abcam

Product datasheet

Recombinant Human Kir4.1 protein ab114456

1 Image

Overview

Product name	Recombinant Human Kir4.1 protein
Protein length	Protein fragment

Description

Nature	Recombinant
Source	Wheat germ

Amino Acid Sequence

Accession	P78508
Species	Human
Sequence	DFELVLILSGTVESTSATCQVRTSYLPEEILWGYEFTPAISLSASGKYIA DFSLFDQVVKVASPSGLRDSTVRYGDPEKLKLEESLREQAEKEGSALSVR ISNV
Molecular weight	37 kDa including tags
Amino acids	276 to 379

Specifications

Our Abpromise guarantee covers the use of **ab114456** in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Applications	Western blot SDS-PAGE ELISA
Form	Liquid
Additional notes	Protein concentration is above or equal to 0.05 mg/ml. ab114456 is best used within three months from the date of receipt.

Preparation and Storage

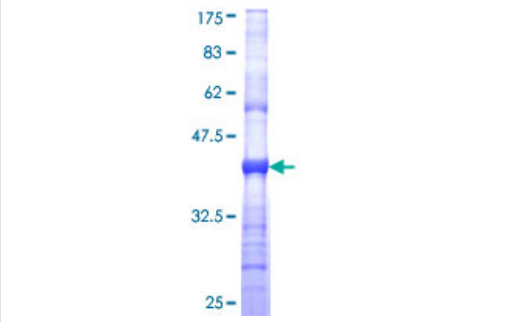
Stability and Storage	Shipped on dry ice. Upon delivery aliquot and store at -80ºC. Avoid freeze / thaw cycles.

pH: 8.00
Constituents: 0.79% Tris HCl, 0.3% Glutathione

General Info

Function	May be responsible for potassium buffering action of glial cells in the brain. Inward rectifier potassium channels are characterized by a greater tendency to allow potassium to flow into the cell rather than out of it. Their voltage dependence is regulated by the concentration of extracellular potassium; as external potassium is raised, the voltage range of the channel opening shifts to more positive voltages. The inward rectification is mainly due to the blockage of outward current by internal magnesium. Can be blocked by extracellular barium and cesium (By similarity). In the kidney, together with KCNJ16, mediates basolateral K(+) recycling in distal tubules; this process is critical for Na(+) reabsorption at the tubules.
Tissue specificity	Expressed in kidney (at protein level).
Involvement in disease	Seizures, sensorineural deafness, ataxia, mental retardation, and electrolyte imbalance
Sequence similarities	Belongs to the inward rectifier-type potassium channel (TC 1.A.2.1) family. KCNJ10 subfamily.
Cellular localization	Membrane. Basolateral cell membrane. In kidney distal convoluted tubules, located in the basolateral membrane where it colocalizes with KCNJ16.

Images



SDS-PAGE - Kir4.1 protein (ab114456)

ab114456 analysed on a 12.5% SDS-PAGE stained with Coomassie Blue.

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