# [KO Validated] CDKN2A / p16INK4a Rabbit Polyclonal Antibody



**CAB0262** 

#### **Product Information**

Size:

20uL, 50uL, 100uL, 200uL

**Observed MW:** 

16KDa

Calculated MW:

8kDa/11kDa/12kDa/13kDa/1 6kDa/17kDa

**Applications:** 

WB IHC IF IP

Reactivity:

Human, Mouse, Rat

### **Protein Background**

This gene generates several transcript variants which differ in their first exons. At least three alternatively spliced variants encoding distinct proteins have been reported, two of which encode structurally related isoforms known to function as inhibitors of CDK4 kinase. The remaining transcript includes an alternate first exon located 20 Kb upstream of the remainder of the gene; this transcript contains an alternate open reading frame (ARF) that specifies a protein which is structurally unrelated to the products of the other variants. This ARF product functions as a stabilizer of the tumor suppressor protein p53 as it can interact with, and sequester, the E3 ubiquitin-protein ligase MDM2, a protein responsible for the degradation of p53. In spite of the structural and functional differences, the CDK inhibitor isoforms and the ARF product encoded by this gene, through the regulatory roles of CDK4 and p53 in cell cycle G1 progression, share a common functionality in cell cycle G1 control. This gene is frequently mutated or deleted in a wide variety of tumors, and is known to be an important tumor suppressor gene.

#### Immunogen information

Gene ID:

1029

Uniprot

P42771/Q8N726

## Antibody Information Recommended dilutions:

WB 1:500 - 1:2000 IHC 1:50 - 1:200 IF 1:50 - 1:200 IP 1:50 - 1:200

**Source:** Rabbit

Isotype:

IgG

Synonyms:

CDKN2A; ARF; CDK4I; CDKN2; CMM2; INK4; INK4A; MLM; MTS-1; MTS1; P14; P14ARF; P16; P16-INK4A; P16INK4, P16INK4A; P19; P19ARF; TP16

Immunogen:

A synthetic peptide corresponding to a sequence within amino acids 20 to the C-terminus of human CDKN2A / p16INK4a

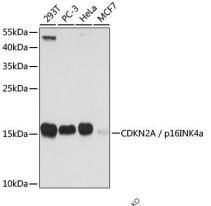
Storage:

Store at -20°C. Avoid freeze / thaw cycles. Buffer: PBS with 0.02% sodium azide, 50% glycerol, pH7.3.

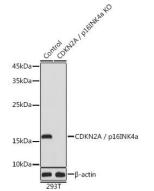
Affinity purification

**Purification:** 

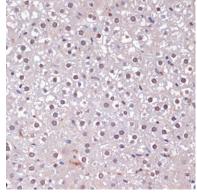
#### **Product Images**



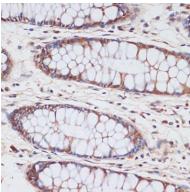
Western blot analysis of extracts of various cell lines, using CDKN2A / p16INK4a antibody (CAB0262) at 1:1000 dilution. Secondary antibody: HRP Goat Anti-Rabbit IgG (H+L) (CABS014) at 1:10000 dilution. Lysates/proteins: 25ug per lane. Blocking buffer: 3% nonfat dry milk in TBST. Detection: ECL Basic Kit (CABM00020). Exposure time: 15s.



Western blot analysis of extracts from normal (control) and CDKN2A/p16INK4a knockout (KO) 293T cells, using CDKN2A/p16INK4a antibody (CAB0262) at 1:1000 dilution. Secondary antibody: HRP Goat Anti-Rabbit IgG (H+L) (CABS014) at 1:10000 dilution. Lysates/proteins: 25ug per lane. Blocking buffer: 3% nonfat dry milk in TBST. Detection: ECL Basic Kit (CABM00020). Exposure time: 10s.



Immunohistochemistry of paraffin-embedded Rat liver using CDKN2A / p16INK4a antibody (CAB0262) at dilution of 1:100 (40x lens).



Immunohistochemistry of paraffin-embedded Human colon using CDKN2A / p16INK4a antibody (CAB0262) at dilution of 1:100 (40x lens).