

Rabbit Anti-p16/INK4a [CDKN2A/4844R]: RM0140, RM0140RTU7

Intended Use: For Research Use Only

Description: p16/INK4A is a tumor-suppressor protein and that genetic and epigenetic abnormalities in genes controlling the G1 checkpoint can lead to both escape from senescence and cancer formation. The interaction of p16/INK4 family members can be a binary complex with CDK4/6 or ternary complex with cyclin D-bound CDK4/6 and ultimately results in the inhibition of cell cycle progression. As such, expression of p16 INK4A is commonly associated with cellular senescence, and disruption of the p16 INK4A gene is frequently observed in human tumor. The p16/INK4A locus is deleted in a wide spectrum of tumors including melanoma, pancreatic adenocarcinoma, glioblastoma, certain leukemias, non-small cell lung cancer, cervical cancer, and bladder carcinoma.

Specifications

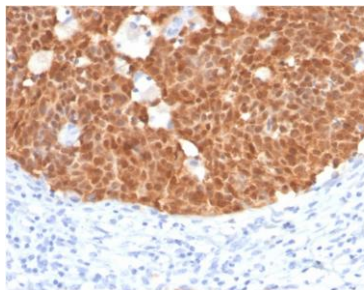
Clone: CDKN2A/4844R
Source: Rabbit
Isotype: IgG
Reactivity: Human
Immunogen: Purified recombinant prokaryotic full-length human p16INK4a protein
Localization: Nucleus and/or cytoplasm
Formulation: Antibody in PBS pH7.4, containing BSA and $\leq 0.09\%$ sodium azide (NaN₃)
Storage: Store at 2°- 8°C
Applications: IHC
Package:

Description	Catalog No.	Size
p16/INK4a Concentrated	RM0140	1 ml
p16/INK4a Prediluted	RM0140RTU7	7 ml

IHC Procedure*

Positive Control Tissue: Squamous Cell Carcinoma
Concentrated Dilution: 50-200
Pretreatment: Tris EDTA pH9.0, 15 minutes using Pressure Cooker, or 30-60 minutes using water bath at 95°-99°C
Incubation Time and Temp: 30-60 minutes @ RT
Detection: Refer to the detection system manual

* Result should be confirmed by an established diagnostic procedure.



FFPE human cervix stained with anti-p16 using DAB

References:

1. Inhibition of the 60S ribosome biogenesis GTPase LSG1 causes endoplasmic reticular disruption and cellular senescence. Pantazi A, et al. Aging Cell. Aug;18(4):e12981, 2019.
2. CDKN2A copy number and p16 expression in malignant pleural mesothelioma in relation to asbestos exposure. Eeva Kettunen, et al. BMC Cancer volume 19, Article number: 507, 2019.
3. Protein and chemotherapy profiling of extracellular vesicles harvested from therapeutic induced senescent triple negative breast cancer cells. Kavanagh EL, et al. Oncogenesis. Oct 9;6(10):e388, 2017.