



Rabbit Anti-ROCK1 + ROCK2 antibody

SL10173R

Product Name:	ROCK1 + ROCK2
Chinese Name:	Rho相关蛋白激酶1/2抗体
Alias:	p164 ROCK 2; p164 ROCK-2; Rho associated coiled coil containing protein kinase 2; Rho associated protein kinase 2; Rho kinase 2; ROCK 2; Rock II; Rock2m; ROK alpha; ROKalpha; coiled-coil-containing protein kinase 2; KIAA0619; Rho associated, coiled coil containing protein kinase II; Rho-associated; Rho-associated protein kinase 2; Rock2; ROCK2_HUMAN; ROCK1_HUMAN; Rho-associated protein kinase 1; Renal carcinoma antigen NY-REN-35; Rho-associated, coiled-coil-containing protein kinase 1; Rho-associated, coiled-coil-containing protein kinase I; ROCK-I; p160 ROCK-1; p160ROCK. .
Organism Species:	Rabbit
Clonality:	Polyclonal
React Species:	Human,Mouse,Rat,Chicken,Dog,Pig,Cow,Horse,Rabbit,Sheep,
Applications:	WB=1:500-2000ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800ICC=1:100-500IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Molecular weight:	161kDa
Cellular localization:	The nucleuscytoplasmicThe cell membrane
Form:	Lyophilized or Liquid
Concentration:	1mg/ml
immunogen:	KLH conjugated synthetic peptide derived from human ROCK1 and ROCK:101-200/1388
Lsotype:	IgG
Purification:	affinity purified by Protein A
Storage Buffer:	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
Storage:	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20°C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

PubMed:[PubMed](#)

The protein encoded by this gene is a serine/threonine kinase that regulates cytokinesis, smooth muscle contraction, the formation of actin stress fibers and focal adhesions, and the activation of the c-fos serum response element. This protein, which is an isozyyme of ROCK1 is a target for the small GTPase Rho. [provided by RefSeq, Jul 2008].

Function:

Regulates the assembly of the actin cytoskeleton. Promotes formation of stress fibers and of focal adhesion complexes. Plays a role in smooth muscle contraction.

Subunit:

Cytoplasm. Cell membrane. Cytoplasmic, and associated with actin microfilaments and the plasma membrane.

Post-translational modifications:

Phosphorylated upon DNA damage, probably by ATM or ATR. Phosphorylation at Tyr-722 reduces its binding to RHOA and is crucial for focal adhesion dynamics. Dephosphorylation by PTPN11 stimulates its RHOA binding activity. Cleaved by granzyme B during apoptosis. This leads to constitutive activation of the kinase and membrane blebbing.

Similarity:

Belongs to the protein kinase superfamily. AGC Ser/Thr protein kinase family. Contains 1 AGC-kinase C-terminal domain. Contains 1 PH domain. Contains 1 phorbol-ester/DAG-type zinc finger. Contains 1 protein kinase domain. Contains 1 REM (Hr1) repeat.

SWISS:

Q13464

Gene ID:

6093

Database links:

[Entrez Gene: 6093](#)Human

[Entrez Gene: 19877](#)Mouse

[Entrez Gene: 81762](#)Rat

[Omim: 601702](#)Human

[SwissProt: Q13464](#)Human

[SwissProt: P70335](#)Mouse

Product Detail:

[SwissProt: Q63644](#)Rat

[Unigene: 306307](#)Human

[Unigene: 6710](#)Mouse

[Unigene: 89756](#)Rat

[Entrez Gene: 9475](#)Human

[Entrez Gene: 19878](#)Mouse

[Entrez Gene: 25537](#)Rat

[Oimim: 604002](#)Human

[SwissProt: O75116](#)Human

[SwissProt: P70336](#)Mouse

[SwissProt: Q62868](#)Rat

[Unigene: 58617](#)Human

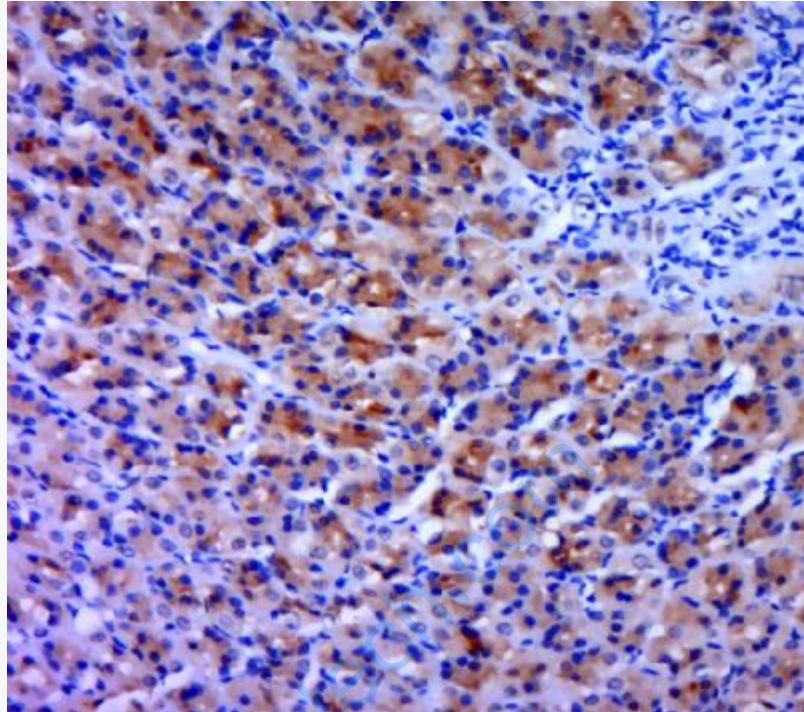
[Unigene: 681743](#)Human

[Unigene: 276024](#)Mouse

[Unigene: 88642](#)Rat

Important Note:

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.



Picture:

Paraformaldehyde-fixed, paraffin embedded (rat stomach tissue); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (ROCK1 + ROCK2) Polyclonal Antibody, Unconjugated (SL10173R) at 1:400 overnight at 4°C, followed by a conjugated secondary (sp-0023) for 20 minutes and DAB staining.