

Product datasheet for **MG216421**

Gpr37II (NM_134438) Mouse Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Tag:	TurboGFP
Symbol:	Gpr37II
Synonyms:	AW047233; CAG-18; D0Kist8
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

ORF Nucleotide Sequence: >MG216421 representing NM_134438
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGCCGGGAATTCGTGCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGGATCGCC**

ATCGGGTGGCTGTGGCCCTGGCTGTGTCTTTGTTGTAGTGTGACTGTGGGCTGAGTGGGGTCTCTG
 GGGCTGCCACCTCATCTTTAGGTGGGCATAGAGCCAAGGTCCAGGAGCAGCAGAGTCGACCCGAAGAGG
 CACCAAGGACGAGGGGCCAAGGAGGTACAGCACTATGTACCCGAGGAGTGGGCTGAATATCCCAAGCCC
 ATCCATCCTGCTGGCCTGCAGCCCACCAAGACTTTGGAGGCCACTAGCCCCAACCCAGACAAGGATGGGG
 CCACCCCAAGTAATGGACAAGAGCTGAGGGTCAACCTGACCGGGACGCCAAGTCAGAGGCTGCAGATTCA
 GAACCCCTGTATCCGGTGACCGAGAGCTCCTACAGCGCCTACGCCATCATGCTCCTGGCTTGGTGGTG
 TTTGCTGTGGGTATCGTTGGCAATCTGTCTGTCAATGTGATTGTGGCACAGCTACTACTGAAGAGTG
 CCTGGAACCTATCCTTCCAGCCTGGCTCTCTGGGATTTCTTGGTCTCTTCTTCTGCCTCCCAATTGT
 CATCTTCAATGAGATTACCAAGCAAAGGCTACTCGGGATGTTTCTTCCGGGAGTGCCTTCATGGAG
 GTCTCCTCCCTGGGAGTCAACCTTCAGTCTCTGTGCCCTGGGCATAGACCGATTCCATGTGGCCACCA
 GCACCTGCCAAAGGTGAGGCCATTGAGCGATGTCAATCAATTCTGGCTAAACTAGCTGTCACTGGGT
 GGGCTCCATGATGCTGGCCGTGCCGAACCTCTGCTATGGCAGCTGGCCAGGAGCCGGCTCCCACCGCA
 GAACTGTGGACTCGTGTATCATGAAACCTTCAGCTGACCTGCCGAATCTGTCTATTCGCTGGTGTGA
 CCTACCAGAAATGCCCGCATGTGGTGGTATTTTGGTTGCTACTTCTGTCTGCCCATCCTCTCACCGTCA
 CTGTACAGTGGTGACGTGGCGGGTGCGGGGCCACCAGGCAGGAAGCCTGAGTGTAGAGCGGGCAGGCAT
 GAGCAGTGTGAGAGCCAGCTCAACAGCACCGTGGTGGCCTGACTGTGGTCTATGCCTTCTGTACTCTCC
 CTGAGAACGTCTGCAATATCGTGGTGGCTTACCTCTCTACCGAGCTCACCGGCAGACCCTGGACCTCCT
 GGGCCTCATCAACCAAGTCTCCACCTTCTTTAAGGGCGCCATCACCCCTGTGCTCCTCCTGTGCATCTGC
 AGGCCACTGGGCCAGGCCCTTCTGGATTGCTGTGCTGCTGCTGCTGCGAGGAGTGGCGGGGGCCTCAG
 ACTCCTCAGCCACAGTCAGCGCGGACAGCAAGCTGAAGGCGGAAGTGCCTCTTCTATCTACTTCCACAA
 GCCAGGGAGTCGCCCCCACTCTGCCCTGGGCACCCCTTGC

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >MG216421 representing NM_134438
 Red=Cloning site Green=Tags(s)

MRWLWPLAVSLVVVLTVGLSGVSGAATSSLGGHRAKVQEQQSRPRRGTKDEGPKEVQHYPVEEWAIEYKPK
 IHPAGLQPTKLEATSPNPKDGATPGNGQELRVNLGTGPSQLQIQNPLYPVTESSYSAYAIMLLALVV
 FAVGIVGNLSVMCIVVHWSYLLKSAWNSILASLALWDFLVLFCLPIVIFNEITKQRLLDVSCRAVPFME
 VSSLGVTTFSLCALGIDRFHVATSTLPKVRPIERCQSILAKLAVIIVGSMMLAVPELLLWQLAQEPAPTA
 GTVDSCIMKPSADLPESVYSLVMTYQNARMWYFGCYFCLPILFTVTCQLVTVWRVGRPPGRKPECRAGRH
 EQCESQLNSTVVGLTVVYAFCTLPENVCNIVVAYLSTELTRQTLDLLGLINQFSTFFKGAITPVLLLCIC
 RPLGQAFLDCCCCCECGGASDSSATVSADSKLKAIEVSSSIYFHKPRESPPLPLGTPC

TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI

Cloning Scheme:


ACCN: NM_134438

ORF Size: 1443 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.

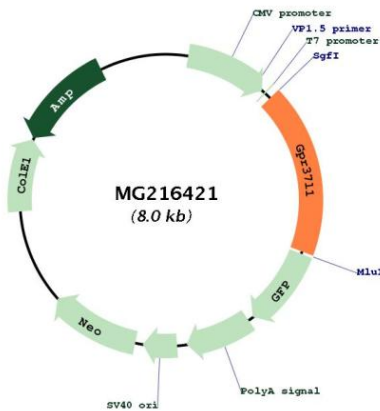
Note: Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.

RefSeq: [NM_134438.3](#), [NP_602320.2](#)

RefSeq Size:	2267 bp
RefSeq ORF:	1446 bp
Locus ID:	171469
UniProt ID:	Q99JG2
Cytogenetics:	1 E4

Gene Summary: G-protein coupled receptor (PubMed:27072655). Has been shown to bind the neuroprotective and glioprotective factor prosaposin (PSAP), leading to endocytosis followed by an ERK phosphorylation cascade (By similarity). However, other studies have shown that prosaposin does not increase activity (By similarity). It has been suggested that GPR37L1 is a constitutively active receptor which signals through the guanine nucleotide-binding protein G(s) subunit alpha (By similarity). Participates in the regulation of postnatal cerebellar development by modulating the Shh pathway (PubMed:24062445). Regulates baseline blood pressure in females and protects against cardiovascular stress in males (PubMed:29625592). Mediates inhibition of astrocyte glutamate transporters and reduction in neuronal N-methyl-D-aspartate receptor activity (PubMed:28795439).[UniProtKB/Swiss-Prot Function]

Product images:



Circular map for MG216421