

# Chk2 Rabbit pAb

Catalog No.: A0466

## Basic Information

### Catalog No.

A0466

### Observed MW

65KDa

### Calculated MW

15-38kDa/50-65kDa

### Category

Primary antibody

### Applications

WB, IHC, IF, IP

### Cross-Reactivity

Human, Mouse

## Recommended Dilutions

<b>WB</b>	1:500 - 1:2000
<b>IHC</b>	1:50 - 1:100
<b>IF</b>	1:50 - 1:200
<b>IP</b>	1:20 - 1:50

## Contact

 | [www.abclonal.com](http://www.abclonal.com)

## Background

In response to DNA damage and replication blocks, cell cycle progression is halted through the control of critical cell cycle regulators. The protein encoded by this gene is a cell cycle checkpoint regulator and putative tumor suppressor. It contains a forkhead-associated protein interaction domain essential for activation in response to DNA damage and is rapidly phosphorylated in response to replication blocks and DNA damage. When activated, the encoded protein is known to inhibit CDC25C phosphatase, preventing entry into mitosis, and has been shown to stabilize the tumor suppressor protein p53, leading to cell cycle arrest in G1. In addition, this protein interacts with and phosphorylates BRCA1, allowing BRCA1 to restore survival after DNA damage. Mutations in this gene have been linked with Li-Fraumeni syndrome, a highly penetrant familial cancer phenotype usually associated with inherited mutations in TP53. Also, mutations in this gene are thought to confer a predisposition to sarcomas, breast cancer, and brain tumors. This nuclear protein is a member of the CDS1 subfamily of serine/threonine protein kinases. Several transcript variants encoding different isoforms have been found for this gene.

## Immunogen Information

<b>Gene ID</b>	<b>Swiss Prot</b>
11200	O96017

### Immunogen

Recombinant fusion protein containing a sequence corresponding to amino acids 1-220 of human Chk2 (NP\_009125.1).

### Synonyms

CDS1;CHK2;HuCds1;LFS2;PP1425;RAD53;hCds1;CHEK2;Chk2

## Product Information

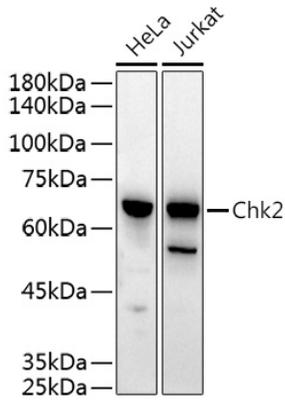
<b>Source</b>	<b>Isotype</b>	<b>Purification</b>
Rabbit	IgG	Affinity purification

### Storage

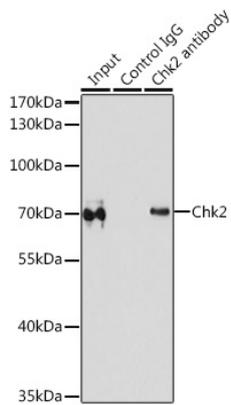
Store at -20°C. Avoid freeze / thaw cycles.

Buffer: PBS with 0.02% sodium azide, 50% glycerol, pH7.3.

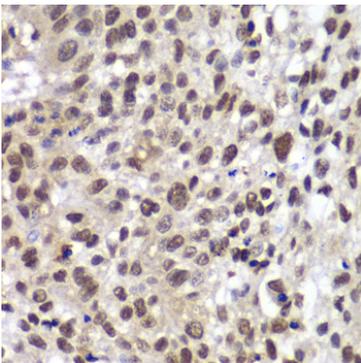
## Validation Data



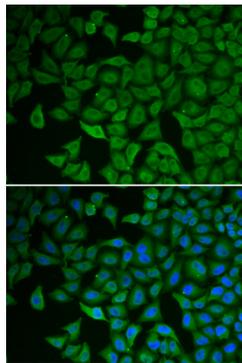
Western blot analysis of extracts of various cell lines, using Chk2 antibody (A0466) at 1:500 dilution. Secondary antibody: HRP Goat Anti-Rabbit IgG (H+L) (A5014) at 1:10000 dilution. Lysates/proteins: 25ug per lane. Blocking buffer: 3% nonfat dry milk in TBST. Detection: ECL Basic Kit (RM00020). Exposure time: 30s.



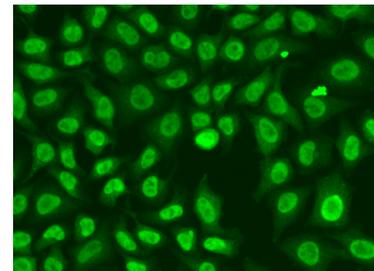
Immunoprecipitation analysis of 200ug extracts of MCF-7 cells using 1ug Chk2 antibody (A0466). Western blot was performed from the immunoprecipitate using Chk2 antibody (A0466) at a dilution of 1:1000.



Immunohistochemistry of paraffin-embedded human lung cancer using Chk2 antibody (A0466) at dilution of 1:100 (40x lens).



Immunofluorescence analysis of HeLa cells using Chk2 antibody (A0466). Blue: DAPI for nuclear staining.



Immunofluorescence analysis of A549 cells using Chk2 antibody (A0466).