



## Rabbit Anti-CDKN2A/p16-INK4a antibody

SL20656R

<b>Product Name:</b>	CDKN2A/p16-INK4a
<b>Chinese Name:</b>	抑癌基因p16抗体
<b>Alias:</b>	cyclin-dependent kinase inhibitor 2A; CDK4I; p16-INK4; p16-INK4a; cyclin-dependent kinase 4 inhibitor A; cyclin-dependent kinase inhibitor 2A, isoform 1; Cyclin dependent kinase inhibitor 2A (p16, inhibits CDK4); cell cycle inhibitor; cyclin-dependent kinase inhibitor 2a p16Ink4a; cell cycle regulator; cyclin-dependent kinase inhibitor 2a p19Arf; cyclin-dependent kinase inhibitor 2A, isoform 2; Cdkn2a; Arf; INK4A; MTS1; p16; p16Cdkn2a; p19ARF; CD2A1 HUMAN.
<b>Organism Species:</b>	Rabbit
<b>Clonality:</b>	Polyclonal
<b>React Species:</b>	Human,
<b>Applications:</b>	ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800ICC=1:100-500IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
<b>Molecular weight:</b>	17kDa
<b>Cellular localization:</b>	The nucleuscytoplasmic
<b>Form:</b>	Lyophilized or Liquid
<b>Concentration:</b>	1mg/ml
<b>immunogen:</b>	KLH conjugated synthetic peptide derived from human CDKN2A/p16-INK4a:81-148/148
<b>Lsotype:</b>	IgG
<b>Purification:</b>	affinity purified by Protein A
<b>Storage Buffer:</b>	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
<b>Storage:</b>	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20°C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
<b>PubMed:</b>	<a href="#">PubMed</a>
<b>Product Detail:</b>	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. [provided by RefSeq, Sep 2012].

**Function:**

Acts as a negative regulator of the proliferation of normal cells by interacting strongly with CDK4 and CDK6. This inhibits their ability to interact with cyclins D and to phosphorylate the retinoblastoma protein.

**Subunit:**

Heterodimer with CDK4 or CDK6. Predominant p16 complexes contained CDK6. Interacts (isoforms 1,2 and 4) with CDK4 (both 'T-172'-phosphorylated and non-phosphorylated forms); the interaction inhibits cyclin D-CDK4 kinase activity. Interacts with ISCO2.

**Subcellular Location:**

Cytoplasm. Nucleus.

**Tissue Specificity:**

Widely expressed but not detected in brain or skeletal muscle. Isoform 3 is pancreas-specific.

**DISEASE:**

ote=The association between cutaneous and uveal melanomas in some families suggests that mutations in CDKN2A may account for a proportion of uveal melanomas. However, CDKN2A mutations are rarely found in uveal melanoma patients.

Defects in CDKN2A are the cause of cutaneous malignant melanoma type 2 (CMM2) [MIM:155601]. Malignant melanoma is a malignant neoplasm of melanocytes, arising de novo or from a pre-existing benign nevus, which occurs most often in the skin but also may involve other sites.

Defects in CDKN2A are the cause of familial atypical multiple mole melanoma-pancreatic carcinoma syndrome (FAMMMPC) [MIM:606719].

Defects in CDKN2A are a cause of Li-Fraumeni syndrome (LFS) [MIM:151623]. LFS is a highly penetrant familial cancer phenotype usually associated with inherited mutations in TP53. [DISEASE] Defects in CDKN2A are the cause of melanoma-astrocytoma syndrome (MASTS) [MIM:155755]. The melanoma-astrocytoma syndrome

is characterized by a dual predisposition to melanoma and neural system tumors, commonly astrocytoma.

**Similarity:**

Belongs to the CDKN2 cyclin-dependent kinase inhibitor family.  
Contains 4 ANK repeats.

**SWISS:**

P42771

**Gene ID:**

1029

**Database links:**

[Entrez Gene: 1029](#)Human

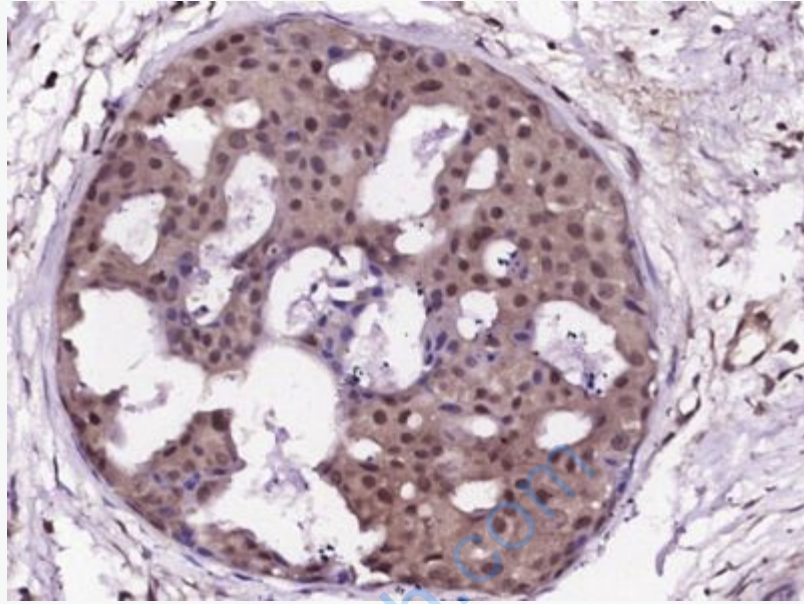
[Oimim: 600160](#)Human

[SwissProt: P42771](#)Human

[Unigene: 512599](#)Human

**Important Note:**

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.



**Picture:**

Paraformaldehyde-fixed, paraffin embedded (Human breast carcinoma); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (CDKN2A/p16-INK4a) Polyclonal Antibody, Unconjugated (SL20656R) at 1:400 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructions and DAB staining.