

Human Kv7.2/Kv7.4 Potassium Channel Cell Line

Catalog #CT6148

SPECIFICATIONS:

Class: Voltage-gated potassium channel
Synonym: KCNQ2/KCNQ4
Expression system: CHO cells, tetracycline-inducible
Gene name: KCNQ2/KCNQ4
Mycoplasma status: Negative (MycoAlert Kit)
Packaging: Cryopreserved cells, 6×10^6 cells/vial
Storage recommendation: Liquid nitrogen
Automated assay: QPatch HT™

BACKGROUND: The human KCNQ2 and KCNQ4 genes encode the pore-forming subunits of Kv7.2 and Kv7.4, respectively. These subunits form a heteromeric voltage-gated potassium channel. Kv7.2/Kv7.4 channels expressed in neurons are therapeutic targets in seizure and neuropathic pain.

REPRESENTATIVE DATA:

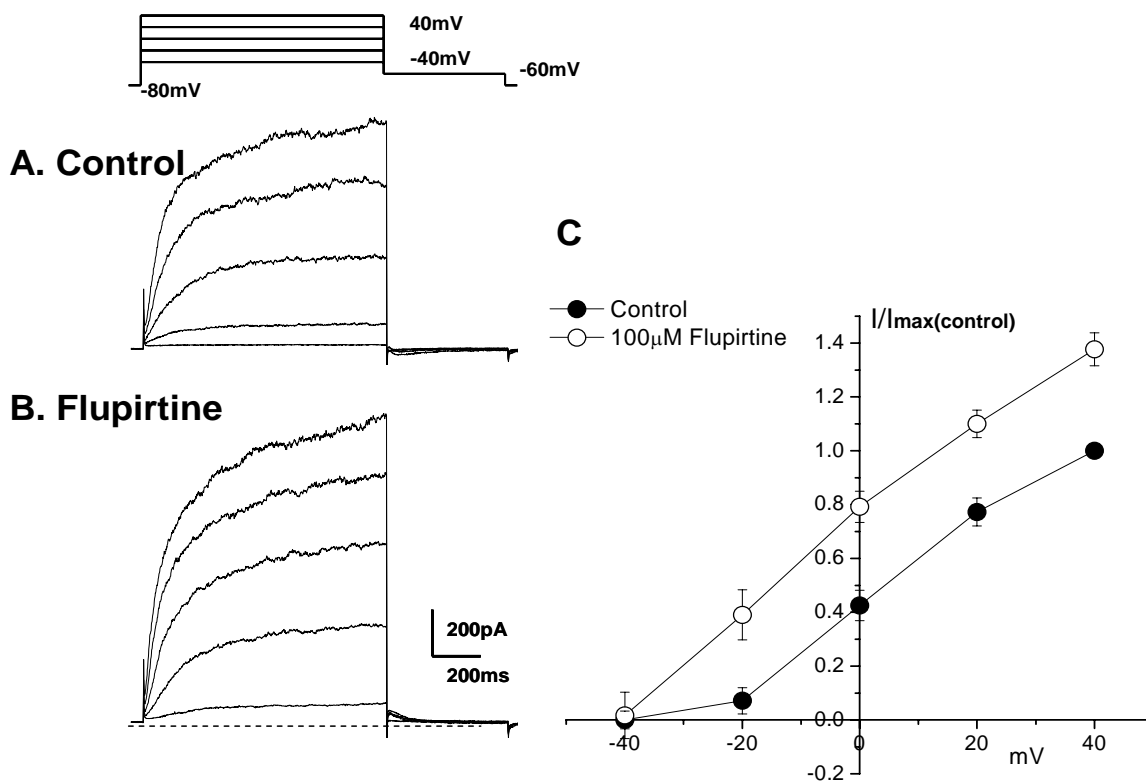


Figure 1. A - B: 100 μ M Flupirtine potentiation of hKv7.2/hKv7.4 channel currents in QPatch HT™. **C:** Current-voltage relationship in control (filled circles) and 100 μ M flupirtine (open circles). Mean \pm SEM.

REFERENCE: Gutman GA, et al. 2005. International Union of Pharmacology. LIII. Nomenclature and molecular relationships of voltage-gated potassium channels. *Pharmacol Rev.* 57:473-508.