

For Research Use Only

CDK4 Monoclonal antibody

Catalog Number: 66950-1-Ig **31 Publications**



Basic Information

Catalog Number: 66950-1-Ig	GenBank Accession Number: BC010153	Purification Method: Protein A purification
Size: 150ul , Concentration: 1000 ug/ml by Nanodrop;	GeneID (NCBI): 1019	CloneNo.: 1G2C12
Source: Mouse	UNIPROT ID: P11802	Recommended Dilutions: WB 1:5000-1:50000 IHC 1:200-1:1000
Isotype: IgG1	Full Name: cyclin-dependent kinase 4	
Immunogen Catalog Number: AG20538	Calculated MW: 34 kDa	
	Observed MW: 34 kDa	

Applications

Tested Applications: WB, IHC, FC (Intra), ELISA	Positive Controls: WB : LNCaP cells, HeLa cells, HEK-293 cells, 4T1 cells, Jurkat cells, MCF-7 cells, HepG2 cells, K-562 cells, HSC-T6 cells, NIH/3T3 cells, RAW 264.7 cells IHC : human breast cancer tissue, human lung cancer tissue
Cited Applications: WB, IHC	
Species Specificity: human, mouse, rat	
Cited Species: human, mouse	
Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0	

Background Information

Cyclin-dependent kinase-4 (CDK4) is a protein-serine kinase involved in the cell cycle. It is essential for the G1- to S-phase transition during the cell cycle and its expression is primarily controlled at the transcriptional level(PMID:17253961). CCND1-CDK4 axis is not only critical in glial tumor cells but also in stromal-derived cells in the surrounding tumor microenvironment that are vital to sustain tumor outgrowth(PMID:21844184).

Notable Publications

Author	Pubmed ID	Journal	Application
Li Zhu	34631884	Biomed Res Int	WB
Huan Liu	34491469	Med Oncol	WB
Zhan Wang	36064706	J Transl Med	WB

Storage

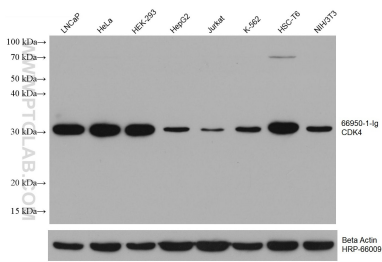
Storage:
Store at -20°C. Stable for one year after shipment.
Storage Buffer:
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.
Aliquoting is unnecessary for -20°C storage

*** 20ul sizes contain 0.1% BSA

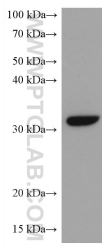
For technical support and original validation data for this product please contact:
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)
E: proteintech@ptglab.com
W: ptglab.com

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.

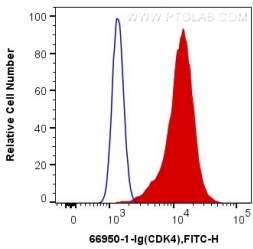
Selected Validation Data



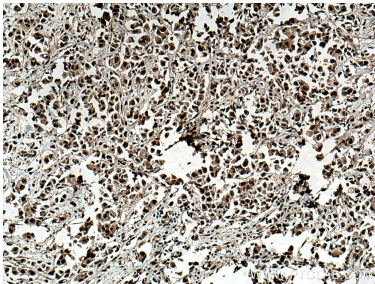
Various lysates were subjected to SDS PAGE followed by western blot with 66950-1-Ig (CDK4 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours. The membrane was stripped and reblotted with HRP-conjugated Beta Actin Monoclonal antibody (HRP-66009) as loading control.



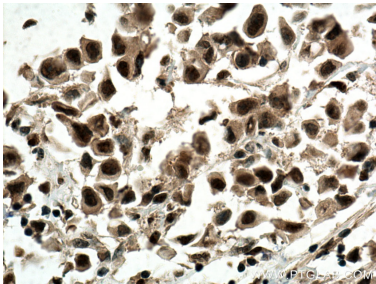
4T1 cells were subjected to SDS PAGE followed by western blot with 66950-1-Ig (CDK4 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



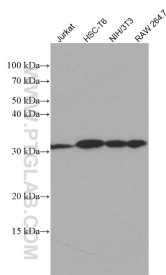
1X10⁶ MCF-7 cells were intracellularly stained with 0.2 ug Anti-Human CDK4 (66950-1-Ig, Clone:1G2C12) and CoraLite®488-Conjugated Goat Anti-Mouse IgG(H+L) at dilution 1:1000 (red), or 0.2 ug Control Antibody. Cells were fixed and permeabilized with Transcription Factor Staining Buffer Kit (PF00011).



Immunohistochemical analysis of paraffin-embedded human breast cancer tissue slide using 66950-1-Ig (CDK4 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 66950-1-Ig (CDK4 antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Various lysates were subjected to SDS PAGE followed by western blot with 66950-1-Ig (CDK4 antibody) at dilution of 1:3000 incubated at room temperature for 1.5 hours.