– DATASHEET –

## [ Primary Antibody ]

## CDKN2A/p16-INK4a Rabbit pAb

Host: Rabbit	<b>lsotype:</b> lgG
Clonality: Polyclonal	
<b>GenelD:</b> 1029	SWISS: P42771
Target: CDKN2A/p16-INK4a	
Immunogen: KLH conjugated synthetic peptide derived from human CDKN2A/p16-INK4a : 61-156/156.	
Purification: affinity purified by P	rotein A
Concentration: 1mg/ml	

Storage: 0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol. Shipped at 4°C. Store at -20°C for one year. Avoid repeated freeze/thaw cycles.

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. [provided by RefSeq, Sep 2012].

### - VALIDATION IMAGES



Sample: U937(Human) Cell Lysate at 30 ug Primary: Anti- CDKN2A/p16-INK4a (bs-23797R) at 1/1000 dilution Secondary: IRDye800CW Goat Anti-Rabbit IgG at 1/20000 dilution Predicted band size: 17 kD Observed band size: 17 kD



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 (bs-23797R) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructionsand DAB staining.



Paraformaldehyde-fixed, paraffin embedded (rat brain); 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) Polyclonal Antibody, Unconjugated (bs-23797R) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructionsand DAB staining.

Applications: WB (1:500-2000) IHC-P (1:100-500) IHC-F (1:100-500) IF (1:100-500)

Reactivity: Human, Mouse, Rat (predicted: Pig)

Predicted MW.: <sup>17 kDa</sup>

Subcellular Location: Cytoplasm ,Nucleus

# – SELECTED CITATIONS —

Bio'ss ANTIBODIES

www.bioss.com.cn sales@bioss.com.cn techsupport@bioss.com.cn 400-901-9800

- [IF=7.7] Wei Zhang. et al. Neuregulin 1 mitigated prolactin deficiency through enhancing TRPM8 signaling under the influence of melatonin in senescent pituitary lactotrophs. INT J BIOL MACROMOL. 2024 Aug;275:133659 WB ;Rat. 38969045
- [IF=5.6] Muzhe Li. et al. Astragaloside IV alleviates macrophage senescence and d-galactose-induced bone loss in mice through STING/NF-KB pathway. INT IMMUNOPHARMACOL. 2024 Mar;129:111588 IF,IHC ;MOUSE. 38290207
- [IF=4.8] Qiao Zhou. et al. Jianpi Qingre Tongluo prescription alleviates the senescence-associated secretory phenotype with osteoarthritis by regulating STAG1/TP53/P21 signaling pathway. J ETHNOPHARMACOL. 2024 Oct;:118953 IHC,WB ;Rat. 39423944
- [IF=3.7] Shuai Li. et al. Oscillatory shear stress activates integrin β3, blocking autophagic flux in endothelial cells and promoting endothelial cells senescence. BBA-MOL CELL RES. 2025 May;:119991 IHC ;MOUSE. 40412535
- [IF=4.047] Xiangdong Tian. et al. Tumor dormancy is closely related to prognosis prediction and tumor immunity in neuroblastoma.. TRANSL PEDIATR. 2023 Mar;12(3):445-461 WB ;Human. 37035400