

## **Anti-KCNG4** antibody



**Description** Unconjugated Rabbit polyclonal to KCNG4

Model STJ191188

**Host** Rabbit

**Reactivity** Human, Mouse

**Applications** ELISA, WB

Immunogen Synthesized peptide derived from human KCNG4 protein.

**Immunogen Region** 420-500aa

**Gene ID** 93107

Gene Symbol KCNG4

**Dilution range** WB 1:500-2000 ELISA 1:5000-20000

**Specificity** KCNG4 Polyclonal Antibody detects endogenous levels of protein.

**Tissue Specificity** Highly expressed in brain, and at lower levels in liver, small intestine and

colon.

**Purification** KCNG4 antibody was affinity-purified from rabbit antiserum by affinity-

chromatography using epitope-specific immunogen.

**Note** For Research Use Only (RUO).

**Protein Name** Potassium voltage-gated channel subfamily G member 4 Voltage-gated

potassium channel subunit Kv6.4

Molecular Weight 57 kDa

**Clonality** Polyclonal

**Conjugation** Unconjugated

**Isotype** IgG

**Formulation** Liquid form in PBS containing 50% glycerol, and 0.02% sodium azide.

**Concentration** 1 mg/ml

**Storage Instruction** Store at -20°C, and avoid repeat freeze-thaw cycles.

Database Links <u>HGNC:19697OMIM:607603</u>

**Alternative Names** Potassium voltage-gated channel subfamily G member 4 Voltage-gated

potassium channel subunit Kv6.4

**Function** Potassium channel subunit that does not form functional channels by itself.

Can form functional heterotetrameric channels with KCNB1; modulates the delayed rectifier voltage-gated potassium channel activation and deactivation

rates of KCNB1.

**Sequence and Domain Family** The transmembrane segment S4 functions as voltage-sensor and is

characterized by a series of positively charged amino acids at every third position. Channel opening and closing is effected by a conformation change that affects the position and orientation of the voltage-sensor paddle formed by S3 and S4 within the membrane. A transmembrane electric field that is positive inside would push the positively charged S4 segment outwards, thereby opening the pore, while a field that is negative inside would pull the S4 segment inwards and close the pore. Changes in the position and orientation of S4 are then transmitted to the activation gate formed by the

inner helix bundle via the S4-S5 linker region.

**Cellular Localization** Cell membrane. Has to be associated with KCNB1 or possibly another partner

to get inserted in the plasma membrane. Colocalizes with KCNB1 at the plasma membrane. Remains intracellular in the absence of KCNB1.

St John's Laboratory Ltd

**F** +44 (0)207 681 2580

**T** +44 (0)208 223 3081

W http://www.stjohnslabs.com/ E info@stjohnslabs.com