

Phospho-PDPK1 (Ser241) Recombinant monoclonal antibody

Catalog Number: 85223-3-RR

Basic Information

Catalog Number:	85223-3-RR	GenBank Accession Number:	BC012103	Purification Method:	Protein A purification
Source:	Rabbit	GenID (NCBI):	5170	CloneNo.:	250623A11
Isotype:	IgG	UNIPROT ID:	O15530	Recommended Dilutions:	WB: 1:1000-1:6000 FC (Intra): 0.13 ug per 10 ⁶ cells in a 100 μ l suspension
		Full Name:	3-phosphoinositide dependent protein kinase-1		
		Calculated MW:	556 aa, 63 kDa		
		Observed MW:	58-68 kDa		

Applications

Tested Applications:	WB, FC (Intra), ELISA	Positive Controls:	
Species Specificity:	human, mouse	WB:	NIH/3T3 cells, λ phosphatase treated NIH/3T3 cells

FC (Intra): λ phosphatase treated NIH/3T3 cells,

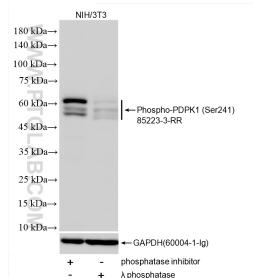
Background Information

3-Phosphoinositide dependent protein kinase-1 (PDK1 or PDPK1) is a serine-threonine kinase belonging to AGC kinase family. PDK1 plays a critical role in establishing ACD (Asymmetric cell division) in the epithelium (PMID: 27184845). The kinase activity of PDK1 depends on phosphatidyl inositol 3-kinase (PI3K), a key intermediate in signaling pathways including those from growth factor receptors and adhesion molecules. Substrates of PDK1, including AKT and the protein kinase C (PKC) isozymes, regulate a number of essential cell functions (PMID: 20027184). PDPK1 has 5 isoforms produced by alternative splicing of 48-63 kDa and is detected as 60-63 kDa.

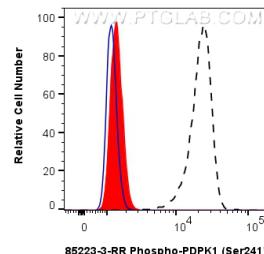
Storage

Storage: Store at -20°C. Stable for one year after shipment.
Storage Buffer: PBS with 0.02% sodium azide and 50% glycerol, pH7.3
Aliquoting is unnecessary for -20°C storage

Selected Validation Data



Non-treated NIH/3T3 cells, phosphatase inhibitor treated NIH/3T3 cells and λ phosphatase treated NIH/3T3 cells were subjected to SDS PAGE followed by western blot with 85223-3-RR (Phospho-PDPK1 (Ser241) antibody) at dilution of 1:3000 incubated at room temperature for 1.5 hours. The membrane was stripped and re-blotted with GAPDH (60004-1-Ig) antibody as a loading control.



1X10⁶ NIH/3T3 cells untreated (dashed lines) or treated with λ phosphatase which intracellularly stained with 0.13 ug Phospho-PDPK1 (Ser241) Recombinant monoclonal antibody (85223-3-RR, Clone:250625A11) and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2)(red), or 0.13 ug Rabbit IgG Isotype Control RecAb (98136-1-RR, Clone: 240953C9) (blue). Cells were fixed and permeabilized with Flow Cytometry Phosphorylated Protein