

Product Information

MemDX™ Membrane Protein Human KCNAB1 (Potassium voltage-gated channel subfamily A regulatory beta subunit 1) Full Length

Cat. No.: **MPC1040K**

This product is for research use only and is not intended for diagnostic use.

This product is a 46.5 kDa Human KCNAB1 membrane protein expressed in HEK293. The protein is for research use only and is not approved for use in humans or in clinical diagnosis.

Product Specifications

Host Species

Human

Target Protein

KCNAB1

Protein Length

Full length

Protein Class

Transporter; Ion channel

Molecular Weight

46.5 kDa

Sequence

MLAARTGAAGSQISEENTKLRRQSGFSVAGKDKSPKKASENAKDSSLSPS
GESQLRARQLALLREVEMNWYLKLCDSLSEHTTVCTTGMPhRNLGKSLR
VSCLGLGTWVTFGGQISDEVAERLMTIAYESGVNLFDTAEVYAAgKAEVI
LGSIIKKKGWRRSSLVITTKLYWGGKAETERGLSRKHIIEGLKGSQRLQ
LEYVDVVFANRPDSNTPMEEIVRAMTHVINQGMAMYWGTSRWSAMEIMEA
YSVARQFNMIIPPVCEQAEYHLFQREKVEVQLPELYHKIGVGAMTWSPAC
GIIISGKYGNGVPESSRASLKYQWLKERIVSEEGRKQQNKLKDLSPIAER
LGCTLPQLAVAWCLRNEGVSLLGSSTPEQLIENLGAIQVLPKMTSHVV
NEIDNIRNKPYSKKDYRS

Product Description

Expression Systems

HEK293

Tag

Based on specific requirements

Protein Format

Detergent or based on specific requirements

Form

Liquid

Storage

Aliquot and store at -20°C or lower. For long term storage, we recommend to store at -70°C or lower. Avoid freeze/thaw cycles.

Target

Target Protein

KCNAB1

Full Name

Potassium voltage-gated channel subfamily A regulatory beta subunit 1

Introduction

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.

Alternative Names

KCNAB1; hKvb3; AKR6A3; KCNA1B; Kvb1.3; hKvBeta3; KV-BETA-1; voltage-gated potassium channel subunit beta-1; K(+) channel subunit beta-1; K+ channel Beta1a chain; potassium channel beta 3 chain; potassium channel beta3 subunit; potassium channel shaker chain beta 1a; potassium channel, voltage gated subfamily A regulatory beta subunit 1; potassium voltage-gated channel subfamily A member regulatory beta subunit 1; potassium voltage-gated channel, shaker-related subfamily, beta member 1; Potassium voltage-gated channel subfamily A regulatory beta subunit 1

Gene ID

[7881](#)

UniProt ID

[Q14722](#)