

KD-Validated Anti-Phospho-Rad17 (S656) Rabbit Monoclonal Antibody
Rabbit monoclonal antibody
Catalog # AGI1626

Specification

KD-Validated Anti-Phospho-Rad17 (S656) Rabbit Monoclonal Antibody - Product Information

Application	WB, FC
Primary Accession	O75943
Reactivity	Human, Mouse
Clonality	Monoclonal
Isotype	Rabbit IgG
Calculated MW	Predicted, 77 kDa , observed , 85 kDa KDa
Gene Name	RAD17
Aliases	RAD17 Checkpoint Clamp Loader Component; RAD17Sp; Rad24; CCYC; Cell Cycle Checkpoint Protein RAD17; R24L; Cell Cycle Checkpoint Protein (RAD17); RAD17 Homolog (S. Pombe); RF-C Activator 1 Homolog; RF-C/Activator 1 Homolog; RAD1 (S. Pombe) Homolog; Rad17-Like Protein; RAD17 Homolog; RAD1 Homolog; HRAD17; HRad17
Immunogen	A synthesized peptide derived from human Phospho-Rad17 (S656)

KD-Validated Anti-Phospho-Rad17 (S656) Rabbit Monoclonal Antibody - Additional Information

Gene ID **5884**
Other Names
 Cell cycle checkpoint protein RAD17, hRad17, RF-C/activator 1 homolog, RAD17
 {ECO:0000303|PubMed:9878245, ECO:0000312|HGNC:HGNC:9807}

KD-Validated Anti-Phospho-Rad17 (S656) Rabbit Monoclonal Antibody - Protein Information

Name RAD17 {ECO:0000303|PubMed:9878245, ECO:0000312|HGNC:HGNC:9807}

Function

Essential for sustained cell growth, maintenance of chromosomal stability, and ATR-dependent checkpoint activation upon DNA damage (PubMed:10208430, PubMed:11418864, PubMed:11687627, PubMed:11799063, PubMed:12672690, PubMed:14624239, PubMed:<a

[15235112](http://www.uniprot.org/citations/15235112)). Has a weak ATPase activity required for binding to chromatin (PubMed:[10208430](http://www.uniprot.org/citations/10208430), PubMed:[11418864](http://www.uniprot.org/citations/11418864), PubMed:[11687627](http://www.uniprot.org/citations/11687627), PubMed:[11799063](http://www.uniprot.org/citations/11799063), PubMed:[12672690](http://www.uniprot.org/citations/12672690), PubMed:[14624239](http://www.uniprot.org/citations/14624239), PubMed:[15235112](http://www.uniprot.org/citations/15235112)). Participates in the recruitment of the 9-1-1 (RAD1-RAD9-HUS1) complex and RHNO1 onto chromatin, and in CHEK1 activation (PubMed:[21659603](http://www.uniprot.org/citations/21659603)). Involved in homologous recombination by mediating recruitment of the MRN complex to DNA damage sites (PubMed:[24534091](http://www.uniprot.org/citations/24534091)). May also serve as a sensor of DNA replication progression (PubMed:[12578958](http://www.uniprot.org/citations/12578958), PubMed:[14500819](http://www.uniprot.org/citations/14500819), PubMed:[15538388](http://www.uniprot.org/citations/15538388)).

Cellular Location

Nucleus. Chromosome Note=Phosphorylated form redistributes to discrete nuclear foci upon DNA damage (PubMed:11799063). Localizes to DNA double-strand breaks (DSBs) (PubMed:24534091).

Tissue Location

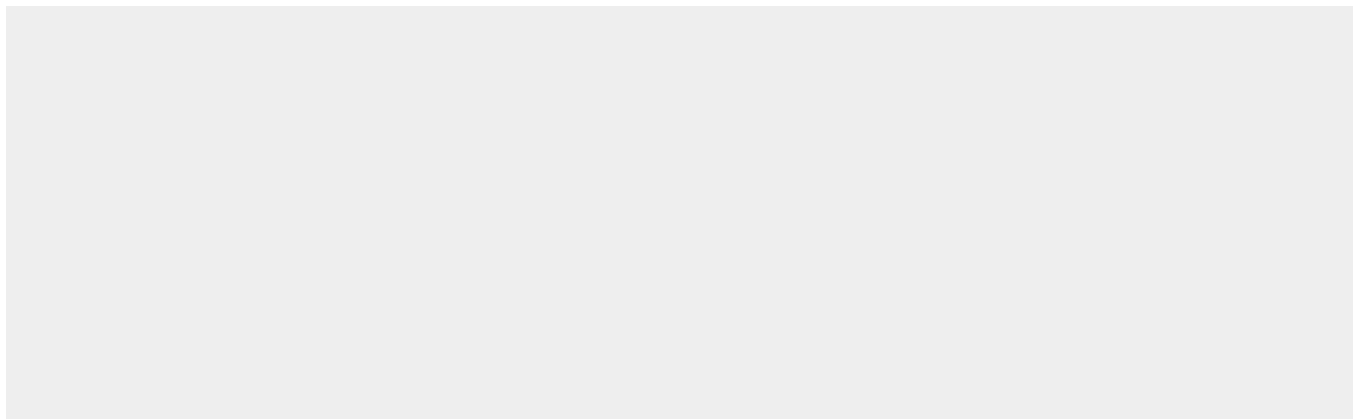
Overexpressed in various cancer cell lines and in colon carcinoma (at protein level). Isoform 2 and isoform 3 are the most abundant isoforms in non irradiated cells (at protein level) Ubiquitous at low levels. Highly expressed in testis, where it is expressed within the germinal epithelium of the seminiferous tubuli Weakly expressed in seminomas (testicular tumors)

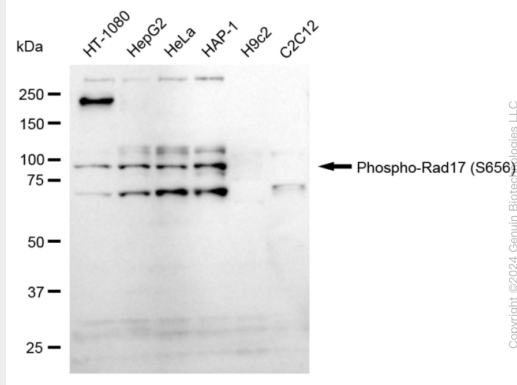
KD-Validated Anti-Phospho-Rad17 (S656) Rabbit Monoclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

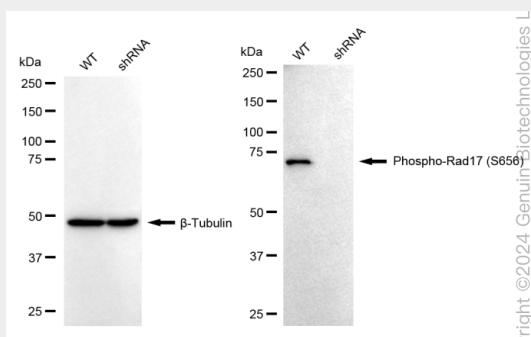
- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

KD-Validated Anti-Phospho-Rad17 (S656) Rabbit Monoclonal Antibody - Images

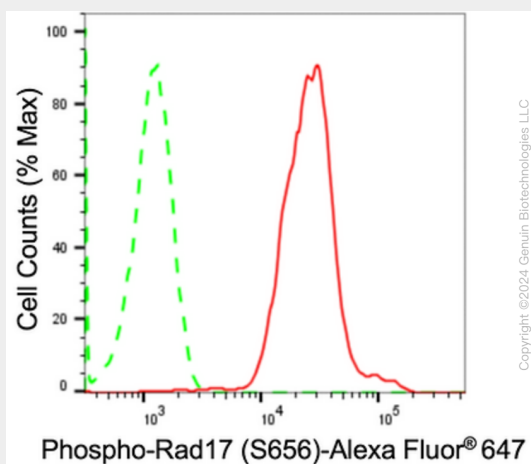




Western blotting analysis using anti-Phospho-Rad17 (S656) antibody (Cat#AGI1626). Total cell lysates (30 μ g) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with anti-Phospho-Rad17 (S656) antibody (Cat#AGI1626, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody respectively.



Western blotting analysis using anti-phospho-Rad17 (S656) antibody (Cat#AGI1626). Phospho-Rad17 (S656) expression in wild-type (WT) and RAD17 shRNA knockdown (KD) HeLa cells with 30 μ g of total cell lysates. β -Tubulin serves as a loading control. The blot was incubated with anti-phospho-Rad17 (S656) antibody (Cat#AGI1626, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody respectively.



Flow cytometric analysis of Phospho-Rad17 (S656) expression in HAP-1 cells using anti-Phospho-Rad17 (S656) antibody (Cat#AGI1626, 1:2,000). Green, isotype control; red, Phospho-Rad17 (S656).