

## Product datasheet for RC234006

### Beta Arrestin 2 (ARRB2) (NM\_001257331) Human Tagged ORF Clone

#### Product data:

**Product Type:** Expression Plasmids  
**Product Name:** Beta Arrestin 2 (ARRB2) (NM\_001257331) Human Tagged ORF Clone  
**Tag:** Myc-DDK  
**Symbol:** Beta Arrestin 2  
**Synonyms:** ARB2; ARR2; BARR2  
**Mammalian Cell Selection:** Neomycin  
**Vector:** pCMV6-Entry (PS100001)  
**E. coli Selection:** Kanamycin (25 ug/mL)  
**ORF Nucleotide Sequence:** >RC234006 representing NM\_001257331  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGATCGCC**

ATGGGGGAGAAACCCGGGACCAGGGTCTTCAAGAAGTCGAGCCCTAACTGCAAGCTCACCGTGTACTTGG  
 GCAAGCGGGACTTCGTAGATCACCTGGACAAAGTGACCCTGTAGTGTGGTGGACCTCACCTGCGCCTT  
 CCGCTATGGCCGTGAAGACCTGGATGTGCTGGCTTGTCTTCCGCAAAGACCTGTTTCATCGCCACCTAC  
 CAGGCCTCCCCCGGTGCCAACCCACCCCGGCCCCACCCGCTGCAGGACCGGCTGCTGAGGAAGC  
 TGGCCAGCATGCCACCCCTTCTTCTCACCATACCCAGAATCTCCATGCTCCGTCACTGCAGCC  
 AGGCCAGAGGATACAGGAAAGGCTGCGGCGTAGACTTTGAGATTCGAGCCTTCTGTGCTAAATCACTA  
 GAAGAGAAAAGCCACAAAAGGAAGTCTGTGCGGCTGGTATCCGAAAGGTGCAGTTCGCCCCGGAGAAAC  
 CCGGCCCCAGCCTTCAGCCGAAACCACAGCCACTTCTCATGTCTGACCGGTCCCTGCACCTCGAGGC  
 TTCCCTGGACAAGGAGCTGTACTACCATGGGGAGCCCTCAATGTAAATGTCCACGTCAACCAACTCC  
 ACCAAGACCGTCAAGAAGATCAAAGTCTCTGTGAGACAGTACGCCGACATCTGCCTTTCAGCACCGCCC  
 AGTACAAGTGTCTGTGGCTCAACTCGAACAAGATGACCAGGTATCTCCAGCTCCACATTCTGTAAAGT  
 GTACACCAATAACCCACTGCTCAGCGACAACCCGGGAGAAGCGGGTCTCGCCCTGGATGGGAACTCAAG  
 CACGAGGACACCAACCTGGCTTCCAGCACCATCGTGAAGGAGGGTGCCAAACAAGGAGGTGCTGGAAATCC  
 TGGTGTCTACAGGGTCAAGGTGAAGCTGGTGGTGTCTCGAGGCGGGGATGTCTCTGTGGAGTGCCTTT  
 TGTCTTATGCACCCCAAGCCCCACGACCACATCCCCCTCCCCAGACCCAGTCAGCACCCACCCCCACA  
 CCCCCTTCCCGTCCCCCAGCCGCTCCGGAGACAGATGCCCTGTGGACACCAACCTCATTGAATTTG  
 ATACCAACTATGCCACAGATGATGACATTGTGTTTGGAGACTTTGCCCGCTTCGGCTGAAGGGGATGAA  
 GGATGACGACTATGATGATCAACTCTGC

**ACGCGT**ACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT  
 ACAAGGATGACGACGATAAGGTTTAA



**Protein Sequence:** >RC234006 representing NM\_001257331  
 Red=Cloning site Green=Tags(s)

MGEKPGTRVFKKSSPNCKLTVYLGKRDFVDHLDKVDPVVFTLTCAFRYGREDLDVLGLSFRKDLFIATY  
 QAFPPVNPPTLQDRLLRKLQHAHPFFFTIPQNLPCSVTLQPGPEDTGKACGVDFEIRAFCAKSL  
 EEKSHKRNSVRLVIRKQVFAPEKPGPQPSAETTRHFLMSDRSLHLEASLDKELYHGEPLNVNVHTNNS  
 TKTVKKIKVSVRQYADICLFSTAQYKCPVAQLEQDDQVSPSSFTCKVYITPLLSDNREKRLALDGKLLK  
 HEDTNLASSTIVKEGANKEVLGILVSYRVKVKLVVSRGGDVSVELPFVLMHPKPHDIPLPRPQSAPTPT  
 PPLPVPPAAPETDVPVDTNLIIEFDNTYATDDDIVFEDFARLRLKGMKDDDYDDQLC

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

**Restriction Sites:**

SgfI-MluI

**Cloning Scheme:**

Cloning sites used for ORF Shuttling:



\* The last codon before the Stop codon of the ORF

**ACCN:** NM\_001257331

**ORF Size:** 1218 bp

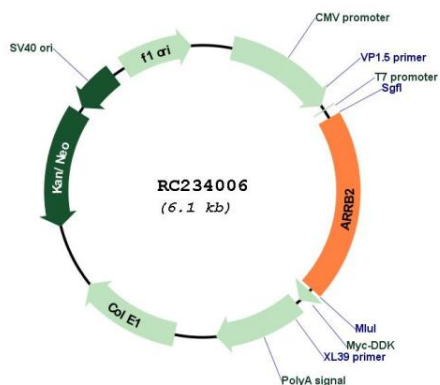
**OTI Disclaimer:** The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone 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).

<b>Reconstitution Method:</b>	<ol style="list-style-type: none"><li>1. Centrifuge at 5,000xg for 5min.</li><li>2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.</li><li>3. Close the tube and incubate for 10 minutes at room temperature.</li><li>4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.</li><li>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.</li></ol>
<b>RefSeq:</b>	<u>NM_001257331.2</u>
<b>RefSeq Size:</b>	1927 bp
<b>RefSeq ORF:</b>	1221 bp
<b>Locus ID:</b>	409
<b>UniProt ID:</b>	<u>P32121</u>
<b>Cytogenetics:</b>	17p13.2
<b>Protein Families:</b>	Druggable Genome
<b>Protein Pathways:</b>	Chemokine signaling pathway, Endocytosis, MAPK signaling pathway, Olfactory transduction
<b>MW:</b>	46 kDa
<b>Gene Summary:</b>	<p>Members of arrestin/beta-arrestin protein family are thought to participate in agonist-mediated desensitization of G-protein-coupled receptors and cause specific dampening of cellular responses to stimuli such as hormones, neurotransmitters, or sensory signals. Arrestin beta 2, like arrestin beta 1, was shown to inhibit beta-adrenergic receptor function in vitro. It is expressed at high levels in the central nervous system and may play a role in the regulation of synaptic receptors. Besides the brain, a cDNA for arrestin beta 2 was isolated from thyroid gland, and thus it may also be involved in hormone-specific desensitization of TSH receptors. Multiple alternatively spliced transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq, Mar 2012]</p>

Product images:



Circular map for RC234006