

Product datasheet for **RC225110**

IGF1 (NM_00111284) Human Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: IGF1 (NM_00111284) Human Tagged ORF Clone
Tag: Myc-DDK
Symbol: IGF1
Synonyms: IGF; IGF-I; IGFII; MGF
Mammalian Cell Selection: Neomycin
Vector: pCMV6-Entry (PS100001)
E. coli Selection: Kanamycin (25 ug/mL)
ORF Nucleotide Sequence: >RC225110 representing NM_00111284
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGGATCGCC**

ATGATTACACCTACAGTGAAGATGCACACCATGTCCTCCTCGCATCTCTTCTACCTGGCGCTGTGCCTGC
TCACCTTACCAGCTCTGCCACGGCTGGACCGGAGACGCTCTGCGGGGCTGAGCTGGTGGATGCTCTTCA
GTTTCGTGTGTGGAGACAGGGGCTTTTATTTCAACAAGCCACAGGGTATGGCTCCAGCAGTCGGAGGGCG
CCTCAGACAGGCATCGTGGATGAGTGTCTTCCGGAGCTGTGATCTAAGGAGGCTGGAGATGATTGCC
CACCCCTCAAGCCTGCCAAGTCAGCTCGCTCTGTCCGTGCCAGGCCACACCGACATGCCAAGACCCA
GAAGGAAGTACATTTGAAGAACGCAAGTAGAGGGAGTGCAGGAAACAAGAACTACAGGATG

ACGCGTACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RC225110 representing NM_00111284
Red=Cloning site Green=Tags(s)

MITPTVKMHTMSSSHLFYLALCLLFTSSATAGPETLCGAEIVDALQFVCGDRGFYFNKPTGYGSSRRRA
PQTGIVDECCFRSCDLRRLREMYCAPLKPASARSVRAQRHTDMPKTQKEVHLKNASRGSAGNKNYRM

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Chromatograms: https://cdn.origene.com/chromatograms/ja1428_d10.zip

Restriction Sites: SgfI-MluI



[View online »](#)

Cloning Scheme:


ACCN: NM_001111284

ORF Size: 411 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_001111284.2](#)

RefSeq ORF: 414 bp

Locus ID: 3479

UniProt ID: [P05019](#)

Cytogenetics: 12q23.2

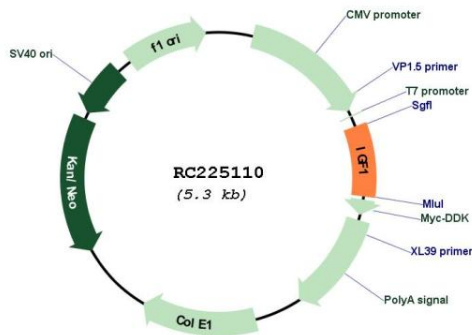
Protein Families: Druggable Genome, ES Cell Differentiation/IPS, Secreted Protein

Protein Pathways: Dilated cardiomyopathy, Focal adhesion, Glioma, Hypertrophic cardiomyopathy (HCM), Long-term depression, Melanoma, mTOR signaling pathway, Oocyte meiosis, p53 signaling pathway, Pathways in cancer, Progesterone-mediated oocyte maturation, Prostate cancer

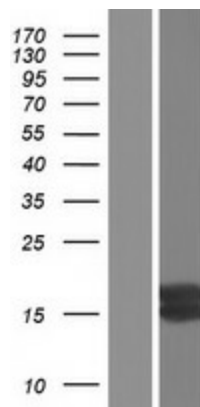
MW: 15.18 kDa

Gene Summary: The protein encoded by this gene is similar to insulin in function and structure and is a member of a family of proteins involved in mediating growth and development. The encoded protein is processed from a precursor, bound by a specific receptor, and secreted. Defects in this gene are a cause of insulin-like growth factor I deficiency. Alternative splicing results in multiple transcript variants encoding different isoforms that may undergo similar processing to generate mature protein. [provided by RefSeq, Sep 2015]

Product images:



Circular map for RC225110



Western blot validation of overexpression lysate (Cat# [LY426359]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC225110 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).