

## [KD Validated] Anti-PLCG1 Rabbit mAb

Purified Recombinant Rabbit Monoclonal Antibody

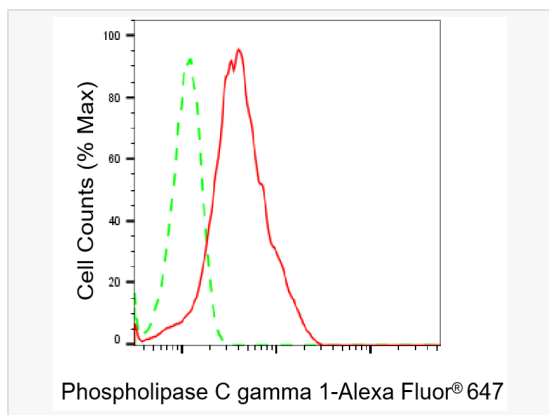
Catalog # R021339

### Product Information

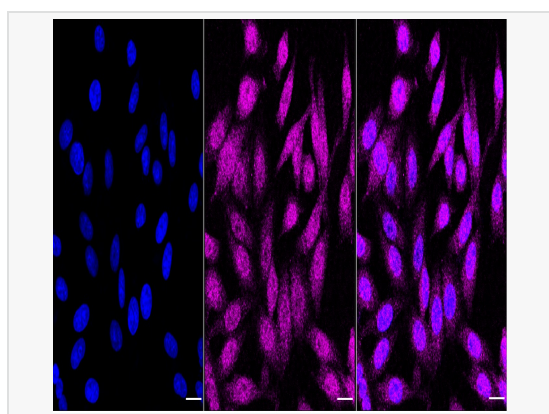
Application	WB, FC, IF (Cell)/ICC
Reactivity	Human, Mouse, Rat
Dilution	WB 1:1,000~1:5,000; FC 1:200~1:2,000; IF 1:100~1:1,000
Host	Rabbit
Clonality	Monoclonal
Clone No.	72E48F92
Isotype	IgG
Label	Unconjugated
Immunogen	A synthesized peptide derived from human Phospholipase C gamma 1/PLC-gamma-1
Format	Affinity purified monoclonal antibody supplied in PBS with 0.02% sodium azide and 50% glycerol, pH 7.3.
Storage	Shipped on wet ice. Store at -20°C. Stable for 12 months from date of receipt. Aliquoting is unnecessary for -20°C storage.
Precautions	[KD Validated] Anti-PLCG1 Rabbit mAb [72E48F92] is for research use only and not for use in diagnostic or therapeutic procedures.

### Protein Information

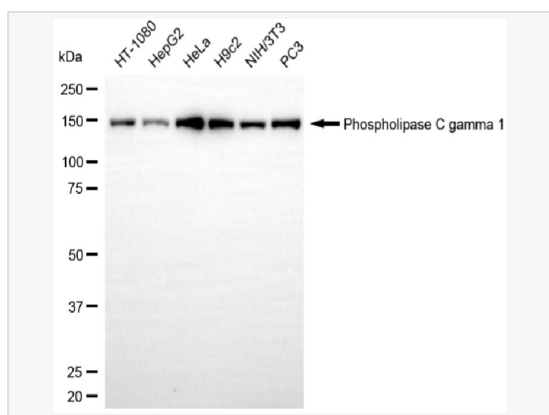
Synonyms	PLCG1; Phospholipase C Gamma 1; PLC-II 2; PLC148; NCKAP3; PLC1; 1-Phosphatidylinositol 4,5-Bisphosphate Phosphodiesterase Gamma-1; Phospholipase C, Gamma 1 (Formerly Subtype 148); Phosphoinositide Phospholipase C-Gamma-1; Phospholipase C-II ; PLC-Gamma-1; EC 3.1.4.11; PLCgamma1; PLC-148; 1-Phosphatidyl-D-Myo-Inositol-4,5-Bisphosphate; Monophosphatidylinositol Phosphodiesterase; Triphosphoinositide Phosphodiesterase; Phosphatidylinositol Phospholipase ; Phosphoinositide Phospholipase C; Inositoltrisphosphohydrolase; Phospholipase C, Gamma 1; Phospholipase C-Gamma-1; Phosphoinositidase C; Phospholipase C-148; PLCGAMMA1.
Calculated MW	Calculated MW: 149 kDa; Observed MW: 149 kDa
Uniprot ID	P19174
Gene ID	5335
Background	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.



Flow cytometric analysis of Phospholipase C gamma 1 expression in HepG2 cells using Phospholipase C gamma 1 antibody (R021339, 1:2,000). Green, isotype control; red, Phospholipase C gamma 1.



Immunocytochemical staining of HepG2 cells with Phospholipase C gamma 1 antibody (R021339, 1:1,000). Nuclei were stained blue with DAPI; Phospholipase C gamma 1 was stained magenta with Alexa Fluor® 647. Images were taken using Leica stellaris 5. Protein abundance based on laser Intensity and smart gain: Medium. Scale bar, 20  $\mu$ m.



Western blotting analysis using phospholipase C gamma 1 antibody (R021339). Total cell lysates (30  $\mu$ g) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with phospholipase C gamma 1 antibody (R021339, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (1:20,000) respectively. Image was developed using ECL Substrate Kit.



Western blotting analysis using phospholipase C gamma 1 antibody (R021339). Phospholipase C gamma 1 expression in wild type (WT) and phospholipase C gamma 1 (PLCG1) knockdown (KD) HSHC cells with 20  $\mu$ g of total cell lysates. Hsp90  $\alpha$  serves as a loading control. The blot was incubated with phospholipase C gamma 1 antibody (R021339, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (1:20,000) respectively. Image was developed using ECL Substrate Kit.