

KCNK10 (TREK-2) Polyclonal Antibody
Catalog # AP63687**Specification****KCNK10 (TREK-2) Polyclonal Antibody - Product Information**

Application	WB, IHC-P
Primary Accession	P57789
Reactivity	Human, Rat, Mouse
Host	Rabbit
Clonality	Polyclonal

KCNK10 (TREK-2) Polyclonal Antibody - Additional Information**Gene ID** 54207**Other Names**

Potassium channel subfamily K member 10 (Outward rectifying potassium channel protein TREK-2) (TREK-2 K(+) channel subunit)

Dilution

WB~~WB 1:1000-2000, IHC 1:100-200
IHC-P~~N/A

Format

Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.09% (W/V) sodium azide.

Storage Conditions

-20°C

KCNK10 (TREK-2) Polyclonal Antibody - Protein Information**Name** KCNK10 {ECO:0000303|PubMed:25766236, ECO:0000312|HGNC:HGNC:6273}**Function**

K(+) channel that conducts voltage-dependent outward rectifying currents upon membrane depolarization. Voltage sensing is coupled to K(+) electrochemical gradient in an 'ion flux gating' mode where outward but not inward ion flow opens the gate. Converts to voltage-independent 'leak' conductance mode upon stimulation by various stimuli including mechanical membrane stretch, acidic pH, heat and lipids (PubMed:10880510, PubMed:25766236, PubMed:26919430, PubMed:38605031). Homo- and heterodimerizes to form functional channels with distinct regulatory and gating properties (PubMed:30573346). In trigeminal ganglia sensory neurons, the heterodimer of KCNK10/TREK-2 and KCNK18/TRESK inhibits neuronal firing and neurogenic inflammation by stabilizing the resting membrane potential at K(+) equilibrium potential as well as by regulating the threshold of action potentials and the spike

frequency (By similarity). Permeable to other monovalent ions such as Rb(+) and Cs(+)
(PubMed:26919430).

Cellular Location

Cell membrane {ECO:0000250|UniProtKB:Q8BUW1}; Multi-pass membrane protein

Tissue Location

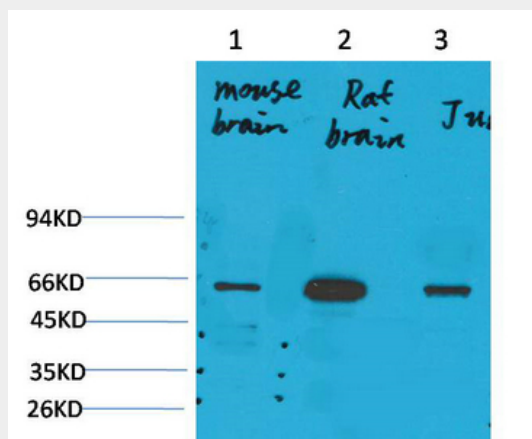
[Isoform A]: Abundantly expressed in pancreas and kidney and to a lower level in brain, testis, colon, and small intestine. In brain, mainly expressed in cerebellum, occipital lobe, putamen, and thalamus. No expression is detected in amygdala and spinal cord. [Isoform C]: Abundantly expressed in brain.

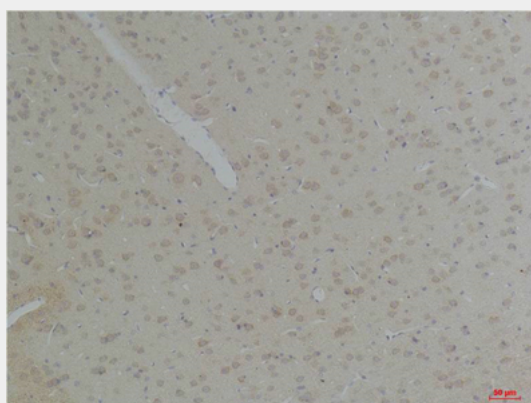
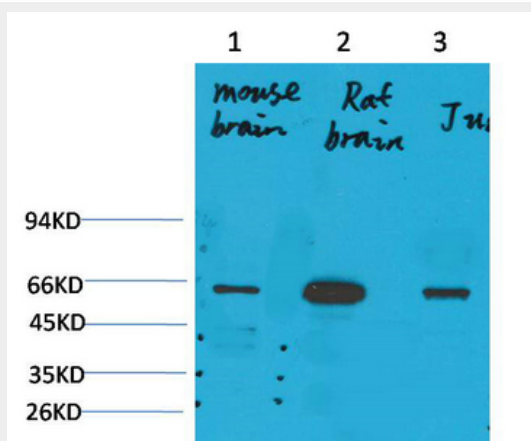
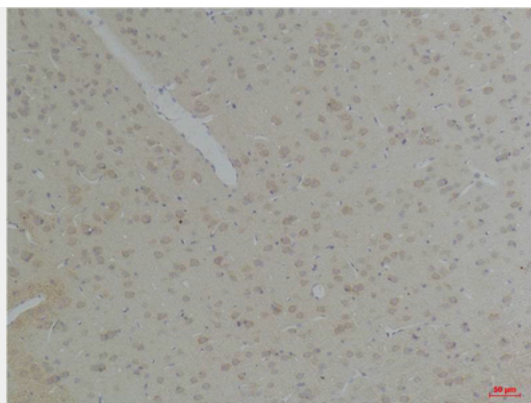
KCNK10 (TREK-2) Polyclonal Antibody - Protocols

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

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

KCNK10 (TREK-2) Polyclonal Antibody - Images





KCNK10 (TREK-2) Polyclonal Antibody - Background

Outward rectifying potassium channel. Produces rapidly activating and non-inactivating outward rectifier K(+) currents. Activated by arachidonic acid and other naturally occurring unsaturated free fatty acids.