

Product datasheet for **SC336885**

GUCY1B1 (NM_001291954) Human Untagged Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	GUCY1B1 (NM_001291954) Human Untagged Clone
Tag:	Tag Free
Symbol:	GUCY1B1
Synonyms:	GC-S-beta-1; GC-SB3; GUC1B3; GUCB3; GUCSB3; GUCY1B3
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)

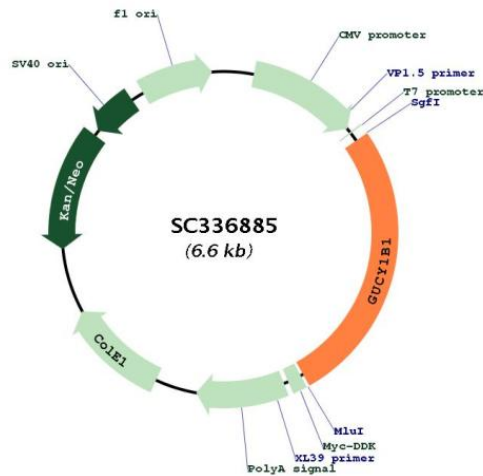


[View online »](#)

Fully Sequenced ORF: >SC336885 representing NM_001291954.
Blue=Insert sequence Red=Cloning site Green=Tag(s)

```
GCTCGTTTAGTGAACCGTCAGAATTTTGTAAACGACTCACTATAGGGCGGCCGGGAATTCGTGACTG
GATCCGGTACCGAGGAGATCTGCCGCCGCGATCGCC
ATGTACGGATTTGTGAATCACGCCCTGGAGTTGCTGGTGATCCGCAATTACGGCCCCGAGGTGTGGGAA
GACATCAAAAAAGAGGCACAGTTAGATGAAGAAGGACAGTTTCTGTGAGAATAATATATGATGACTCC
AAAACTTATGATTTGGTTGCTGCTGCAAGCAAAGTCTCAATCTCAATGCTGGAGAAATCCTCAAATG
TTTGGGAAGATGTTTTTCGTCTTTTCCCAAGAATCTGTTATGATACAATCTTGCCTGCTCGGGCTCT
AATGTCAGAGAATTTCTACAGAACCTTGATGCTCTGCACGACCACCTTGCTACCCTACCCAGGAATG
CGTGCACCTTCTTTAGGTGCACTGATGCAGAAAAGGGCAAAGGACTCATTTTGCCTACTACTCAGAG
AGAGAAGGACTTCAGGATATTGTCATTGGAATCATCAAAACAGTGGCACAACAAATCCATGGCACTGAA
ATAGACATGAAGTTATTCAGCAAAGAAATGAAGAATGTGATCATACTCAATTTTAATTGAAGAAAAA
GAGTCAAAAGAAGAGGATTTTTATGAAGATCTTGACAGATTTGAAGAAAATGGTACCCAGGAATCACGC
ATCAGCCCATATACATTCTGCAAAGCTTTTCTTTTCATATAATTTTGACCGGGACCTAGTGGTCACT
CAGTGTGGCAATGCTATATACAGAGTTCTCCCAAGCTCCAGCCTGGGAATTGCAGCCTTCTGTCTGTC
TTCTCGCTGGTTCTGCTCATATTGATATTAGTTTCCATGGGATCCTTTCTCACATCAATACTGTTTTT
GTATTGAGAAGCAAGGAAGGATTGTTGGATGTGGAGAAATAGAATGTGAGGATGAACTGACTGGGACT
GAGATCAGCTGCTTACGTCTCAAGGGTCAAATGATCTACTTACCTGAAGCAGATAGCATACTTTTTCTA
TGTTCCCAAGTGTATGAACCTGGACGATTTGACAAGGAGAGGGCTGTATCTAAGTGACATCCCTCTG
CATGATGCCACGCGCATCTTGTCTTTTGGGAGAACAATTTAGAGAGGAATACAACTCACCAAGAA
CTGGAAATCCTCACTGACAGGCTACAGCTCACGTTAAGAGCCCTGGAAGATGAAAAGAAAAAGACAGAC
ACTGGCATTGTGGGCTTCAATGCTTTCTGTAGCAAGCATGCATCTGGAGAAGGAGCCATGAAGATCGTC
AACCTCCTCAACGACCTCTACACCAGATTTGACACACTGACTGATTTCCCGAAAAACCCATTTGTTTAT
AAGGTGGAGACTGTTGGTGACAAGTATATGACAGTGAGTGGTTTACCAGAGCCATGCATTACCATGCA
CGATCCATCTGCCACCTGGCCTTGGACATGATGGAAATGCTGGCCAGGTTCAAGTAGATGGTGAATCT
GTTTCAGATAACAATAGGGATACACACTGGAGAGGTAGTTACAGGTGTCATAGGACAGCGGATGCCTCGA
TACTGTCTTTTTGGGAATACTGTCAACCTCACAAGCCGAACAGAAACCACAGGAGAAAAGGGAAAAATA
AATGTGTCTGAATATACATACAGATGTCTTATGTCTCCAGAAAATTCAGATCCACAATTCCTTGGAG
CACAGAGGCCAGTGTCCATGAAGGGCAAAAAAGAACCAATGCAAGTTTGGTTTCTATCCAGAAAAAT
ACAGGAACAGAGGAAACAAGCAGGATGATGACTGA
ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGAT
TACAAGGATGACGACGATAAGGTTAAACGGCCGGC
```

Restriction Sites: SgfI-MluI

Plasmid Map:


ACCN: NM_001291954

Insert Size: 1761 bp

OTI Disclaimer: Our molecular clone sequence data has been matched to the reference identifier above as a point of reference. Note that the complete sequence of our molecular clones may differ from the sequence published for this corresponding reference, e.g., by representing an alternative RNA splicing form or single nucleotide polymorphism (SNP).

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_001291954.1](#)

RefSeq Size: 3162 bp

RefSeq ORF: 1761 bp

Locus ID: 2983

UniProt ID: [Q02153](#)

Cytogenetics: 4q32.1

Protein Families: Druggable Genome

Protein Pathways: Gap junction, Long-term depression, Purine metabolism, Vascular smooth muscle contraction

MW: 66.7 kDa

Gene Summary: This gene encodes the beta subunit of the soluble guanylate cyclase (sGC), which catalyzes the conversion of GTP (guanosine triphosphate) to cGMP (cyclic guanosine monophosphate). The encoded protein contains an HNOX domain, which serves as a receptor for ligands such as nitric oxide, oxygen and nitrovasodilator drugs. Alternative splicing results in multiple transcript variants. [provided by RefSeq, May 2014]
Transcript Variant: This variant (5) lacks an alternate in-frame exon in the 5' coding region and contains an alternate in-frame splice site in the 3' coding region, compared to variant 1. It encodes isoform 5, which is shorter than isoform 1.