

Datasheet for ABIN6972535
anti-PKC beta antibody (C-Term)



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1 Image

Overview

Quantity:	100 µL
Target:	PKC beta (PRKCB)
Binding Specificity:	C-Term
Reactivity:	Human
Host:	Rabbit
Clonality:	Polyclonal
Application:	Western Blotting (WB)

Product Details

Immunogen:	This antibody was raised against a peptide within the C-terminal region of human PKC-B.
Isotype:	IgG
Characteristics:	PKC-B (Protein Kinase C, Beta) is a calcium-activated, phospholipid- and diacylglycerol (DAG)-dependent serine/threonine-protein kinase involved in various cellular processes such as regulation of the B-cell receptor (BCR) signalosome, oxidative stress-induced apoptosis, androgen receptor-dependent transcription regulation, insulin signaling and endothelial cells proliferation. Plays a key role in B-cell activation by regulating BCR-induced NF-kappa-B activation. Mediates the activation of the canonical NF-kappa-B pathway (NFKB1) by direct phosphorylation of CARD11/CARMA1 at Ser-559, Ser-644 and Ser-652. Plays a direct role in the negative feedback regulation of the BCR signaling, by down-modulating BTK function via direct phosphorylation of BTK at Ser-180, which results in the alteration of BTK plasma membrane localization and in turn inhibition of BTK activity. Involved in apoptosis following oxidative damage. Acts as a coactivator of androgen receptor (ANDR)-dependent transcription, by being

Product Details

recruited to ANDR target genes and specifically mediating phosphorylation of Thr-6 of histone H3 (H3T6ph), a specific tag for epigenetic transcriptional activation that prevents demethylation of histone H3 Lys-4 (H3K4me) by LSD1/KDM1A. Under high glucose in pancreatic beta-cells, is probably involved in the inhibition of the insulin gene transcription, via regulation of MYC expression. In endothelial cells, activation of PRKCB induces increased phosphorylation of RB1, increased VEGFA-induced cell proliferation, and inhibits PI3K/AKT-dependent nitric oxide synthase (NOS3/eNOS) regulation by insulin, which causes endothelial dysfunction. Phosphorylates ATF2 which promotes cooperation between ATF2 and JUN, activating transcription. PKC-B antibody (pAb) was raised in a Rabbit host. It has been validated for use in Western blot, it has been shown to react with Human samples.

Purification: Affinity Purified

Target Details

Target:	PKC beta (PRKCB)
Alternative Name:	PKC-B (PRKCB Products)
Molecular Weight:	85 kDa
NCBI Accession:	NP_997700
Pathways:	WNT Signaling , TCR Signaling , Thyroid Hormone Synthesis , Nuclear Hormone Receptor Binding , Chromatin Binding , Myometrial Relaxation and Contraction , VEGF Signaling , Unfolded Protein Response , BCR Signaling

Application Details

Application Notes:	Optimal working dilution should be determined by the investigator.
Restrictions:	For Research Use only

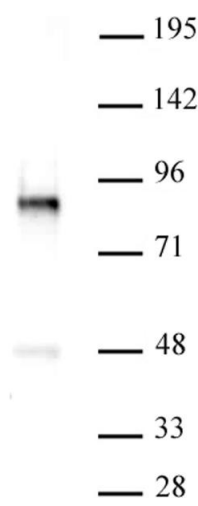
Handling

Buffer:	Purified IgG in PBS with 30 % glycerol and 0.035 % sodium azide.
Preservative:	Sodium azide
Precaution of Use:	This product contains Sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.
Storage:	-20 °C

Handling

Storage Comment: Avoid repeated freeze/thaw cycles by aliquoting items into single-use fractions for storage at -20°C for up to 2 years. Keep all reagents on ice when not in storage.

Images



Western Blotting

Image 1. PKC-B antibody (pAb) tested by Western blot. PKC-B detection by Western blot. The analysis was performed using 20 µg of K562 nuclear cell extract and PKC-B antibody at a 1:500 dilution.