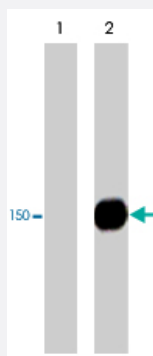


PLCG1 (phospho Y775) polyclonal antibody

Catalog # PAB7929

Size 100 uL

Applications



Immunoprecipitation

Western blot analysis of PLCG1 immunoprecipitates from human Jurkat cells untreated (lane 1) or treated with pervanadate (1 mM) for 30 min (lane 2). The blots were probed with PLCG1 (phospho Y775) polyclonal antibody (Cat # PAB7929).

Specification

Product Description	Rabbit polyclonal antibody raised against synthetic phosphopeptide of PLCG1.
Immunogen	Synthetic phosphopeptide corresponding to residues surrounding Y775 of human PLCG1.
Host	Rabbit
Reactivity	Human, Mouse, Rat
Specificity	This sequence has high homology to the conserved site in rat and mouse PLCg1, and has low homology to PLCg2.
Form	Liquid
Quality Control Testing	Antibody Reactive Against Synthetic Peptide.
Recommend Usage	ELISA (1:2000) Immunocytochemistry (1:100) Immunoprecipitation (1-5 ul) Western Blot (1:1000) The optimal working dilution should be determined by the end user.
Storage Buffer	In PBS (50% glycerol, 1 mg/mL BSA, 0.05% sodium azide)

Storage Instruction

Store at -20°C.
Aliquot to avoid repeated freezing and thawing.

Note

This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.

Applications

- Western Blot
- Immunocytochemistry
- Immunoprecipitation

Western blot analysis of PLCG1 immunoprecipitates from human Jurkat cells untreated (lane 1) or treated with pervanadate (1 mM) for 30 min (lane 2). The blots were probed with PLCG1 (phospho Y775) polyclonal antibody (Cat # PAB7929).

- Enzyme-linked Immunoabsorbent Assay

Gene Info — PLCG1

Entrez GeneID[5335](#)**Gene Name**

PLCG1

Gene Alias

PLC-II, PLC1, PLC148, PLCgamma1

Gene Description

phospholipase C, gamma 1

Omim ID[172420](#)**Gene Ontology**[Hyperlink](#)**Gene Summary**

The protein encoded by this gene catalyzes the formation of inositol 1,4,5-trisphosphate and diacylglycerol from phosphatidylinositol 4,5-bisphosphate. This reaction uses calcium as a cofactor and plays an important role in the intracellular transduction of receptor-mediated tyrosine kinase activators. For example, when activated by SRC, the encoded protein causes the Ras guanine nucleotide exchange factor RasGRP1 to translocate to the Golgi, where it activates Ras. Also, this protein has been shown to be a major substrate for heparin-binding growth factor 1 (acidic fibroblast growth factor)-activated tyrosine kinase. Two transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq]

Other Designations

1-phosphatidyl-D-myo-inositol-4,5-bisphosphate|1-phosphatidylinositol-4,5-bisphosphate phosphodiesterase gamma 1|OTTHUMP00000031787|OTTHUMP00000178982|PLC-gamma-1|inositol trisphosphohydrolase|monophosphatidylinositol phosphodiesterase|phosphatidylinositol

Publication Reference

- [A new tyrosine phosphorylation site in PLC gamma 1: the role of tyrosine 775 in immune receptor signaling.](#)

Serrano CJ, Graham L, DeBell K, Rawat R, Veri MC, Bonvini E, Rellahan BL, Reischl IG.

Journal of Immunology 2005 May; 174(10):6233.

Application: WB, Chicken, DT40 cells

- [A role for gelsolin in actuating epidermal growth factor receptor-mediated cell motility.](#)

Chen P, Murphy-Ullrich JE, Wells A.

The Journal of Cell Biology 1996 Aug; 134(3):689.

- [Transforming potentials of epidermal growth factor and nerve growth factor receptors inversely correlate with their phospholipase C gamma affinity and signal activation.](#)

Obermeier A, Tinhofer I, Grunicke HH, Ullrich A.

The EMBO Journal 1996 Jan; 15(1):73.

Application: IP, WB-Tr, Human, HEK 293 cells

Pathway

- [Calcium signaling pathway](#)
- [Epithelial cell signaling in Helicobacter pylori infection](#)
- [ErbB signaling pathway](#)
- [Fc epsilon RI signaling pathway](#)
- [Fc gamma R-mediated phagocytosis](#)
- [Glioma](#)
- [Inositol phosphate metabolism](#)
- [Leukocyte transendothelial migration](#)
- [Metabolic pathways](#)
- [Natural killer cell mediated cytotoxicity](#)
- [Neurotrophin signaling pathway](#)

- [Non-small cell lung cancer](#)
- [Pathways in cancer](#)
- [Phosphatidylinositol signaling system](#)
- [T cell receptor signaling pathway](#)
- [VEGF signaling pathway](#)
- [Vibrio cholerae infection](#)

Disease

- [Bipolar Disorder](#)
- [Cardiovascular Diseases](#)
- [Diabetes Mellitus](#)
- [Edema](#)
- [Genetic Predisposition to Disease](#)
- [HIV Infections](#)
- [Kidney Failure](#)
- [Mental Disorders](#)
- [Multiple Sclerosis](#)