

## **Atm Polyclonal Antibody**

Catalog No: YT0398

Reactivity: Human; Mouse

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

Target: Atm

**Fields:** >>Platinum drug resistance;>>Homologous recombination;>>NF-kappa B

signaling pathway;>>FoxO signaling pathway;>>Cell cycle;>>p53 signaling pathway;>>Apoptosis;>>Cellular senescence;>>Shigellosis;>>Human

papillomavirus infection;>>Human T-cell leukemia virus 1 infection;>>Human

immunodeficiency virus 1 infection;>>Transcriptional misregulation in

cancer;>>MicroRNAs in cancer

Gene Name: ATM

**Protein Name:** Serine-protein kinase ATM

Q62388

Human Gene Id: 472

**Human Swiss Prot** Q13315

No:

**Mouse Swiss Prot** 

No:

Immunogen: Synthesized peptide derived from Atm. at AA range: 1920-2000

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

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

Source: Polyclonal, Rabbit, IgG

**Dilution :** IHC 1:100 - 1:300. ELISA: 1:10000,WB 1:500-2000. IF 1:50-200

**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: 351kD

**Cell Pathway:** Cell\_Cycle\_G1S;Cell\_Cycle\_G2M\_DNA; NF\_kappaB; Protein\_Acetylation

**Background:** The protein encoded by this gene belongs to the PI3/PI4-kinase family. This

protein is an important cell cycle checkpoint kinase that phosphorylates; thus, it functions as a regulator of a wide variety of downstream proteins, including tumor suppressor proteins p53 and BRCA1, checkpoint kinase CHK2, checkpoint proteins RAD17 and RAD9, and DNA repair protein NBS1. This protein and the closely related kinase ATR are thought to be master controllers of cell cycle checkpoint signaling pathways that are required for cell response to DNA damage

and for genome stability. Mutations in this gene are associated with ataxia

telangiectasia, an autosomal recessive disorder. [provided by RefSeq, Aug 2010],

**Function:** catalytic activity:ATP + a protein = ADP + a phosphoprotein.,disease:Defects in

ATM are the cause of ataxia telangiectasia (AT) [MIM:208900]; also known as Louis-Bar syndrome, which includes four complementation groups: A, C, D and E. This rare recessive disorder is characterized by progressive cerebellar ataxia, dilation of the blood vessels in the conjunctiva and eyeballs, immunodeficiency,

growth retardation and sexual immaturity. AT patients have a strong

predisposition to cancer; about 30% of patients develop tumors, particularly lymphomas and leukemias. Cells from affected individuals are highly sensitive to damage by ionizing radiation and resistant to inhibition of DNA synthesis following irradiation., disease: Defects in ATM contribute to B-cell chronic lymphocytic

leukemia (BCLL). BCLL is the commonest form of leukemia in the elderly. It is

characterized by the accumulation of ma

Subcellular Location : Nucleus . Cytoplasmic vesicle . Cytoplasm, cytoskeleton, microtubule organizing

center, centrosome . Primarily nuclear. Found also in endocytic vesicles in

association with beta-adaptin. .

**Expression:** Found in pancreas, kidney, skeletal muscle, liver, lung, placenta, brain, heart,

spleen, thymus, testis, ovary, small intestine, colon and leukocytes.

## **Products Images**





Immunohistochemical analysis of paraffin-embedded human spleen. 1, Tris-EDTA,pH9.0 was used for antigen retrieval. 2 Antibody was diluted at 1:200(4° overnight.3,Secondary antibody was diluted at 1:200(room temperature, 45min).