

## Product datasheet for **RG207893**

### **GALNT2 (NM\_004481) Human Tagged ORF Clone**

#### **Product data:**

Product Type:	Expression Plasmids
Product Name:	GALNT2 (NM_004481) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	GALNT2
Synonyms:	CDG2T; GalNAc-T2
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

**ORF Nucleotide Sequence:**

>RG207893 representing NM\_004481  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGCATCGCC**

ATGCGCGCGGCTCGCGGATGCTGCTCTGCTTCGCTTCTGTTGGGTGCTGGGCATCGCCTACTACATGT  
 ACTCGGGGGCGGCTCTGCGCTGGCCGGGGCGCGGGCGGCCCGCAGGAAGGAGGACTGGAATGA  
 AATTGACCCCATTA AAAAGAAAGACCTTCATCACAGCAATGGAGAAGAGAAAGCACAAGCATGGAGACC  
 CTCCTCCAGGAAAGTACGGTGGCCAGACTTTAACCAGGAAGCTTATGTTGGAGGGACGATGGTCCGCT  
 CCGGGCAGGACCCTTACGCCCGCAACAAGTTCAACCAGGTGGAGAGTGATAAGCTTCGAATGGACAGAGC  
 CATCCCTGACACCCGGCATGACCAGTGTGACGGGAAGCAGTGGCGGGTGGATCTGCCGCCACCAGCGTG  
 GTGATCACGTTTCAATGAAGCCAGTTCGGCCCTACTCAGGACCGTGGTCAAGCTTAAAGAAAGCC  
 CGCCCATCTCAAAAAGAAATCATCTTGGTGGATGACTACAGCAATGATCCTGAGGACGGGGCTCTCTT  
 GGGGAAAATTGAGAAAGTGCAGTTCCTAGAAAATGATCGACGAGAAGGCCTCATGCGCTCACGGGTTCCG  
 GGGCCGATGCTGCCAAGCCAAGTCTGACCTTCTGGACAGTCACTGCGAGTGAATGAGCACTGGC  
 TGGAGCCCTCTGAAAAGGGTGGCGGAGGACAGGACTCGGGTGTGTCACCCATCATCGATGTCATTAA  
 TATGGACAATTTAGTATGTGGGGCATCTGCTGACTTGAAGGGCGGTTTTGATTGGAACCTGGTATTC  
 AAGTGGGATTACATGACGCTGAGCAGAGAAGTCCCAGGAGGGAACCCAGTCGCCCCTATAAAAACCC  
 CCATGATTGCTGGTGGGCTGTTTGTGATGGATAAGTCTATTTTGAAGAACTGGGGAAGTACGACATGAT  
 GATGGATGTGTGGGAGGAGAGAACCTAGAGATCTCGTCCGCGTGTGGCAGTGTGGTGGCAGCCTGGAG  
 ATCATCCCGTGCAGCCGTGTGGACACGTGTTCCGGAAGCAGCACCCCTACACGTTCCCGGGTGGCAGTG  
 GCACTGCTTTGCCCGAAACACCCCGGCGAGCAGAGTCTGGATGGATGAATACAAAAATTTCTATTA  
 TGACAGAGTGCCTTCTGCTAGAAAACGTTCTTATGGAAAATTTTCAGAGCAGATTGGAGCTTAGGAAGAAA  
 CTCAGCTGCAAGCCTTTCAAATGGTACCTTGA AAAATGTCTATCCAGAGTTAAGGGTTCAGACCATCAGG  
 ATATAGCTTTTGGGGCTTGACAGGGAACCTAAGTGCCTCGACACTTTGGGACACTTTGCTGATGGTGT  
 GGTTGGAGTTTATGAATGTCAATGCTGGGGAAACCAGGAATGGGCCTTGACGAAGGAGAAGTCAAGT  
 AAGCACATGGATTTGTCCTTACTGTGGTGGACCGGGCACCAGGCTCTCTATAAAGCTGCAGGGCTGCC  
 GAGAAAATGACAGCAGACAGAAATGGGAACAGATCGAGGGCAACTCCAAGCTGAGGCACGTGGGCAGCAA  
 CCTGTGCCTGGACAGTCGACGGCCAAGAGCGGGGGCCTAAGCGTGGAGGTGTGTGGCCCGCCCTTTCG  
 CAGCAGTGAAGTTCACGCTCAACCTGCAGCAG

**ACGCGT**ACGCGGCCGCTCGAG – GFP Tag – GTTTAA

**Protein Sequence:**

>RG207893 representing NM\_004481  
 Red=Cloning site Green=Tags(s)

MRRRSRMLLCFAFLWVLGIAYMYSGGGSALAGGAGGAGRKEDWNEIDPIKKKDLHHSNGEKAQSMET  
 LPPGKVRWPDFNQEAYVGGTMVRSQDPYARNKFNQVESDKLRMDRAIPDTRHDQCQRKQWRVDLPATSV  
 VITFHNEARSALLRVTVSVLKKSPPHLIKEIILVDDYSNDPEDGALLGKIEKVRVLRNDRREGLMRSRVR  
 GADAAQAKVLTFLDSHCECNEHWLEPLLERVAEDRTRVVSPIIDVINMDFQYVVASADLKGGFDWNLVF  
 KWDYMTPEQRRSRQGNPVAPIKTPMIAGGLFVMDKIFYEELGKYDMMMDVWGGENLEISFRVWQCGGSLE  
 IIPCSRVGHVFRKQHPYTFPGSGTVFARNTRAAEVWMDEYKNFYAAVPSARNVPYGNIQSRLELRKK  
 LSCKPFKWYLENVYPELRVDPHQDIAFGALQQGTNCLDTLGHFADGVVGVYECHNAGGNQEWALTKEKSV  
 KHMDLCLTVVDRAPGSLIKLQGRENDSRQKWEQIEGNSKLRHVGSNLCDSRTAKSGGLSVEVCGPALS  
 QQWKFTLNLQQ

**TRTRPLE** – GFP Tag – V

**Restriction Sites:**

Sgfl-MluI

**Cloning Scheme:**


**ACCN:** NM\_004481

**ORF Size:** 1713 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\\_004481.2](#), [NP\\_004472.1](#)

**RefSeq Size:** 4447 bp

**RefSeq ORF:** 1716 bp

**Locus ID:** 2590

**UniProt ID:** [Q10471](#)

**Cytogenetics:** 1q42.13

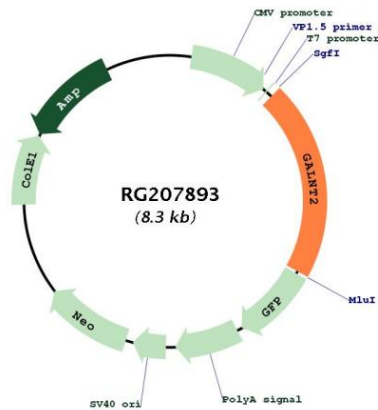
**Domains:** RICIN, Glycos\_transf\_2

**Protein Families:** Secreted Protein, Transmembrane

**Protein Pathways:** Metabolic pathways, O-Glycan biosynthesis

**Gene Summary:** This gene encodes a member of the glycosyltransferase 2 protein family. Members of this family initiate mucin-type O-glycosylation of peptides in the Golgi apparatus. The encoded protein may be involved in O-linked glycosylation of the immunoglobulin A1 hinge region. This gene may influence triglyceride levels, and may be involved Type 2 diabetes, as well as several types of cancer. Alternative splicing results in multiple transcript variants. [provided by RefSeq, May 2014]

**Product images:**



Circular map for RG207893