#3486 Store at -20°C

KCNE1 Antibody

☑ 100 µl
(10 Western mini-blots)

Cell Signaling TECHNOLOGY®

Orders ■ 877-616-CELL (2355)
orders@cellsignal.com
Support ■ 877-678-TECH (8324)
info@cellsignal.com
Web ■ www.cellsignal.com

New 01/09

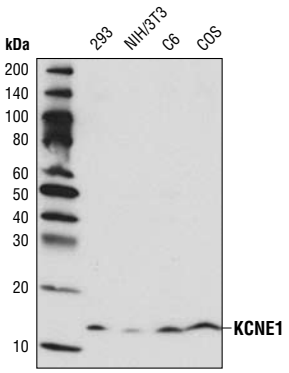
Entrez-Gene ID #3753
Swiss-Prot Acc. #P15382

Applications	Species Cross-Reactivity*	Molecular Wt.	Source
W, IP Endogenous	H, M, R, Mk	15 kDa	Rabbit**

Background: Voltage-gated potassium channels play a variety of important roles in human health and disease (1,2). KCNE1, also known as MinK, belongs to a family of small transmembrane proteins (KCNE1, -2, -3, and -4 and KCNE1L) that modulate the activity of several voltage-gated K^+ channels (3-5). KCNE1 functions as a modulatory β-subunit of the pore-forming α-subunit KCNQ1, and alters several biophysical properties of KCNQ1 channels (6,7). Several inherited mutations in KCNE1 result in long QT syndrome (8-10) and deafness (11).

Specificity/Sensitivity: KCNE1 Antibody detects endogenous levels of total KCNE1 protein.

Source/Purification: Polyclonal antibodies are produced by immunizing animals with a synthetic peptide (KLH-coupled) corresponding to residues surrounding Asp76 of human KCNE1 protein. Antibodies are purified by protein A and peptide affinity chromatography.



Western blot analysis of extracts from various cell lines using KCNE1 Antibody.

Storage: Supplied in 10 mM sodium HEPES (pH 7.5), 150 mM NaCl, 100 µg/ml BSA and 50% glycerol. Store at –20°C.
Do not aliquot the antibody.

***Species cross-reactivity is determined by western blot.**

****Anti-rabbit secondary antibodies must be used to detect this antibody.**

Recommended Antibody Dilutions:

Western blotting	1:1000
Immunoprecipitation	1:100

For application specific protocols please see the web page for this product at www.cellsignal.com.

Please visit www.cellsignal.com for a complete listing of recommended companion products.

Background References:

(1) Jespersen, T. et al. (2005) *Physiology (Bethesda)* 20, 408–16.
(2) Robbins, J. (2001) *Pharmacol Ther* 90, 1–19.
(3) Takumi, T. et al. (1988) *Science* 242, 1042–5.
(4) Abbott, G.W. and Goldstein, S.A. (2001) *Mol Interv* 1, 95–107.
(5) McCrossan, Z.A. and Abbott, G.W. (2004) *Neuropharmacology* 47, 787–821.
(6) Barhanin, J. et al. (1996) *Nature* 384, 78–80.
(7) Sanguinetti, M.C. et al. (1996) *Nature* 384, 80–3.
(8) Splawski, I. et al. (1997) *Nat Genet* 17, 338–40.
(9) Abbott, G.W. and Goldstein, S.A. (2002) *FASEB J* 16, 390–400.
(10) Tian, C. et al. (2007) *Biochemistry* 46, 11459–72.
(11) Peters, T.A. et al. (2004) *Pediatr Nephrol* 19, 1194–201.

IMPORTANT: For western blots, incubate membrane with diluted antibody in 5% w/v BSA, 1X TBS, 0.1% Tween-20 at 4°C with gentle shaking, overnight.

Applications Key: **W**—Western **IP**—Immunoprecipitation **IHC**—Immunohistochemistry **ChIP**—Chromatin Immunoprecipitation **IF**—Immunofluorescence **F**—Flow cytometry **E**—ELISA **E-P**—ELISA Peptide
Species Cross-Reactivity Key: **H**—human **M**—mouse **R**—rat **Hm**—hamster **Mk**—monkey **Mi**—mink **C**—chicken **Dm**—D. melanogaster **X**—Xenopus **Z**—zebrafish **B**—bovine **Dg**—dog **Pg**—pig **Sc**—S. cerevisiae **All**—all species expected Species enclosed in parentheses are predicted to react based on 100% homology.