

ARG66574 anti-PLA2G4A antibody

Package: 100 µg
Store at: -20°C

Summary

Product Description	Rabbit Polyclonal antibody recognizes PLA2G4A
Tested Reactivity	Hu
Tested Application	ICC/IF, IHC-P, WB
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Target Name	PLA2G4A
Species	Human
Immunogen	Synthetic peptide corresponding to aa. 471-520 of Human PLA2G4A.
Conjugation	Un-conjugated
Alternate Names	Phospholipase A2 group IVA; cPLA2; cPLA2-alpha; Phosphatidylcholine 2-acylhydrolase; PLA2G4; Cytosolic phospholipase A2; EC 3.1.1.5; EC 3.1.1.4

Application Instructions

Application table	Application	Dilution
	ICC/IF	1:200 - 1:1000
	IHC-P	1:100 - 1:300
	WB	1:500 - 1:2000
Application Note	IHC-P: Antigen Retrieval: High-pressure and temperature Tris-EDTA buffer (pH 8.0). * The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	

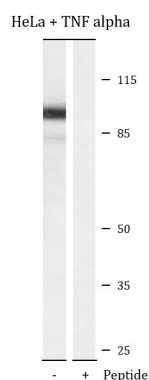
Properties

Form	Liquid
Purification	Affinity purification with immunogen.
Buffer	PBS, 0.02% Sodium azide, 50% Glycerol and 0.5% BSA.
Preservative	0.02% Sodium azide
Stabilizer	50% Glycerol and 0.5% BSA
Concentration	1 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.

Bioinformation

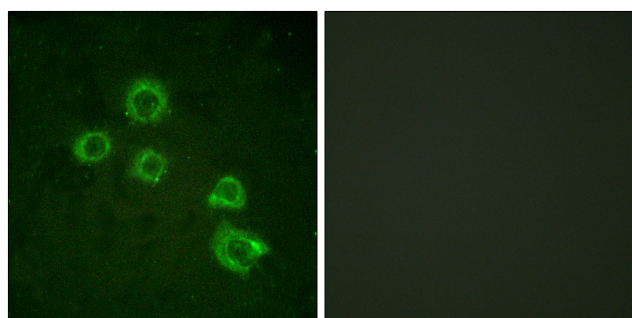
Gene Symbol	PLA2G4A
Gene Full Name	phospholipase A2, group IVA (cytosolic, calcium-dependent)
Background	This gene encodes a member of the cytosolic phospholipase A2 group IV family. The enzyme catalyzes the hydrolysis of membrane phospholipids to release arachidonic acid which is subsequently metabolized into eicosanoids. Eicosanoids, including prostaglandins and leukotrienes, are lipid-based cellular hormones that regulate hemodynamics, inflammatory responses, and other intracellular pathways. The hydrolysis reaction also produces lysophospholipids that are converted into platelet-activating factor. The enzyme is activated by increased intracellular Ca(2+) levels and phosphorylation, resulting in its translocation from the cytosol and nucleus to perinuclear membrane vesicles. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Jul 2015]
Function	Selectively hydrolyzes arachidonyl phospholipids in the sn-2 position releasing arachidonic acid. Together with its lysophospholipid activity, it is implicated in the initiation of the inflammatory response. [UniProt]
Calculated Mw	85 kDa
PTM	Activated by phosphorylation at both Ser-505 and Ser-727. [UniProt]
Cellular Localization	Cytoplasm. Cytoplasmic vesicle. Note=Translocates to membrane vesicles in a calcium-dependent fashion. [UniProt]

Images



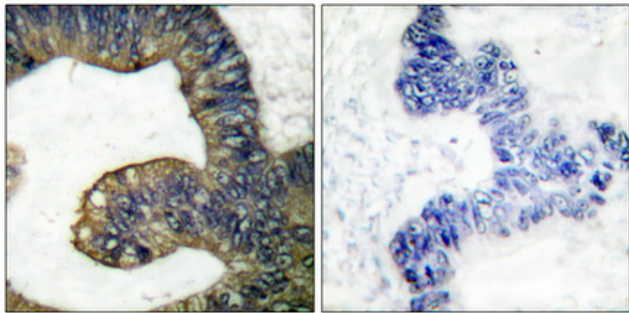
ARG66574 anti-PLA2G4A antibody WB image

Western blot: HeLa cells treated with TNF alpha at 20 ng/ml for 30 min, using ARG66574 anti-PLA2G4A antibody. The lane on the right was blocked with the synthetic peptide.



ARG66574 anti-PLA2G4A antibody ICC/IF image

Immunofluorescence: HUVEC cells stained with ARG66574 anti-PLA2G4A antibody. The picture on the right was blocked with synthetic peptide.



ARG66574 anti-PLA2G4A antibody IHC-P image

Immunohistochemistry: Paraffin-embedded Human colon cancer tissue stained with ARG66574 anti-PLA2G4A antibody at 1:100 dilution (4°C, overnight). Antigen Retrieval: High-pressure and temperature Tris-EDTA buffer (pH 8.0). Negative control (right) was incubated with immunogen peptide.