

## Product datasheet for **SC310663**

### **FGFR1 (NM\_023110) Human Untagged Clone**

#### **Product data:**

Product Type:	Expression Plasmids
Product Name:	FGFR1 (NM_023110) Human Untagged Clone
Tag:	Tag Free
Symbol:	FGFR1
Synonyms:	bFGF-R-1; BFGFR; CD331; CEK; ECCL; FGFBR; FGFR-1; FLG; FLT-2; FLT2; HBGFR; HH2; HRTFDS; KAL2; N-SAM; OGD
Mammalian Cell Selection:	None
Vector:	<u><a href="#">pCMV6-XL4</a></u>
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

**Fully Sequenced ORF:**

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>OriGene ORF sequence for NM_023110 edited
ATGTGGAGCTGGAAGTGCCTCCTTCTGGGCTGTGCTGGTCACAGCCACACTCTGCACC
GCTAGGCCGTCCCCGACCTTGCCTGAACAAGCCCAGCCCTGGGGAGCCCTGTGGAAGTG
GAGTCCTTCTGGTCCACCCGGTACCTGCTGCAGCTTCGCTGTGCGGCTGCGGGACGAT
GTGCAGAGCATCAACTGGCTGCGGGACGGGGTGCAGCTGGCGGAAAGCAACCGCACCCGC
ATCACAGGGGAGGAGGTGGAGGTGCAGGACTCCGTGCCCGCAGACTCCGGCCTCTATGCT
TGCGTAACACAGCAGCCCTCGGGCAGTGACACCACCTACTTCTCCGTCAATGTTTTAGAT
GCTCTCCCTCCTCGGAGGATGATGATGATGATGATGACTCCTCTCAGAGGAGAAAAGAA
ACAGATAACACCAAACCAAACCGTATGCCCGTAGCTCCATATTGGACATCCCCAGAAAAG
ATGAAAAAGAAATTGCATGCAGTGCCGGCTGCCAAGACAGTGAAGTTCAAATGCCCTTCC
AGTGGGACCCCAAACCCACACTGCGCTGGTTGAAAAATGGCAAAGAATCAAACCTGAC
CACAGAATTGGAGGCTACAAGGTCGGTTATGCCACCTGGAGCATCATAATGGACTCTGTG
GTGCCCTCTGACAAGGGCAACTACACCTGCATTGTGGAGAATGAGTACGGCAGCATCAAC
CACACATACCAGCTGGATGTCGTGGAGCGGTCCCCTACCGGCCCATCCTGCAAGCAGGG
TTGCCCGCAACAAAACAGTGGCCTGGGTAGCAACGTGGAGTTCATGTGTAAGGTGTAC
AGTGACCCGACGCGCACATCCAGTGGCTAAAGCACATCGAGGTGAATGGGAGCAAGATT
GGCCCAGACAACCTGCCTTATGTCCAGATCTTGAAGACTGCTGGAGTTAATACCACCGAC
AAAGAGATGGAGGTGCTTCACTTAAGAAATGTCTCCTTTGAGGACGCAGGGGAGTATACG
TGCTTGGCGGGTAACTCTATCGGACTCTCCCATCACTCTGCATGGTTGACCGTTCTGGAA
GCCCTGGAAGAGAGGGCCGGCAGTGATGACCTCGCCCTGTACCTGGAGATCATCATCTAT
TGCACAGGGGCCCTTCTCATCTCCTGCATGGTGGGGTGGTGCATCGTCTACAAGTGAAG
AGTGGTACCAAGAAGAGTGACTTCCACAGCCAGATGGCTGTGACAAGCTGGCCAAGAGC
ATCCCTCTGCGCAGACAGGTAACAGTGTCTGCTGACTCCAGTGCATCCATGAACCTGGG
GTTCTTCTGGTTCGGCCATCACGGCTCTCCTCCAGTGGGACTCCCATGCTAGCAGGGGTC
TCTGAGTATGAGCTTCCCGAAGACCCTCGCTGGGAGCTGCCTCGGGACAGACTGGTCTTA
GGCAAACCCCTGGGAGAGGGTCTTTGGGCAGGTGGTGTGGCAGAGGCTATCGGGCTG
GACAAGGACAAACCCAAACCGTGTGACCAAAGTGGCTGTGAAGATGTTGAAGTCGGACGCA
ACAGAGAAAGACTTGTGACAGCTGATCTCAGAAATGGAGATGATGAAGATGATCGGGAAG
CATAAGAATATCATCAACCTGCTGGGGCCTGCACGCAGGATGGTCCCTTGTATGTCATC
GTGGAGTATGCCTCCAAGGGCAACCTGCGGGAGTACCTGCAGGCCGGAGCCCCCAGGG
CTGGAATACTGCTACAACCCAGCCACAACCCAGAGGAGCAGCTCTCCTCAAGGACCTG
GTGTCCTGCGCCTACCAGGTGGCCCGAGGCATGGAGTATCTGGCCTCCAAGAAAGTGCATA
CACCGAGACCTGGCAGCCAGGAATGTCCTGGTGACAGAGGACAATGTGATGAAGATAGCA
GACTTTGGCCTCGCACGGGACATTACCCACATCGACTACTATAAAAAGACAACCAACGGC
CGACTGCCTGTGAAGTGGATGGCACCCGAGGCATTATTTGACCGGATCTACACCCACCAG
AGTGATGTGTGGTCTTTGGGGTGTCTCTGTGGGAGATCTTCACTCTGGGCGGCTCCCCA
TACCCCGGTGTGCCTGTGGAGGAACTTTTCAAGCTGCTGAAGGAGGGTCAACCGCATGGAC
AAGCCCAGTAACTGCACCAACGAGCTGTACATGATGATGCGGGACTGCTGGCATGCAGTG
CCCTCACAGAGACCCACCTTCAAGCAGCTGGTGAAGACCTGGACCGCATCGTGGCCTTG
ACCTCCAACAGGAGTACCTGGACCTGTCCATGCCCTGGACCAGTACTCCCCAGCTTT
CCCGACACCCGGAGCTCTACGTGCTCCTCAGGGGAGGATTCCGTCTTCTCATGAGCCG
CTGCCCGAGGAGCCCTGCCTGCCCGACACCCAGCCAGCTTGCCAATGGCGGACTCAA
CGCCGCTGACTGCCACCCACACGCCCTCCCAGACTCCACCGTCAGCTGTAACCCCTACC
CACAGCCCTGCTGGGCCACCACTGTCCGTCCCTGTCCCTTTCTGCTGGCAGGAGC
CGGCTGCCTACCAGGGCCTTCTGTGTGGCTGCCTTACCCCACTCAGCTCACCTCTC
CCTCCACCTCCTCCACCTGCTGGTGAGAGGTGCAAAGAGGCAGATCTTTGCTGCCAGC
CACTT
    
```

**5' Read Nucleotide Sequence:**

>OriGene 5' read for NM\_023110 unedited  
 GTTCAAATTTTGTAAATACGACTTCACTATAGGGCGGCCGGAATTCGCACGAGGCGCAGG  
 GCGATGGAGCCCGGTCTGCAAGGAAAGTGAGGCGCCGCCGCTGCGTTCTGGAGGAGGGGG  
 GCACAAGTCTGGAGACCCCGGTGGCGGACGGGAGCCCTCCCCCGCCCGCCTCCGGG  
 GCACCAAGTCCGGCTCCATTGTTCCCGCCCGGCTGGAGGCGCCGAGCACCGAGCGCCG  
 CGGGAGTCGAGCGCCGGCCGGAGCTCTTGCACCCCGCCAGGACCCGAACAGAGCCCG  
 GGGCGGGCGGGCCGGAGCCGGGACCGGGCACACGCCCGCTCGCACAGCCACGGCGGA  
 CTCTCCCGAGGCGGAACCTCCACGCCGAGCGAGGTCAGTTTGAAAAGGAGGATCGAGCT  
 CACTGTGGAGTATCCATGGAGATGTGGAGCCTTGTACCAACCTCTAACTGCAGAACTGG  
 GATGTGGAGCTGGAAGTGCCTCCTTCTGGGCTGTGCTGGTACAGCCACACTCTGCAC  
 CGTAGGCCGTCGCCGACCTTGCTGAACAAGCCAGCCCTGGGGAGCCCTGTGGAAGT  
 GGAGTCTTCTGGTCCACCCCGGTGACCTGCTGCAGCTTCNCTGTCNGCTGCGGGACGA  
 TGTGCANAGCATCAACTGGCTGCGGGACCGGTGCAGCTGGCGGAAAGCAACGCACCCGC  
 ATCACAGGGGAGAAGTGGAGTGCACGACTCCCTGCCCGCAAACCTCCCGCTTTATGCTG  
 CGTAACAGCAGCCCTCGGCAGTGACACACCTACTTCTCCGCATGTTCAAATGCTCTCCC  
 TCTCCGAGATGAGAGATATGATACCCCTCTCCGGGGAAAAAACATATACCCACCAACC  
 CCGTGTTCCTT

**3' Read Nucleotide Sequence:**

>OriGene 3' read for NM\_023110 unedited  
 ATGACGCGCCGCATCTAGGATCGAGTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTT  
 TTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTTT  
 TTTCTTTTTTTATTTTTTACCTTTTGGGTAAATTCTTGAAACAACCTTTTAAAAAGA  
 AGGGAAATATATCCCAAATAAAACCTTTTGGGGTGCCCCAAACCAAAAAACAAAGCC  
 CCAATTTGGGGCGGGCCCCAGGGCAAAAACCGGCCCAACCGGGCCTTACCCACAC  
 CAACCTGGGGTACCAGCCAATGGGCCAAAAAAGCAACAAGAAAGGGAAAAAAAACCC  
 CGGGCCCCACAAACCGGGGAAAGGGCCCTTCAACCGAGGCACGAAACCCGGGCCCC  
 CCACGGGAGAACCCTGGAGGAAAGGCACCGCCCCCGAAAGCCAGGGGACTAAAGGGGG  
 GGCAAAAAACAAAAACAGGAAGGACAAAAGCCAGAAACCCGCGCGGACAGCGAGAATAA  
 GGCACCAACACAGGGGCAGGAGAAGGCAAGGTGCAACAAAAGGAAACGGCCAAAGCGGG  
 ACGGGAAAAAAGAGACAAGAACAGGGACCGGACAGAGGAGGAAGAAAAAAGGAAGCAAA  
 GAAAAAGGGGGCGGAGACAACAAAGAAAAGAAAGCAACAAAAACGGGGAGAGAAAAAA  
 ACAACAAGACAAACAAACAAACGAAAAACCTGAGACAGAGACGCAAGAAAAGAGAGGACG  
 AAGAAAAAAGAGAGCCGCGGGGAGAGCAAGAAAAGAGAAAGAGAGCCGACAAA  
 GAAACAAAGCGGGAAAGCAAGACGGGCCGAGGAAAGAGAGAAAAAAAACAAAGAGCA  
 GAAACGCGGACAGGAGGAAAAGAAAATCGAAGAGAGAAAAAAAAGAAAAGAC

**Restriction Sites:**

NotI-NotI

**ACCN:**

NM\_023110

**Insert Size:**

2700 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](mailto: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:** The ORF of this clone has been fully sequenced and found to be a perfect match to NM\_023110.2.

**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\\_023110.2](#), [NP\\_075598.2](#)

**RefSeq Size:** 5917 bp

**RefSeq ORF:** 2469 bp

**Locus ID:** 2260

**UniProt ID:** [P11362](#)

**Cytogenetics:** 8p11.23

**Domains:** ig, IGc2, IG

**Protein Families:** Druggable Genome, Protein Kinase, Transmembrane

**Protein Pathways:** Adherens junction, MAPK signaling pathway, Melanoma, Pathways in cancer, Prostate cancer, Regulation of actin cytoskeleton

**Gene Summary:**

The protein encoded by this gene is a member of the fibroblast growth factor receptor (FGFR) family, where amino acid sequence is highly conserved between members and throughout evolution. FGFR family members differ from one another in their ligand affinities and tissue distribution. A full-length representative protein consists of an extracellular region, composed of three immunoglobulin-like domains, a single hydrophobic membrane-spanning segment and a cytoplasmic tyrosine kinase domain. The extracellular portion of the protein interacts with fibroblast growth factors, setting in motion a cascade of downstream signals, ultimately influencing mitogenesis and differentiation. This particular family member binds both acidic and basic fibroblast growth factors and is involved in limb induction. Mutations in this gene have been associated with Pfeiffer syndrome, Jackson-Weiss syndrome, Antley-Bixler syndrome, osteoglophonic dysplasia, and autosomal dominant Kallmann syndrome 2. Chromosomal aberrations involving this gene are associated with stem cell myeloproliferative disorder and stem cell leukemia lymphoma syndrome. Alternatively spliced variants which encode different protein isoforms have been described; however, not all variants have been fully characterized. [provided by RefSeq, Jul 2008]

Transcript Variant: This variant (1) represents the longest transcript and encodes the longest isoform (1), also known as isoform Alpha A1, IV and the 3-Ig domain+2 AA insert form.