

PRODUCT INFORMATION



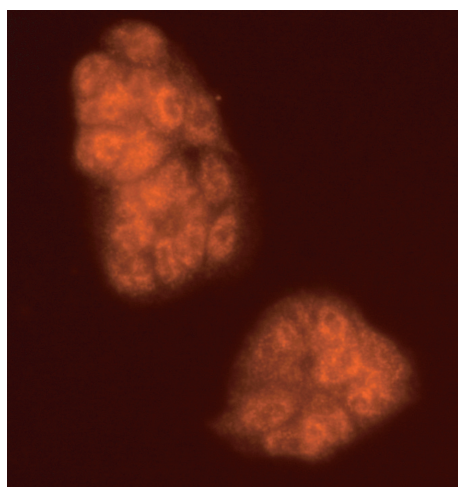
PCSK9 (mouse) Polyclonal Antibody

Item No. 10008811

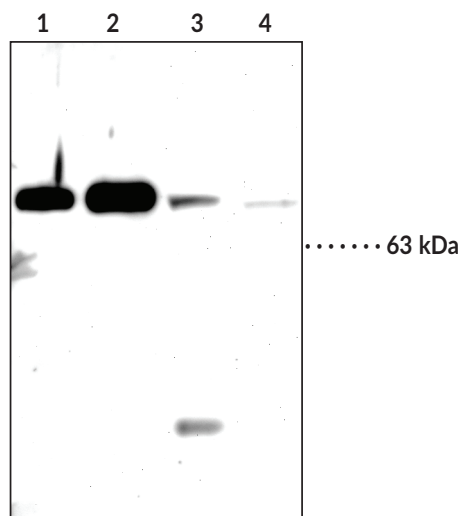
Overview and Properties

Contents:	This vial contains 500 µl of peptide affinity-purified polyclonal antibody.
Synonyms:	NARC-1, Proprotein Convertase Subtilisin Kexin 9
Immunogen:	Synthetic peptide from an internal region of mouse PCSK9
Species Reactivity:	(+) Human, mouse, and rat; other species not tested
Uniprot No.:	Q80W65
Form:	Liquid
Storage:	-20°C (as supplied)
Stability:	≥3 years
Storage Buffer:	PBS, pH 7.2, with 50% glycerol and 0.02% sodium azide
Host:	Rabbit
Applications:	Immunofluorescence (IF) and Western blot (WB); the recommended starting dilution is 1:50 for IF and 1:200 for WB. Other applications were not tested, therefore optimal working concentration/dilution should be determined empirically.

Images



Indirect immunofluorescence of HepG2 cells incubated with the PCSK9 Polyclonal Antibody at 8 µg/ml. The positive cytoplasm staining was visualized in red with a Cy3 conjugated goat anti-rabbit secondary antibody.



Lane 1: PCSK9 Protein (100 µg)
Lane 2: PCSK9 Protein (500 µg)
Lane 3: Mouse Liver Lysate (50 µg)
Lane 4: COS-7 Cell Lysate (50 µg)

WARNING
THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA
This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY
Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

Copyright Cayman Chemical Company, 10/17/2023

CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD
ANN ARBOR, MI 48108 · USA
PHONE: [800] 364-9897
[734] 971-3335
FAX: [734] 971-3640
CUSTSERV@CAYMANCHEM.COM
WWW.CAYMANCHEM.COM

PRODUCT INFORMATION



Description

Proprotein convertase subtilisin kexin 9 (PCSK9) is a member of the subtilisin serine protease family with an important role in lipoprotein metabolism.¹ Mutation in the PCSK9 gene is associated with autosomal dominant hypercholesterolemia which is characterized by an increase in low density lipoprotein (LDL) cholesterol levels.² PCSK9 overexpression in wild-type mice doubles the plasma total cholesterol, possibly through acceleration of the degradation of the LDL receptor.^{1,3} PCSK9 mRNA is detected in various tissues such as liver, kidney, lung, spleen, jejunum, ileum, colon, and muscle with the highest expression in the liver.⁴ Human PCSK9 precursor is 692 amino acid in length with an estimated molecular weight of 74 kDa. This proprotein is self-cleaved to form a mature protein at around 63 kDa in the Golgi.⁵

References

1. Maxwell, K.N., Fisher, E.A., and Breslow, J.L. Overexpression of PCSK9 accelerates the degradation of the LDLR in a post-endoplasmic reticulum compartment. *Proc. Natl. Acad. Sci. USA* **102**(6), 2069-2074 (2005).
2. Abifadel, M., Varret, M., Rabès, J.-P., et al. Mutations in PCSK9 cause autosomal dominant hypercholesterolemia. *Nature Genet.* **34**(2), 154-156 (2003).
3. Maxwell, K.N. and Breslow, J.L. Adenoviral-mediated expression of Pcsk9 in mice results in a low-density lipoprotein receptor knockout phenotype. *Proc. Natl. Acad. Sci. USA* **101**(18), 7100-7105 (2004).
4. Seidah, N.G., Benjannet, S., Wickham, L., et al. The secretory proprotein convertase neural apoptosis-regulated convertase 1 (NARC-1): Liver regeneration and neuronal differentiation. *Proc. Natl. Acad. Sci. USA* **100**(3), 928-933 (2003).
5. Maxwell, K.N. and Breslow, J.L. Proprotein convertase subtilisin kexin 9: The third locus implicated in autosomal dominant hypercholesterolemia. *Curr. Opin. Lipidol.* **16**(2), 167-172 (2005).

CAYMAN CHEMICAL
1180 EAST ELLSWORTH RD
ANN ARBOR, MI 48108 · USA
PHONE: [800] 364-9897
[734] 971-3335
FAX: [734] 971-3640
CUSTSERV@CAYMANCHEM.COM
WWW.CAYMANCHEM.COM