

KCNJ1 / ROMK Antibody (internal region)

Peptide-affinity purified goat antibody Catalog # AF2898a

Specification

KCNJ1 / ROMK Antibody (internal region) - Product Information

Application Primary Accession Other Accession

Reactivity Predicted Host Clonality Concentration Isotype Calculated MW WB P48048 NP_000211.1, NP_722448.1, 3758, 56379 (mouse), 24521 (rat) Human Mouse, Rat Goat Polyclonal 0.5 mg/ml IgG 44795

KCNJ1 / ROMK Antibody (internal region) - Additional Information

Gene ID 3758

Other Names

ATP-sensitive inward rectifier potassium channel 1, ATP-regulated potassium channel ROM-K, Inward rectifier K(+) channel Kir1.1, Potassium channel, inwardly rectifying subfamily J member 1, KCNJ1, ROMK1

Format

0.5 mg/ml in Tris saline, 0.02% sodium azide, pH7.3 with 0.5% bovine serum albumin

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

KCNJ1 / ROMK Antibody (internal region) is for research use only and not for use in diagnostic or therapeutic procedures.

KCNJ1 / ROMK Antibody (internal region) - Protein Information

Name KCNJ1

Synonyms ROMK1

Function

In the kidney, probably plays a major role in potassium homeostasis. 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. This channel is activated by internal ATP and can be blocked by external barium.

Cellular Location

Cell membrane; Multi-pass membrane protein Note=Phosphorylation at Ser-44 by SGK1 is necessary for its expression at the cell membrane.

Tissue Location

In the kidney and pancreatic islets. Lower levels in skeletal muscle, pancreas, spleen, brain, heart and liver

KCNJ1 / ROMK Antibody (internal region) - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

KCNJ1 / ROMK Antibody (internal region) - Images



AF2898a (1 μ g/ml) staining of Human Kidney lysate (35 μ g protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

KCNJ1 / ROMK Antibody (internal region) - Background

This antibody is expected to recognize reported isoforms NP_722449.2 and NP_000211. The following reported variants represent identical protein: NP_722451.1, NP_722449.2, NP_722450.1, NP_722448.1.



KCNJ1 / ROMK Antibody (internal region) - References

Rare independent mutations in renal salt handling genes contribute to blood pressure variation. Ji W, Foo JN, O'Roak BJ, Zhao H, Larson MG, Simon DB, Newton-Cheh C, State MW, Levy D, Lifton RP. Nat. Genet. 2008 May 40 (5): 592-9. PMID: 18391953