



# RAD1 Polyclonal Antibody

<b>Catalog No</b>	YP-Ab-10868
<b>Isotype</b>	IgG
<b>Reactivity</b>	Human; Mouse
<b>Applications</b>	IHC;IF;WB
<b>Gene Name</b>	RAD1 REC1
<b>Protein Name</b>	RAD1
<b>Immunogen</b>	Synthesized peptide derived from human RAD1
<b>Specificity</b>	This antibody detects endogenous levels of human RAD1
<b>Formulation</b>	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
<b>Source</b>	Polyclonal, Rabbit,IgG
<b>Purification</b>	The antibody was affinity-purified from rabbit serum by affinity-chromatography using specific immunogen.
<b>Dilution</b>	IHC-p 1:50-200, WB 1:500-2000. IF 1:50-200
<b>Concentration</b>	1 mg/ml
<b>Purity</b>	≥90%
<b>Storage Stability</b>	-20°C/1 year
<b>Synonyms</b>	Cell cycle checkpoint protein RAD1 (hRAD1;EC 3.1.11.2;DNA repair exonuclease rad1 homolog;Rad1-like DNA damage checkpoint protein)
<b>Observed Band</b>	32kD
<b>Cell Pathway</b>	Nucleus .
<b>Tissue Specificity</b>	Expressed in testis, uterus, bladder, spleen, ovaries, lung, brain and muscle (at protein level).
<b>Function</b>	catalytic activity:Exonucleolytic cleavage in the 3'- to 5'-direction to yield nucleoside 5'-phosphates.,function:Component of the 9-1-1 cell-cycle checkpoint response complex that plays a major role in DNA repair. The 9-1-1 complex is recruited to DNA lesion upon damage by the RAD17-replication factor C (RFC) clamp loader complex. Acts then as a sliding clamp platform on DNA for several proteins involved in long-patch base excision repair (LP-BER). The 9-1-1 complex stimulates DNA polymerase beta (POLB) activity by increasing its affinity for the 3'-OH end of the primer-template and stabilizes POLB to those sites where LP-BER proceeds; endonuclease FEN1 cleavage activity on substrates with double, nick, or gap flaps of distinct sequences and lengths; and DNA ligase I (LIG1) on long-patch base excision repair substrates. Isoform 1 possesses 3'->5' double stranded DNA exonuclease activity
<b>Background</b>	This gene encodes a component of a heterotrimeric cell cycle checkpoint complex, known as the 9-1-1 complex, that is activated to stop cell cycle



progression in response to DNA damage or incomplete DNA replication. The 9-1-1 complex is recruited by RAD17 to affected sites where it may attract specialized DNA polymerases and other DNA repair effectors. Alternatively spliced transcript variants of this gene have been described. [provided by RefSeq, Jan 2009],

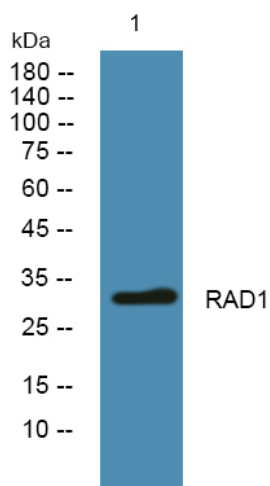
**matters needing attention**

Avoid repeated freezing and thawing!

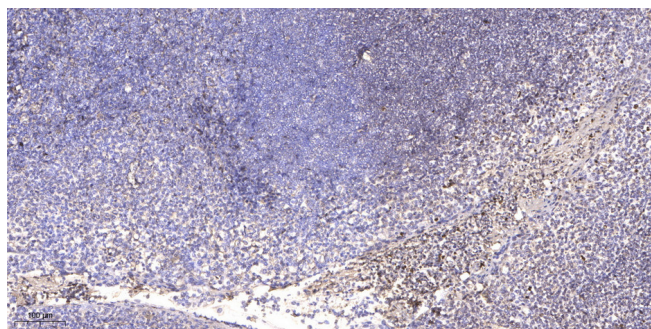
**Usage suggestions**

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

## Products Images



Western blot analysis of lysates from PC12 cells, primary antibody was diluted at 1:1000, 4° over night



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