGCGGCCACTCGGACAGCTTCTT
CTTCATCGAGGTGGGCCGCTCGGCCGTACAGGCCCGCGGAGCTGTGGATGCAGGCGGA
CGACTCGGTGGTGGCGCAGAATCCACGAGACCATCCTGGAGGCCATGAAGGCGCTCAA
GGAGCTCTTCGAGTTCGGCCGCGCAGTAAGAGCCAATCGTCGGGGTTCGTGGCCACGCA
CCCCATCAGCGTCCCCGGCGCGCCGCCACCACCACCTGGTCAACCTGCCCCCAGCCA
GACGGCCCTGGTGCGCCGCTCGCGACCGACAGCCTGGCCGCCACCCCGCGCGGCCAA
GTGAGCTCGTGGCGGTGCGCACCGCCAGCGAGGGCGACGGCGCGCGCGCGGGAGC
GGCGGCCCGGGCGCCAGGCCGGTGTGGTGGTGGGAGCCCCCTGAGCCCGGGCGGT
GCGCGCGCCCTGAGCCGCTCGCACACCCTGAGCGCGGCTGCGCGGCCCGGGAGCAA
GGTGGCGTGTGCCGCGAGGGGCGCGCTGCAACACAGCCGCTCCATGTCCATGCCCGT
GGCGCACTCGCCCGCCGCCACCAGCCCGGCTCCCTGTGTCAGCAGCGGCCACGG
CTCGGGCTCTACCCGCCCGCCCGGCCACCAGCCCGGCTCCCTGTGTCAGCAGCGGCCACGG
CGGCCCGGCCAGCGCCCTCCAGCGGCAGCGCTCCGCCTCGGGTCCCCAGCGACCC
CGGCTTATGTCCCTGGACGAGTACGGCTCCAGCCAGGGCAGCTGCGCGCTTTCGAG



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CCACCGAAGCAACACGCCCGAGTCCATCGCGGAGACGCCCCGGCCCCGAGACGGCGGCGG
CGGCGGTGAGTTCTACGGGTACATGACCATGGACAGGCCCTGAGCCACTGTGGCCGCTC
CTACCGCCGGGTCTCGGGGACGCGGCCAGGACCTGGACCGAGGGCTGCGCAAGAGGAC
CTACTCCTGACCACGCCAGCCGGCAGCGGCCGGTGGCCAGCCCTCCTCTGCCTCGCT
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CTGCCCCGCGTCTCTCCAAGTGGCTACCACCCTACCCAGAGGACTACGGAGACAT
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CATGACGCCCGGCGGCCCTCGCGGGCAGTGGGAGCGGACGCTGCAGGAGCGACGACTA
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CGCCGCCCGCCGCGCCGCTGCTTCTGCGGGGCTGCGGGGCCAGCACCCACCTCTGC
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CACGACGGTCACCCCGTGTCCCGTCTTCCGCCACAACCCCAAGCGCCACAACCTCGGC
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GCAGGGCCGCGCTGGACCCCGGTGAGCCCGGGGCTTGGTGGTTGTCTGGGAGCGG
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CGCTGTGGGCGTGGCAGCACCGCGGGGTGCGGGGGCCGGTCCCGGTGCCCTGCC
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CGTGAAAGAGTGAAGATGTGCTGGCTTATCACCAGGATGTCACATGTCAGAGAATATC
ATTAAGAAGACGCTCAGCACTGTTTCAGCCGAAGCTGCTTGCAGTTTTCTTTGGAT
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CAAGGTACCTGCCTCTTCCCTGTTCCCGATGGGGCATTATCATTGTGCTGTTTGC
GTTTTGTTTTGTTTTGTTTTAACAAAATTAGCTGAAGAAGTATTCTCAAGAAAATTGGA
TGTTTTATTGGCCTTCTAAATTGTGGCCAGTGTCTTTAATTTCTTCTTTTCTT
TTGGCAAAGCAGATATAACCCCTCAGCATGCTAGGAGAGTGCACCCGTACCTATGGAAGTG
GTAATACTGGTATTTACTGGCTTACACTCAAAACGACCACAGTCTACCTCAGTTCAAG
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GATTCCAGTGCAGGTACCTGCGATGTTTACGTCCACACCGAGCCAGTGTGGGACTGACA

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TTTCTCAATGGAAGTAAAATTTGGGATTGGACTTTGAAGACGGATTACTAAATAAATAATT
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GGAGGGAAGGGCTTTGGGAAGGGGATGAATATTTTTTTTTTACCTTTAACAGACTTGTTTA
ATCTTCTCGATGTAGATGTTTATGTAGGTACTTCACATTGCAAACGCCTTTTATT
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Restriction Sites:	Please inquire
ACCN:	NM_003749
Insert Size:	4900 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 TrueClone is provided through our Custom Cloning Process that includes sub-cloning into OriGene's pCMV6 vector and full sequencing to provide a non-variant match to the expected reference without frameshifts, and is delivered as lyophilized plasmid DNA.
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:	NM_003749.2 , NP_003740.2
RefSeq Size:	7014 bp
RefSeq ORF:	4017 bp
Locus ID:	8660
UniProt ID:	Q9Y4H2
Cytogenetics:	13q34
Protein Families:	Druggable Genome

Protein Pathways: Adipocytokine signaling pathway, Insulin signaling pathway, Neurotrophin signaling pathway, Type II diabetes mellitus

Gene Summary: This gene encodes the insulin receptor substrate 2, a cytoplasmic signaling molecule that mediates effects of insulin, insulin-like growth factor 1, and other cytokines by acting as a molecular adaptor between diverse receptor tyrosine kinases and downstream effectors. The product of this gene is phosphorylated by the insulin receptor tyrosine kinase upon receptor stimulation, as well as by an interleukin 4 receptor-associated kinase in response to IL4 treatment. [provided by RefSeq, Jul 2008]