

## Product datasheet for RC207384

### Kv beta 1 (KCNAB1) (NM\_172159) Human Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	Kv beta 1 (KCNAB1) (NM_172159) Human Tagged ORF Clone
Tag:	Myc-DDK
Symbol:	KCNAB1
Synonyms:	AKR6A3; hKvb3; hKvBeta3; KCNA1B; KV-BETA-1; Kvb1.3
Vector:	pCMV6-Entry (PS100001)
E. coli Selection:	Kanamycin (25 ug/mL)
Cell Selection:	Neomycin
ORF Nucleotide Sequence:	>RC207384 ORF sequence Red=Cloning site Blue=ORF Green=Tags(s)

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ATGCAAGTCTCCATAGCCTGCACAGAGCACAATTTGAAGAGTCGGAATGGTGAGGACCGACTTCTGAGCA  
AGCAGAGCTCCACCGCCCAATGTGGTAAACGCAGCCCGGCCAAATTCGCACGGTCGCTATCATCGC  
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CTTTGATACTGCCGAAGTCTATGCTGCTGGAAAGGCTGAAGTGATTCTGGGGAGCATCATCAAGAAGAAA  
GGCTGGAGGAGGTCCAGTCTGGTCATAACAACCAAACTCTACTGGGGTGGAAAAGCTGAAACAGAAAAG  
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GAAAGTGGAGGTCCAGCTGCCAGAGCTCTACCACAAAATAGGTGTTGGCGCAATGACATGGTCTCCACTT  
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TCCCAAAGATGACATCACATGTGGTAAATGAGATTGATAACATACTGCGCAACAAGCCCTACAGCAAGAA  
GGACTATAGATCA

ACGCGTACGCGGCCGCTCGAGCAGAAACTCATCTCAGAAGAGGATCTGGCAGCAAATGATATCCTGGATT  
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Protein Sequence: >RC207384 protein sequence  
 Red=Cloning site Green=Tags(s)

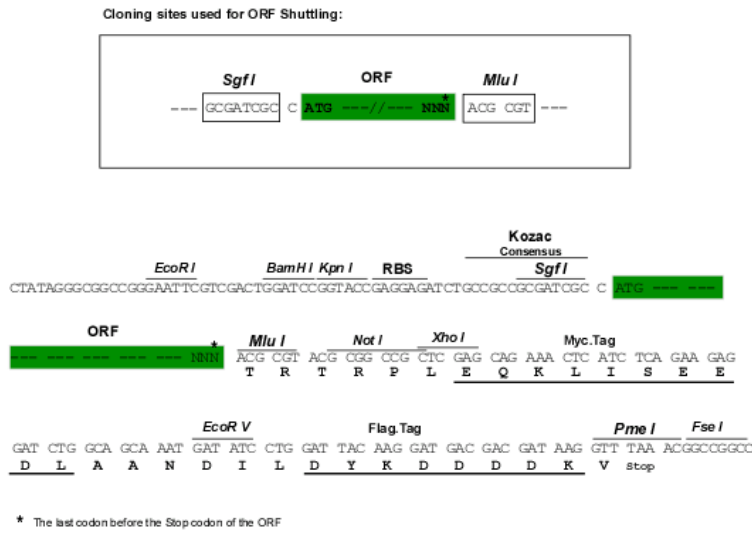
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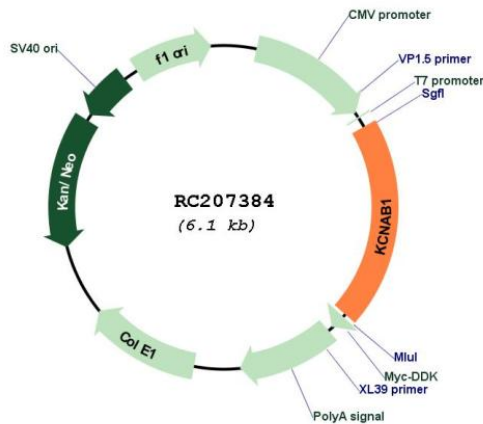
Chromatograms: [https://cdn.origene.com/chromatograms/mk6023\\_f02.zip](https://cdn.origene.com/chromatograms/mk6023_f02.zip)

Restriction Sites: SgfI-MluI

Cloning Scheme:

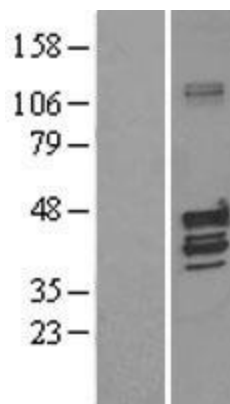


Plasmid Map:

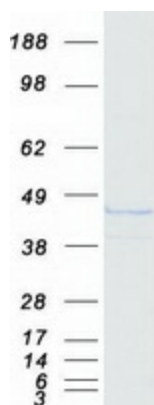


ACCN:	NM_172159
ORF Size:	1203 bp
OTI Disclaimer:	The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. <a href="#">More info</a>
OTI Annotation:	This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.
RefSeq:	<a href="#">NM_172159.1</a> , <a href="#">NM_172159.2</a> , <a href="#">NM_172159.3</a> , <a href="#">NP_751891.1</a>
RefSeq Size:	4518 bp
RefSeq ORF:	1206 bp
Locus ID:	7881
Protein Families:	Druggable Genome, Ion Channels: Other
MW:	44.7 kDa
Gene Summary:	Potassium channels represent the most complex class of voltage-gated ion channels from both functional and structural standpoints. Their diverse functions include regulating neurotransmitter release, heart rate, insulin secretion, neuronal excitability, epithelial electrolyte transport, smooth muscle contraction, and cell volume. Four sequence-related potassium channel genes - shaker, shaw, shab, and shal - have been identified in Drosophila, and each has been shown to have human homolog(s). This gene encodes a member of the potassium channel, voltage-gated, shaker-related subfamily. This member includes distinct isoforms which are encoded by alternatively spliced transcript variants of this gene. Some of these isoforms are beta subunits, which form heteromultimeric complexes with alpha subunits and modulate the activity of the pore-forming alpha subunits. [provided by RefSeq, Apr 2015]

## Product images:



Western blot validation of overexpression lysate (Cat# [LY403531]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC207384 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).



Coomassie blue staining of purified KCNAB1 protein (Cat# [TP307384]). The protein was produced from HEK293T cells transfected with KCNAB1 cDNA clone (Cat# RC207384) using MegaTran 2.0 (Cat# [TT210002]).