

For Research Use Only

# RAD50 Polyclonal antibody

Catalog Number: 29390-1-AP

4 Publications



## Basic Information

Catalog Number:

29390-1-AP

Concentration:

650 ug/ml

Source:

Rabbit

Isotype:

IgG

Immunogen Catalog Number:

AG29949

GenBank Accession Number:

NM\_005732

GeneID (NCBI):

10111

UNIPROT ID:

Q92878

Full Name:

RAD50 homolog (S. cerevisiae)

Calculated MW:

154 kDa

Observed MW:

154 kDa

Purification Method:

Antigen affinity purification

Recommended Dilutions:

WB: 1:2000-1:10000

IHC: 1:400-1:1600

IF-P: 1:50-1:500

IF/ICC: 1:50-1:500

## Applications

Tested Applications:

WB, IHC, IF/ICC, IF-P, ELISA

Cited Applications:

WB, IF

Species Specificity:

human, mouse, rat

Cited Species:

human, mouse

**Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (\*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0**

Positive Controls:

WB: C6 cells, Jurkat cells, K-562 cells, MCF-7 cells, MOLT-4 cells

IHC: human breast cancer tissue, mouse testis tissue, human placenta tissue

IF-P: mouse testis tissue,

IF/ICC: MCF-7 cells, HeLa cells

## Background Information

RAD50 belongs to the ABC-ATPase protein family that concurs in forming the Nucleotide Binding Domain (NBD). ATP binding to Rad50 induces a conformational change that dramatically increases the Rad50 NBD affinity for itself, allowing for its dimerization (PMID: 37569756). The Mre11-Rad50 (MR) complex has key functions in the detection, signaling and repair of DNA breaks (PMID: 35501303).

## Notable Publications

Author	Pubmed ID	Journal	Application
LiYao Ma	40239548	Ecotoxicol Environ Saf	WB
Zhengyan Chang	39548564	J Transl Med	WB
Yahui Wang	38697125	Cell Genom	IF

## Storage

Storage:

Store at -20°C. Stable for one year after shipment.

Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol, pH7.3

Aliquoting is unnecessary for -20°C storage

For technical support and original validation data for this product please contact:

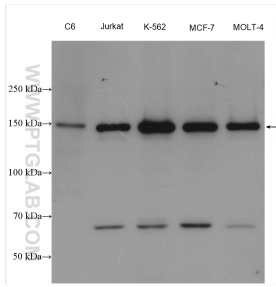
T: 4006900926

E: [Proteintech-CN@ptglab.com](mailto:Proteintech-CN@ptglab.com)

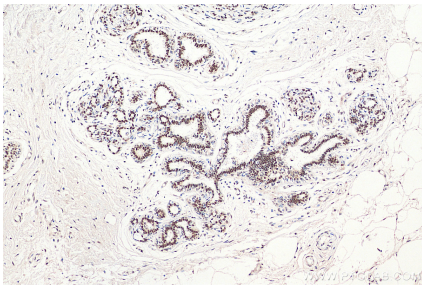
W: [ptgcn.com](http://ptgcn.com)

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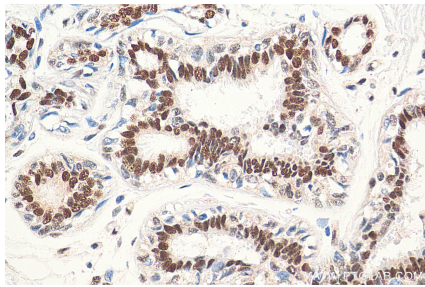
Selected Validation Data



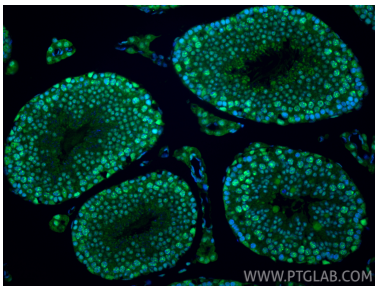
Various lysates were subjected to SDS PAGE followed by western blot with 29390-1-AP (RAD50 antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours.



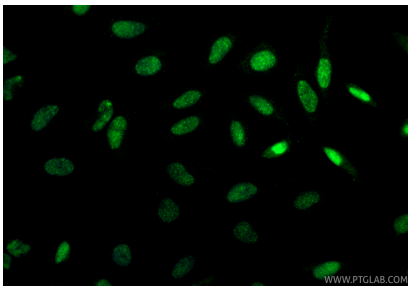
Immunohistochemical analysis of paraffin-embedded human breast cancer tissue slide using 29390-1-AP (RAD50 antibody) at dilution of 1:800 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



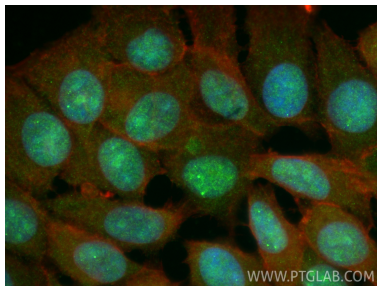
Immunohistochemical analysis of paraffin-embedded human breast cancer tissue slide using 29390-1-AP (RAD50 antibody) at dilution of 1:800 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed paraffin-embedded mouse testis tissue using RAD50 antibody (29390-1-AP) at dilution of 1:200 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed HeLa cells using RAD50 antibody (29390-1-AP) at dilution of 1:400 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2).



Immunofluorescent analysis of (4% PFA) fixed MCF-7 cells using RAD50 antibody (29390-1-AP) at dilution of 1:200 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2), CL594-phalloidin (red).