Polyclonal Anti- Protein kinase C gamma, *PKC gamma (*Sepharose Bead Conjugate)

Catalogue No. PA1234-S

Lot No. 09F01

Ig type: rabbit IgG

Size: 100µg/vial

Specificity

Rat, mouse. No cross reactivity with other proteins.

Recommended application

(Immunoprecipitation(IP)

Immunogen

A synthetic peptide corresponding to a sequence at the C-terminal of human PKC gamma, identical to the related rat and mouse sequence.

Purification

Immunogen affinity purified.

Formulation

50% slurry in PBS pH 7.2 with 0.01mg NaN_3a_3 preservative.

Storage

Store at 4˚C for frequent use.

Description:

This Antagene antibody is immobilized via covalent binding of primary amino groups to N-hydroxysuccinimide (NHS)-activated sepharose beads. It is useful for immunoprecipitation assays

BACKGROUND

The gamma isotype of protein kinase C (PKC gamma) is a member of the classical PKC (cPKC) subfamily which is activated by Ca(2+) and diacylglycerol in the presence of phosphatidylserine. Physiologically, PKC gamma is activated by a mechanism coupled with receptor-mediated breakdown of inositol phospholipid as other cPKC isotypes such as PKC alpha and PKC beta. PKC gamma is expressed solely in the brain and spinal cord and its localization is restricted to neurons, while PKC alpha and PKC beta are expressed in many tissues in addition to the brain. Within the brain, PKC gamma is the most abundant in the cerebellum, hippocampus and cerebral cortex, where the existence of neuronal plasticity has been demonstrated.1 PKC gamma gene is mutated in spinocerebellar ataxia type 14 (SCA14). Verbeek et al. (2005) point out the specific alterations in mutant PKC gamma function that could lead to the selective neuronal degeneration of SCA14.2

REFERENCE

1. Saito N, Shirai Y (2003). "Protein kinase C gamma (PKC gamma): function of neuron specific isotype.". *J. Biochem.* 132 (5): 683–7.

2. Verbeek, D. S.; Knight, M. A.; Harmison, G. G.; Fischbeck, K. H.; Howell, B. W. : Protein kinase C gamma mutations in spinocerebellar ataxia 14 increase kinase activity and alter membrane targeting. *Brain* 128: 436-442, 2005.

Contact: Antagene, Inc. | Tel: 1 (866) 964-2589 | Fax: 1 (888) 225-1868 | Email:Info@antageneinc.com