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Product datasheet for RG211229

Calcium Sensing Receptor (CASR) (NM_000388) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Calcium Sensing Receptor (CASR) (NM_000388) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	Calcium Sensing Receptor
Synonyms:	CAR; EIG8; FHH; FIH; GPRC2A; hCasR; HHC; HHC1; HYPOC1; NSHPT; PCAR1
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)

ORF Nucleotide Sequence:

>RG211229 representing NM_000388
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCCGCGATCGCC

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ATCATCAACTGGCACCTCTCCCCAGAGGATGGCTCCATCGTGTTTAAGGAAGTCGGGTATTACAACGTCT
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ACGTAGTGAATTCA

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence:

>RG211229 representing NM_000388
Red=Cloning site Green=Tags(s)

MAFYSCCWVLLALTWHTSAYGPDQRAQKKGDIILGGLFPIHFGVAAKDQDLKSRPESVECIRYNFRGFRW
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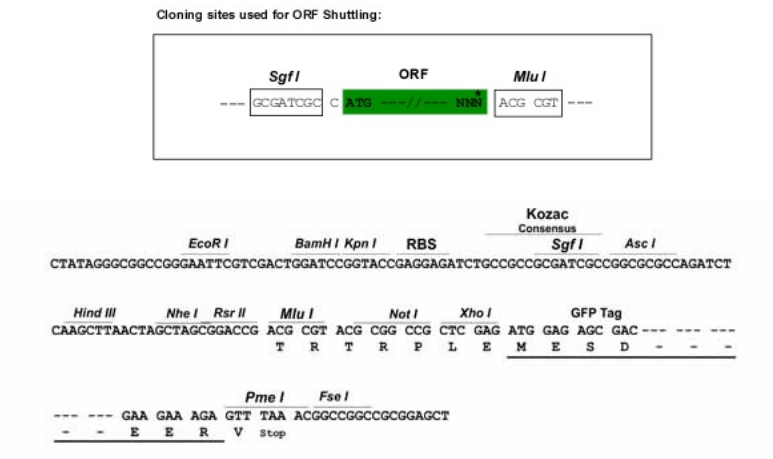
TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI

Cloning Scheme:



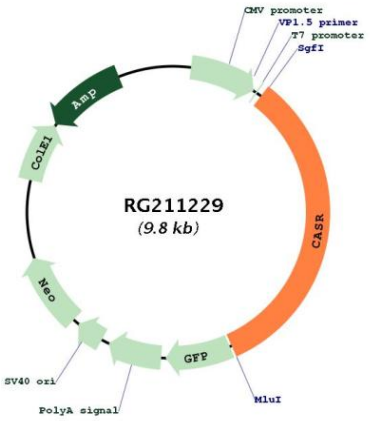
ACCN:	NM_000388
ORF Size:	3234 bp
OTI Disclaimer:	The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own 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_000388.3
RefSeq Size:	4913 bp
RefSeq ORF:	3237 bp
Locus ID:	846
UniProt ID:	P41180

Cytogenetics: 3q13.33-q21.1

Protein Families: Druggable Genome, GPCR, Transmembrane

Gene Summary: The protein encoded by this gene is a plasma membrane G protein-coupled receptor that senses small changes in circulating calcium concentration. The encoded protein couples this information to intracellular signaling pathways that modify parathyroid hormone secretion or renal cation handling, and thus this protein plays an essential role in maintaining mineral ion homeostasis. Mutations in this gene are a cause of familial hypocalciuric hypercalcemia, neonatal severe hyperparathyroidism, and autosomal dominant hypocalcemia. [provided by RefSeq, Aug 2017]

Product images:



Circular map for RG211229