

Product datasheet for SC329580

OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

Kv beta 2 (KCNAB2) (NM_001199860) Human Untagged Clone

Product data:

Product Type: Expression Plasmids

Product Name: Kv beta 2 (KCNAB2) (NM_001199860) Human Untagged Clone

Tag: Tag Free Symbol: KCNAB2

Synonyms: AKR6A5; HKvbeta2; HKvbeta2.1; HKvbeta2.2; KCNA2B; KV-BETA-2

Vector: pCMV6-Entry (PS100001)

Fully Sequenced ORF: >SC329580 representing NM_001199860.

Blue=Insert sequence Red=Cloning site Green=Tag(s)

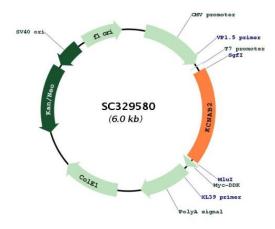
ATGTATCCAGAATCAACGACGGCTCCCCGGCTCGGCTCTCGCTGCGGCAGACGGGCTCCCCCGGGATG ATCTACAGTACTCGGTATGGGAGTCCCAAAAGACAGCTCCAGTTTTACAGGAACCTGGGCAAGTCTGGC CTGCGGGTCTCCTGCCTGGGACTTGGAACATGGGTGACCTTCGGAGGCCAGATCACCGATGAGATGGCA GAGCAGCTCATGACCTTGGCCTATGATAATGGCATCAACCTCTTCGATACAGCAGAAGTCTACGCAGCC GGCAAGGCTGAAGTGGTACTGGGAAACATCATTAAGAAGAAAGGATGGAGGCGGTCCAGCCTCGTCATC ACCACCAAGATCTTCTGGGGCGGAAAGGCGGAGACGGAGCGGGGCCTGTCCAGGAAGCACATAATCGAA GGTCTGAAAGCTTCCCTGGAGCGACTGCAGCTGGAGTACGTGGATGTGGTGTTTGCCAACCGCCCGGAC CCCAACACCCGGTGGAAGAGACCGTCCGCGCCATGACCCACGTCATCAACCAGGGGATGGCCATGTAC TGGGGCACGTCACGCTGGAGCTCCATGGAGATCATGGAGGCCTACTCCGTGGCCCGGCAGTTCAACCTG ACCCCGCCCATCTGCGAGCAGGCTGAGTACCACATGTTCCAGCGTGAGAAAGTGGAGGTGCAGCTGCCG GAGCTGTTCCACAAGATAGGAGTGGGCGCCATGACCTGGTCCCCTCTGGCCTGTGGCATTGTTTCTGGC AAGTACGACAGTGGCATCCCACCCTACTCAAGAGCCTCCTTGAAGGGCTACCAGTGGCTGAAGGACAAG ATCCTCAGTGAGGAGGGCCGGCGCCAGCAAGCCAAGCTGAAGGAGCTGCAGGCCATCGCCGAGCGCCTG GGCTGCACCCTGCCCAGCTGGCCATAGCCTGGTGCCTGAGGAATGAGGGAGTCAGCTCCGTGCTCCTG GGGGCCTCCAATGCGGACCAGCTCATGGAGAACATTGGGGCAATACAGGTCCTTCCGAAACTGTCATCT TCCATTATCCACGAGATTGATAGTATTTTGGGCAATAAACCCTACAGCAAAAAGGACTACAGATCC<mark>TAA</mark>

Restriction Sites: Sgfl-Mlul





Plasmid Map:



ACCN: NM 001199860

Insert Size: 1104 bp

OTI Disclaimer: Our molecular clone sequence data has been matched to the reference identifier above as a

point of reference. Note that the complete sequence of our molecular clones may differ from the sequence published for this corresponding reference, e.g., by representing an alternative

RNA splicing form or single nucleotide polymorphism (SNP).

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

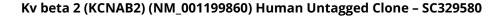
at the bottom.

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: <u>NM 001199860.1</u>

RefSeq Size: 4298 bp





 RefSeq ORF:
 1104 bp

 Locus ID:
 8514

 UniProt ID:
 Q13303

 Cytogenetics:
 1p36.31

Protein Families: Druggable Genome, Ion Channels: Other

MW: 41 kDa

Gene Summary: Voltage-gated potassium (Kv) 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 is one of the beta subunits, which are auxiliary proteins associating with functional Kv-alpha subunits. This member alters functional properties of the KCNA4 gene product. Alternative splicing of this gene results in multiple transcript variants encoding distinct isoforms.

[provided by RefSeq, Dec 2010]

Transcript Variant: This variant (3) has an alternate 5' UTR exon and encodes the same isoform 1, as compared to variant 1. Sequence Note: This RefSeq record was created from transcript and genomic sequence data to make the sequence consistent with the reference genome assembly. The genomic coordinates used for the transcript record were based on

transcript alignments.