



PC-PLD1 (phospho Ser561) Polyclonal Antibody

Catalog No	YP-Ab-02431
Isotype	IgG
Reactivity	Human;Mouse;Rat
Applications	IHC;IF;ELISA
Gene Name	PLD1
Protein Name	Phospholipase D1
Immunogen	The antiserum was produced against synthesized peptide derived from human PLD1 around the phosphorylation site of Ser561. AA range:527-576
Specificity	Phospho-PC-PLD1 (S561) Polyclonal Antibody detects endogenous levels of PC-PLD1 protein only when phosphorylated at S561.
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source	Polyclonal, Rabbit,IgG
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Dilution	Immunohistochemistry: 1/100 - 1/300. Immunofluorescence: 1/200 - 1/1000. ELISA: 1/10000. Not yet tested in other applications.
Concentration	1 mg/ml
Purity	≥90%
Storage Stability	-20°C/1 year
Synonyms	PLD1; Phospholipase D1; PLD 1; hPLD1; Choline phosphatase 1; Phosphatidylcholine-hydrolyzing phospholipase D1
Observed Band	
Cell Pathway	Cytoplasm, perinuclear region . Endoplasmic reticulum membrane ; Lipid-anchor ; Cytoplasmic side . Golgi apparatus membrane ; Lipid-anchor ; Cytoplasmic side . Late endosome membrane ; Lipid-anchor ; Cytoplasmic side .
Tissue Specificity	Expressed abundantly in the pancreas and heart and at high levels in brain, placenta, spleen, uterus and small intestine.
Function	catalytic activity:A phosphatidylcholine + H(2)O = choline + a phosphatidate.,enzyme regulation:Stimulated by phosphatidylinositol 4,5-bisphosphate and phosphatidylinositol 3,4,5-trisphosphate, activated by the phosphokinase C-alpha, by the ADP-ribosylation factor-1 (ARF-1), and to a lesser extent by GTP-binding proteins: RHO A, RAC-1 and CDC42. Inhibited by oleate.,function:Implicated as a critical step in numerous cellular pathways, including signal transduction, membrane trafficking, and the regulation of mitosis. May be involved in the regulation of perinuclear intravesicular membrane traffic.,online information:Phospholipase D entry,similarity:Belongs to the phospholipase D family.,similarity:Contains 1 PH domain.,similarity:Contains 1 PX (phox homology) domain.,similarity:Contains 2 PLD phosphodiesterase domains.,subunit:Interacts with PIP5K1A.,tissue specificity:Expressed abundant



Background

This gene encodes a phosphatidylcholine-specific phospholipase which catalyzes the hydrolysis of phosphatidylcholine in order to yield phosphatidic acid and choline. The enzyme may play a role in signal transduction and subcellular trafficking. Alternative splicing results in multiple transcript variants with both catalytic and regulatory properties. [provided by RefSeq, Sep 2011],

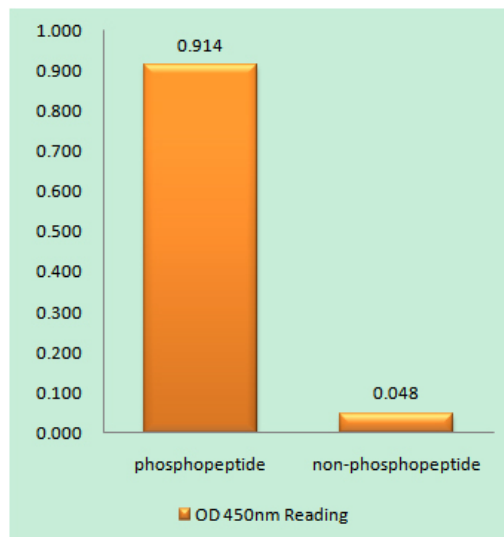
matters needing attention

Avoid repeated freezing and thawing!

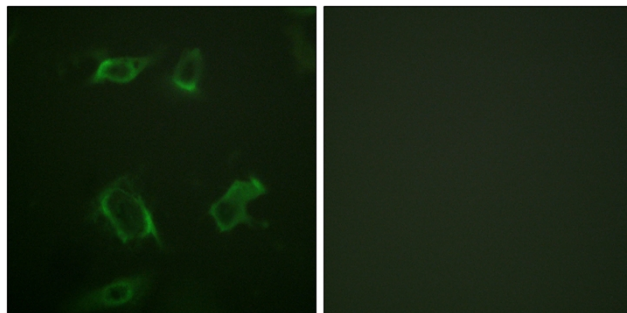
Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

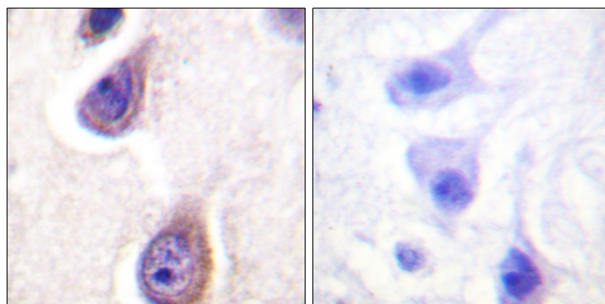
Products Images



Enzyme-Linked Immunosorbent Assay (Phospho-ELISA) for Immunogen Phosphopeptide (Phospho-left) and Non-Phosphopeptide (Phospho-right), using PLD1 (Phospho-Ser561) Antibody



Immunofluorescence analysis of HepG2 cells, using PLD1 (Phospho-Ser561) Antibody. The picture on the right is blocked with the phosphopeptide.



Immunohistochemistry analysis of paraffin-embedded human brain, using PLD1 (Phospho-Ser561) Antibody. The picture on the right is blocked with the phosphopeptide.