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KV3.1 Polyclonal Antibody
Catalog # AP70693

Specification

KV3.1 Polyclonal Antibody - Product Information

Application	**WB**
Primary Accession	P48547
Reactivity	**Human, Mouse, Rat**
Host	**Rabbit**
Clonality	**Polyclonal**

KV3.1 Polyclonal Antibody - Additional Information

Gene ID 3746

Other Names
KCNC1; Potassium voltage-gated channel subfamily C member 1; NGK2; Voltage-gated potassium channel subunit Kv3.1; Voltage-gated potassium channel subunit Kv4

Dilution
WB~~Western Blot: 1/500 - 1/2000. Immunohistochemistry: 1/100 - 1/300. ELISA: 1/5000. Not yet tested in other applications.

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

Storage Conditions
-20℃

KV3.1 Polyclonal Antibody - Protein Information

Name KCNC1 {ECO:0000303|PubMed:8449507, ECO:0000312|HGNC:HGNC:6233}

Function
Voltage-gated potassium channel that opens in response to the voltage difference across the membrane and through which potassium ions pass in accordance with their electrochemical gradient (PubMed:25401298, PubMed:35840580). The mechanism is time-dependent and inactivation is slow (By similarity). Plays an important role in the rapid repolarization of fast-firing brain neurons (By similarity). Can form functional homotetrameric channels and heterotetrameric channels that contain variable proportions of KCNC2, and possibly other family members as well (By similarity). Contributes to fire sustained trains of very brief action potentials at high frequency in pallidal neurons (By similarity).

Cellular Location
Cell membrane; Multi-pass membrane protein. Cell projection, axon {ECO:0000250|UniProtKB:P25122}. Presynaptic cell membrane

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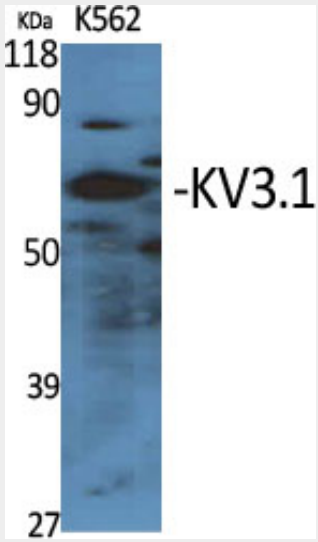
{ECO:0000250|UniProtKB:P25122}. Note=Localizes in parallel fiber membranes, distributed on the perisynaptic and extrasynaptic membranes away from the active zones. {ECO:0000250|UniProtKB:P25122}

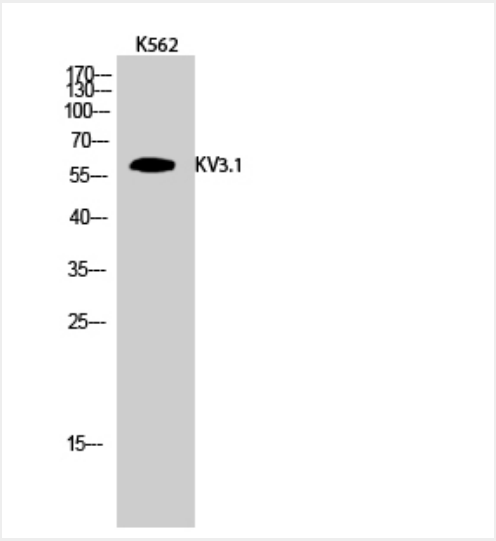
KV3.1 Polyclonal Antibody - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

KV3.1 Polyclonal Antibody - Images





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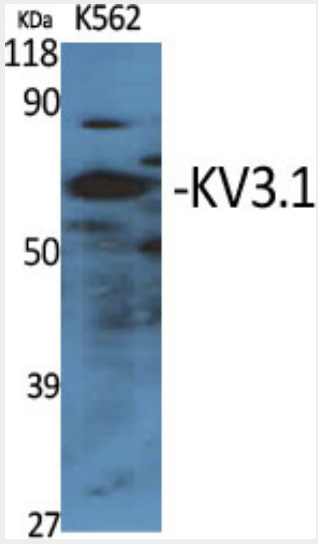

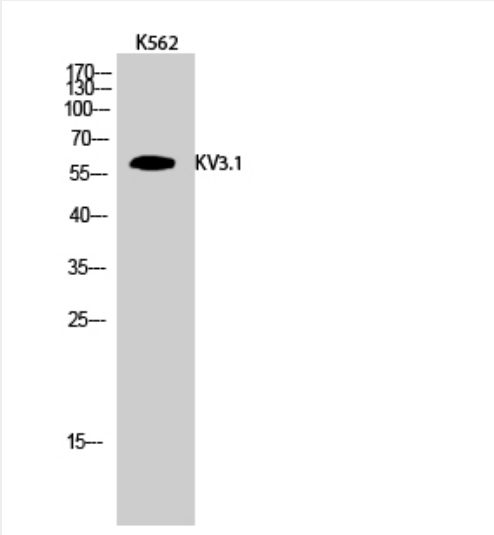

KV3.1 Polyclonal Antibody - Background

Voltage-gated potassium channel that plays an important role in the rapid repolarization of fast-firing brain neurons. The channel opens in response to the voltage difference across the membrane, forming a potassium-selective channel through which potassium ions pass in accordance with their electrochemical gradient (PubMed:25401298). Can form functional homotetrameric channels and heterotetrameric channels that contain variable proportions of KCNC2, and possibly other family members as well. Contributes to fire sustained trains of very brief action potentials at high frequency in pallidal neurons.