

# KCNQ3 Polyclonal Antibody

## Product Details

Size	100 µg
Species Reactivity	Human, Mouse, Rat
Published Species	Human
Host/Isotype	Rabbit / IgG
Class	Polyclonal
Type	Antibody
Conjugate	Unconjugated
Immunogen	GST fusion protein encoding the first 71 amino acids of rat KCNQ3.
Form	Liquid
Concentration	1 mg/mL
Purification	Antigen affinity chromatography
Storage buffer	PBS with 1mg/mL BSA
Contains	0.02% sodium azide
Storage conditions	-20° C, Avoid Freeze/Thaw Cycles
RRID	AB_2131708

Applications	Tested Dilution	Publications
Western Blot (WB)	-	1 Publication
Immunohistochemistry (Frozen) (IHC (F))	0.5 µg/mL	-
Immunocytochemistry (ICC/IF)	2 µg/mL	1 Publication
Miscellaneous PubMed (Misc)	-	1 Publication

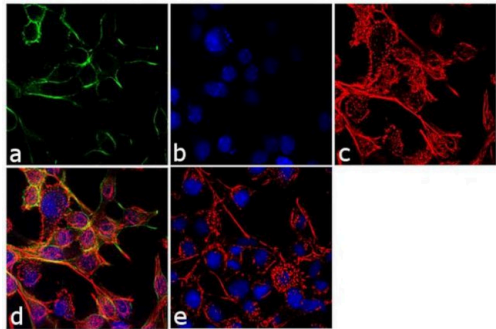
## Product Specific Information

PA1-930 detects KCNQ3 from mouse, human and rat samples. This antibody is specific for KCNQ3 and does not detect KCNQ1, KCNQ2, KCNQ4 or KCNQ5.

PA1-930 has been successfully used in immunofluorescence, immunohistochemistry and immunocytochemistry procedures. Immunohistochemical staining using PA1-930 yielded a strong signal mainly in interneurons and astrocytes in the dentate region of rat hippocampal samples.

PA1-930 immunogen is a GST fusion protein encoding the first 71 amino acids of rat KCNQ3.

Product Images For KCNQ3 Polyclonal Antibody



**KCNQ3 Antibody (PA1-930) in ICC/IF**  
Immunofluorescence analysis of KCNQ3 was performed using 70% confluent log phase RSC-96 cells. The cells were fixed with 4% paraformaldehyde for 10 minutes, permeabilized with 0.1% Triton X-100 for 10 minutes, and blocked with 1% BSA for 1 hour at room temperature. The cells were labeled with KCNQ3 Rabbit Polyclonal Antibody (Product # PA1-930) at 2 µg/mL in 0.1% BSA and incubated for 3 hours at room temperature and then labeled with Goat anti-Rabbit IgG (Heavy Chain) Superclonal Secondary Antibody, Alexa Fluor® 488 conjugate (Product # A27034) at a dilution of 1:2000 for 45 minutes at room temperature (Panel a: green). Nuclei (Panel b: blue) were stained with SlowFade® Gold Antifade Mountant with DAPI (Product # S36938). F-actin (Panel c: red) was stained with Alexa Fluor® 555 Rhodamine Phalloidin (Product # R415, 1:300). Panel d represents the merged image showing membranous localization. Panel e shows the no primary antibody control. The images were captured at 60X magnification.

3 References

Western Blot (1)

<p>Epilepsia open</p> <p><b>A novel homozygous KCNQ3 loss-of-function variant causes non-syndromic intellectual disability and neonatal-onset pharmacodependent epilepsy.</b></p> <p>"PA1-930 was used in Western Blotting to indicate that a homozygous KCNQ3 loss-of-function variant is responsible for a severe phenotype characterized by neonatal-onset pharmacodependent seizures, with developmental delay and intellectual disability."</p> <p>Authors: Lauritano A,Moutton S,Longobardi E,Tran Mau-Them F,Laudati G,Nappi P,Soldovieri MV,Ambrosino P,Cataldi M,Jouan T,Lehalle D,Maurey H,Philippe C,Miceli F,Vitobello A,Taglialatela M</p>	<p>Year 2019</p> <p>Species Human</p> <p>Dilution 1:1000</p>
---	--

Immunocytochemistry (1)

<p>The EMBO journal</p> <p><b>Loss of the m-AAA protease subunit AFGL causes mitochondrial transport defects and tau hyperphosphorylation.</b></p> <p>"Published figure using KCNQ3 polyclonal antibody (Product # PA1-930) in Immunocytochemistry"</p> <p>Authors: Kondadi AK,Wang S,Montagner S,Kladt N,Kowitz A,Martinelli P,Herholz D,Baker MJ,Schauss AC,Langer T, Rugarli E</p>	<p>Year 2014</p>
---	----------------------

Miscellaneous PubMed (1)

<p>British journal of pharmacology</p> <p><b>Antibodies and a cysteine-modifying reagent show correspondence of M current in neurons to KCNQ2 and KCNQ3 K+ channels.</b></p> <p>"PA1-930 was used in immunocytochemistry and immunohistochemistry to investigate the influence of KCNQ2 and KCNQ3 potassium channels on the M current of neurons"</p> <p>Authors: Roche JP,Westenbroek R,Sorom AJ,Hille B,Mackie K,Shapiro MS</p>	<p>Year 2002</p>
---	----------------------

For Research Use Only. Not for use in diagnostic procedures. Not for resale without express authorization. Products are warranted to operate or perform substantially in conformance with published Product specifications in effect at the time of sale, as set forth in the Production documentation, specifications and/or accompanying package inserts ("Documentation"). No claim of suitability for use in applications regulated by FDA is made. The warranty provided herein is valid only when used by properly trained individuals. Unless otherwise stated in the Documentation, this warranty is limited to one year from date of shipment when the Product is subjected to normal, proper and intended usage. This warranty does not extend to anyone other than the Buyer. Any model or sample furnished to Buyer is merely illustrative of the general type and quality of goods and does not represent that any Product will conform to such model or sample. NO OTHER WARRANTIES, EXPRESS OR IMPLIED, ARE GRANTED INCLUDING WITHOUT LIMITATION, IMPLIED WARRANTIES OF MERCHANTABILITY, FITNESS FOR ANY PARTICULAR PURPOSE, OR NON INFRINGEMENT. BUYER'S EXCLUSIVE REMEDY FOR NON-CONFORMING PRODUCTS DURING THE WARRANTY PERIOD IS LIMITED TO REPAIR, REPLACEMENT OF OR REFUND FOR THE NON-CONFORMING PRODUCT(S) AT SELLER'S SOLE OPTION. THERE IS NO OBLIGATION TO REPAIR, REPLACE OR REFUND FOR PRODUCTS AS THE RESULT OF (I) ACCIDENT, DISASTER OR EVENT OF FORCE MAJEURE, (II) MISUSE, FAULT OR NEGLIGENCE OF OR BY BUYER, (III) USE OF THE PRODUCTS IN A MANNER FOR WHICH THEY WERE NOT DESIGNED, OR (IV) IMPROPER STORAGE AND HANDLING OF THE PRODUCTS. Unless otherwise expressly stated on the Product or in the documentation accompanying the Product, the Product is intended for research only and is not to be used for any other purpose, including without limitation, unauthorized commercial uses, in vitro diagnostic uses, ex vivo or in vivo therapeutic uses, or any type of consumption by or application to human or animals.