For Research Use Only

Phospho-AKT (Ser473) Monoclonal antibody

proteintech®
Antibodies | ELISA kits | Proteins
www.ptglab.com

Catalog Number:66444-1-Ig

857 Publications

Basic Information

Catalog Number:
66444-1-Ig

Size:
100ul , Concentration: 1500 μg/ml by Nanodrop;

Source:
Mouse

Isotype:
IgG1

GenBank Accession Number:
NM_005163

GeneID (NCBI):
207

Full Name:
v-akt murine thymoma viral oncogene homolog 1

Observed MW:
60-62 kDa

Purification Method:
Protein A purification

CloneNo.:
1C10B8

Recommended Dilutions:
WB 1:2000-1:10000
IHC 1:100-1:400

Applications

Tested Applications:
FC, IHC, WB, ELISA

Cited Applications:
FC, IF, IHC, WB

Species Specificity:
human, mouse, rat

Cited Species:
human, chicken, rat, mouse, rabbit, zebrafish, pig, canine

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

WB : Calyculin A treated PC-3 cells, Jurkat cells, HSC-T6 cells, NIH/3T3 cells, Calyculin A treated HEK-293T cells, TPA treated Jurkat cells, Calyculin A treated Jurkat cells, Calyculin A treated HEK-293 cells, Calyculin A treated HSC-T6 cells, Calyculin A treated NIH/3T3 cells

IHC : human breast cancer tissue, Calyculin A treated Jurkat cells, human colon cancer tissue

Background Information

The serine-threonine protein kinase AKT1 is catalytically inactive in serum-starved primary and immortalized fibroblasts. Survival factors can suppress apoptosis in a transcription-independent manner by activating the serine/threonine kinase AKT1, which then phosphorylates and inactivates components of the apoptotic machinery. This antibody detects all the members of AKT with phospho-modification at Ser473.

Notable Publications

Author	Pubmed ID	Journal	Application
Wenzhong Peng	36274350	Tissue Cell	WB
Tong Li	33152931	Biomed Pharmacother	WB
Di Cui	36175877	BMC Cancer	WB

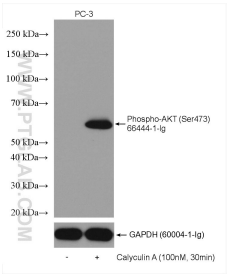
Storage

Storage:
Store at -20°C. Stable for one year after shipment.
Storage Buffer:
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.
Aliquoting is unnecessary for -20°C storage

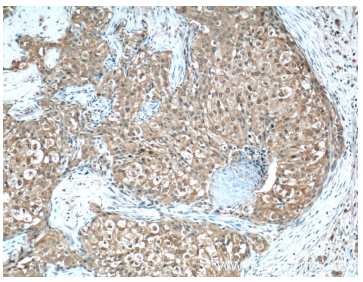
*** 20ul sizes contain 0.1% BSA

For technical support and original validation data for this product please contact:
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)
E: proteintech@ptglab.com
W: ptglab.com

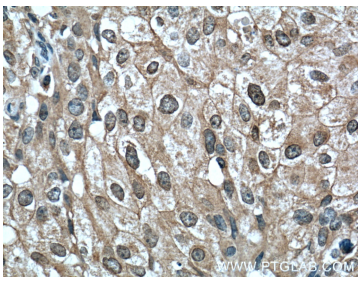
Selected Validation Data



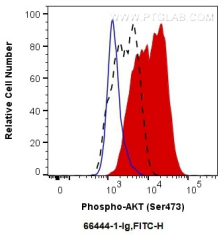
Non-treated PC-3 and Calyculin A treated PC-3 cells were subjected to SDS PAGE followed by western blot with 66444-1-Ig (Phospho-AKT (Ser473) antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours. The membrane was stripped and re-blotted with GAPDH antibody as loading control.



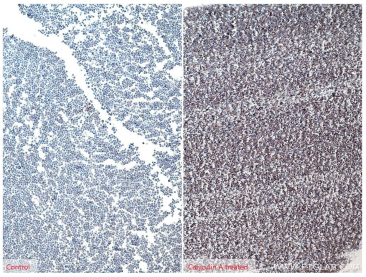
Immunohistochemical analysis of paraffin-embedded human breast cancer tissue slide using 66444-1-Ig (AKT-phospho-S473 antibody at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



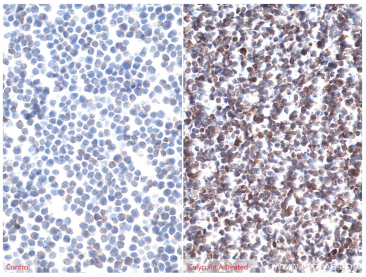
Immunohistochemical analysis of paraffin-embedded human breast cancer tissue slide using 66444-1-Ig (AKT-phospho-S473 antibody at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



1X10^6 PC-3 cells untreated (dashed line) or treated with Calyculin A (red) were intracellularly stained with 0.5 ug Anti-Human Phospho-AKT (Ser473) (66444-1-Ig, Clone:1C10B8) and CoraLite®488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L) at dilution 1:1000, or 0.5 ug Control Antibody (blue). Cells were fixed with 4% PFA and permeabilized with 90% MeOH.



Immunohistochemical analysis of paraffin-embedded untreated (left) or Calyculin A treated (right) Jurkat cells slide using 66444-1-Ig (Phospho-AKT (Ser473) antibody) at dilution of 1:8000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded untreated (left) or Calyculin A treated (right) Jurkat cells slide using 66444-1-Ig (Phospho-AKT (Ser473) antibody) at dilution of 1:8000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).