

For Research Use Only

CDK9 Recombinant antibody, PBS Only (Detector)

Catalog Number: 83662-2-PBS



Basic Information

Catalog Number: 83662-2-PBS	GenBank Accession Number: BC001968	Purification Method: Protein A purification
Concentration: 1 mg/ml	GeneID (NCBI): 1025	CloneNo.: 240600E3
Source: Rabbit	UNIPROT ID: P50750	
Isotype: IgG	Full Name: cyclin-dependent kinase 9	
Immunogen Catalog Number: AG2318	Calculated MW: 372 aa, 43 kDa	
	Observed MW: 38-42 kDa, 55 kDa	

Applications

Tested Applications:
WB, IHC, IF/ICC, FC (Intra), Cytometric bead array, Sandwich ELISA, Indirect ELISA, Sample test

Species Specificity:
human

Background Information

CDK9(Cyclin-dependent kinase 9) is a member of the Cdc2-like family of kinases. Its cyclin partners are members of the family of cyclin T (T1, T2a and T2b) and cyclin K. The CDK9/cyclin T complexes appear to be involved in regulating several physiological processes. CDK9 has also been described as the kinase of the TAK complex, which is homologous to the P-TEFb complex and involved in HIV replication. In addition, CDK9 seems to have an anti-apoptotic function in monocytes, that may be related to its control over differentiation of monocytes (PMID: 12432243). CDK9 has two isoforms with the molecular mass of 42 kDa and 55 kDa, and the relative abundance of Cdk9(42kDa) and Cdk9(55kDa) changes in different cell types (PMID: 12706900, 15780980).

Storage

Storage:
Store at -80°C.
The product is shipped with ice packs. Upon receipt, store it immediately at -80°C

Storage Buffer:
PBS Only

For technical support and original validation data for this product please contact:

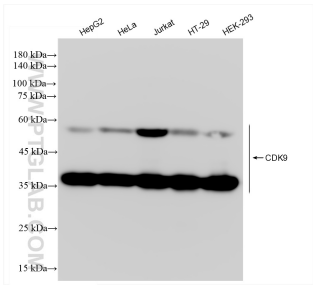
T: 4006900926

E: Proteintech-CN@ptglab.com

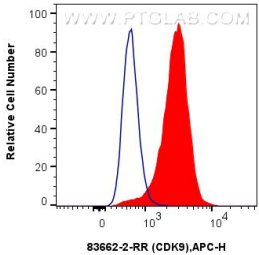
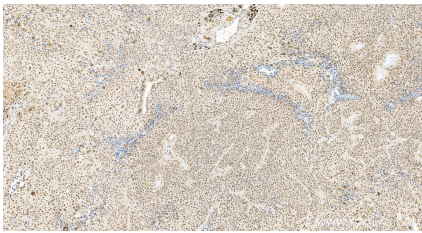
W: ptgcn.com

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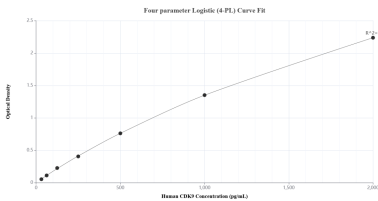
Selected Validation Data



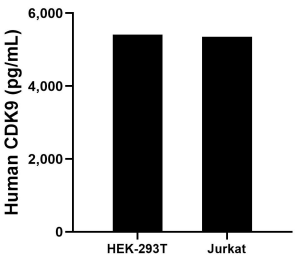
Various lysates were subjected to SDS PAGE followed by western blot with 83662-2-RR (CDK9 antibody) at dilution of 1:20000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 83662-2-PBS in a different storage buffer formulation.



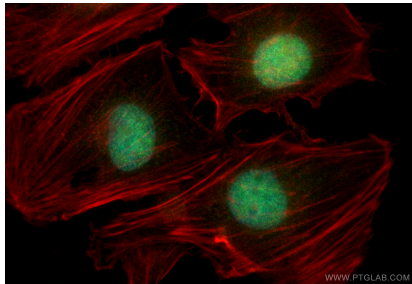
1x10⁶ HeLa cells were intracellularly stained with 0.25 ug CDK9 Recombinant antibody (83662-2-RR, Clone:240600E3) and APC-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L)(red), or 0.25 ug Isotype Control (blue). Cells were fixed and permeabilized with True-Nuclear Transcription Factor Buffer Set. This data was developed using the same antibody clone with 83662-2-PBS in a different storage buffer formulation.



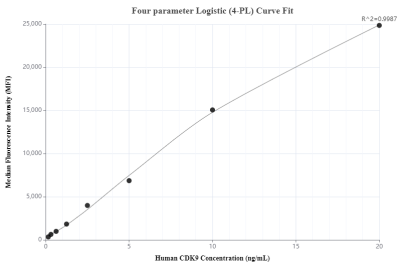
Sandwich ELISA standard curve of MP00630-4, Human CDK9 Recombinant Matched Antibody Pair - PBS only. 83662-6-PBS was coated to a plate as the capture antibody and incubated with serial dilutions of standard Ag2318. 83662-2-PBS was HRP conjugated as the detection antibody. Range: 31.3-2000 pg/mL.



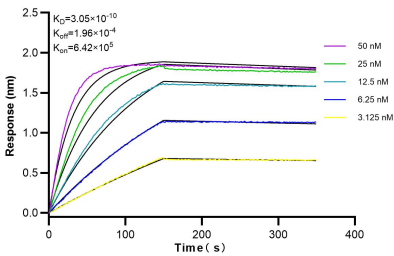
The mean CDK9 concentration was determined to be 5,413.5 pg/mL in HEK-293T cell extract based on a 5.8 mg/mL extract load and 5,349.7 Pg/mL in Jurkat cell extract based on a 1.5 mg/mL extract load.



Immunofluorescent analysis of (4% PFA) fixed HeLa cells using CDK9 antibody (83662-2-RR, Clone: 240600E3) at dilution of 1:1000 and CoraLite@488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2), CL594-phalloidin (red). This data was developed using the same antibody clone with 83662-2-PBS in a different storage buffer formulation.



Cytometric bead array standard curve of MP00630-2, CDK9 Recombinant Matched Antibody Pair, PBS Only. Capture antibody: 83662-5-PBS. Detection antibody: 83662-2-PBS. Standard: Ag2318. Range: 0.156-20 ng/mL.



Biolayer interferometry (BLI) kinetic assays of 83662-2-RR against Human CDK9 were performed. The affinity constant is 0.305 nM.