

Product Name: PKA II β reg (phospho Ser113) Rabbit Polyclonal Antibody**Catalog #: APRab05251**

For research use only.

Summary

Description	Rabbit polyclonal Antibody
Host	Rabbit
Application	WB,IHC,ICC/IF,ELISA
Reactivity	Human,Mouse,Rat,Monkey
Conjugation	Unconjugated
Modification	Phosphorylated
Isotype	IgG
Clonality	Polyclonal
Form	Liquid
Concentration	1mg/ml
Storage	Aliquot and store at -20°C (valid for 12 months). Avoid freeze/thaw cycles.
Shipping	Ice bags
Buffer	Liquid in PBS containing 50% glycerol, 0.5% protective protein and 0.02% New type preservative N.
Purification	Affinity purification

Application

Dilution Ratio	WB 1:500-1:2000,IHC 1:100-1:300,ICC/IF 1:50-1:200,ELISA 1:5000-1:20000
Molecular Weight	46kDa

Antigen Information

Gene Name	PRKAR2B
Alternative Names	PRKAR2B; cAMP-dependent protein kinase type II-beta regulatory subunit
Gene ID	5577.0
SwissProt ID	P31323
Immunogen	The antiserum was produced against synthesized peptide derived from human PKA-R2 beta around the phosphorylation site of Ser113. AA range:79-128

Background

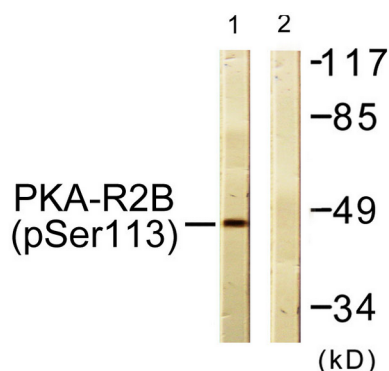
cAMP is a signaling molecule important for a variety of cellular functions. cAMP exerts its effects by activating the cAMP-

dependent protein kinase, which transduces the signal through phosphorylation of different target proteins. The inactive kinase holoenzyme is a tetramer composed of two regulatory and two catalytic subunits. cAMP causes the dissociation of the inactive holoenzyme into a dimer of regulatory subunits bound to four cAMP and two free monomeric catalytic subunits. Four different regulatory subunits and three catalytic subunits have been identified in humans. The protein encoded by this gene is one of the regulatory subunits. This subunit can be phosphorylated by the activated catalytic subunit. This subunit has been shown to interact with and suppress the transcriptional activity of the cAMP responsive element binding protein 1 (CREB1) in activation: Type II regulatory chains mediate membrane association by binding to anchoring proteins, including the MAP2 kinase., PTM: Phosphorylated by the activated catalytic chain., similarity: Belongs to the cAMP-dependent kinase regulatory chain family., similarity: Contains 2 cyclic nucleotide-binding domains., subunit: The inactive form of the enzyme is composed of two regulatory chains and two catalytic chains. Activation by cAMP produces two active catalytic monomers and a regulatory dimer that binds four cAMP molecules., tissue specificity: Four types of regulatory chains are found: I-alpha, I-beta, II-alpha, and II-beta. Their expression varies among tissues and is in some cases constitutive and in others inducible.,

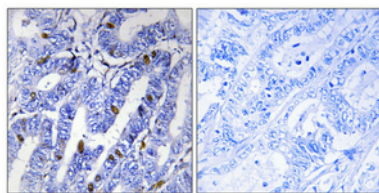
Research Area

Apoptosis_Inhibition; Apoptosis_Mitochondrial; Apoptosis_Overview; Insulin_Receptor;

Image Data



Western blot analysis of lysates from COS7 cells treated with PMA 125ng/ml 30', using PKA-R2 beta (Phospho-Ser113) Antibody. The lane on the right is blocked with the phospho peptide.



Immunohistochemical analysis of paraffin-embedded Human colon cancer. Antibody was diluted at 1:100 (4°, overnight). High-pressure and temperature Tris-EDTA, pH 8.0 was used for antigen retrieval. Negative control (right) obtained from antibody was pre-absorbed by immunogen peptide.