

MDM2 Polyclonal Antibody

YT2691 Catalog No:

Reactivity: Human; Mouse

IHC;IF;WB;ELISA **Applications:**

Target: MDM2

Fields: >>Endocrine resistance;>>Platinum drug resistance;>>FoxO signaling

> pathway:>>Cell cycle:>>p53 signaling pathway:>>Ubiquitin mediated proteolysis;>>Endocytosis;>>PI3K-Akt signaling pathway;>>Cellular

senescence;>>C-type lectin receptor signaling pathway;>>Thyroid hormone signaling pathway;>>Shigellosis;>>Human cytomegalovirus infection;>>Human

papillomavirus infection;>>Epstein-Barr virus infection;>>Pathways in

cancer;>>Transcriptional misregulation in cancer;>>Viral carcinogenesis;>>Proteoglycans in cancer;>>MicroRNAs in

cancer;>>Glioma;>>Prostate cancer;>>Melanoma;>>Bladder cancer;>>Chronic

The antiserum was produced against synthesized peptide derived from human

myeloid leukemia

Gene Name: MDM₂

Protein Name: E3 ubiquitin-protein ligase Mdm2

Human Gene Id: 4193

Human Swiss Prot

No:

Mouse Swiss Prot

No:

P23804

Q00987

Immunogen: MDM2. AA range:151-200

MDM2 Polyclonal Antibody detects endogenous levels of MDM2 protein. **Specificity:**

Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide. Formulation:

Polyclonal, Rabbit, IgG Source:

Dilution: WB 1:500-2000 IHC 1:100 - 1:300. IF 1:200 - 1:1000. ELISA: 1:5000. Not yet

1/3



tested in other applications.

Purification: The antibody was affinity-purified from rabbit antiserum by affinity-

chromatography using epitope-specific immunogen.

Concentration: 1 mg/ml

Storage Stability: -15°C to -25°C/1 year(Do not lower than -25°C)

Molecularweight: 55kD

Cell Pathway: Cell Cycle G1S;Cell Cycle G2M DNA;p53;Ubiquitin mediated

> proteolysis; Endocytosis; Pathways in cancer; Glioma; Prostate cancer;Melanoma;Bladder cancer;Chronic myeloid leukemia;

Background: This gene encodes a nuclear-localized E3 ubiquitin ligase. The encoded protein

can promote tumor formation by targeting tumor suppressor proteins, such as p53, for proteasomal degradation. This gene is itself transcriptionally-regulated by p53. Overexpression or amplification of this locus is detected in a variety of different cancers. There is a pseudogene for this gene on chromosome 2.

Alternative splicing results in a multitude of transcript variants, many of which may

be expressed only in tumor cells. [provided by RefSeq, Jun 2013],

Function: disease: Seems to be amplified in certain tumors (including soft tissue sarcomas,

osteosarcomas and gliomas). A higher frequency of splice variants lacking p53 binding domain sequences was found in late-stage and high-grade ovarian and

bladder carcinomas. Four of the splice variants show loss of p53

binding.,domain:Region I is sufficient for binding p53 and inhibiting its G1 arrest and apoptosis functions. It also binds p73 and E2F1. Region II contains most of a central acidic region required for interaction with ribosomal protein L5 and a putative C4-type zinc finger. The RING finger domain which coordinates two molecules of zinc interacts specifically with RNA whether or not zinc is present and mediates the heterooligomerization with MDM4. It is also essential for its ubiquitin ligase E3 activity toward p53 and itself., function: Inhibits TP53/p53- and

TP73/p73-mediated cell cycle arrest

Subcellular Location:

Nucleus, nucleoplasm. Cytoplasm. Nucleus, nucleolus. Nucleus . Expressed predominantly in the nucleoplasm. Interaction with ARF(P14) results in the localization of both proteins to the nucleolus. The nucleolar localization signals in both ARF(P14) and MDM2 may be necessary to allow efficient nucleolar localization of both proteins. Colocalizes with RASSF1 isoform A in the nucleus.

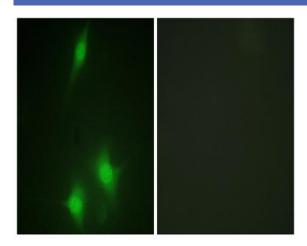
Ubiquitous. Isoform Mdm2-A, isoform Mdm2-B, isoform Mdm2-C, isoform **Expression:**

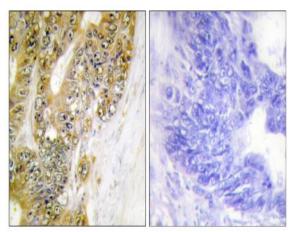
Mdm2-D, isoform Mdm2-E, isoform Mdm2-F and isoform Mdm2-G are observed

in a range of cancers but absent in normal tissues.



Products Images





Immunohistochemistry analysis of paraffin-embedded human colon carcinoma tissue, using MDM2 Antibody. The picture on the right is blocked with the synthesized peptide.