

[KO]MAD2L2 Rabbit mAb

Catalog # AP75687

Product Information

Application	WB, IHC-P, FC, IP
Primary Accession	Q9UI95
Reactivity	Rat, Human, Mouse
Host	Rabbit
Clonality	Monoclonal Antibody
Isotype	IgG
Conjugate	Unconjugated
Purification	Affinity Purified
Calculated MW	24334

Additional Information

Gene ID	10459
Other Names	MAD2L2
Dilution	WB~~1:500-1:1000 IHC-P~~N/A FC~~1:50-1:100 IP~~1:20-1:50
Format	Liquid in 50mM Tris-Glycine(pH 7.4), 0.15M NaCl, 40%Glycerol, 0.01% sodium azide and 0.05% BSA.
Storage	Store at 4°C short term. Aliquot and store at -20°C long term. Avoid freeze/thaw cycles.

Protein Information

Name	MAD2L2
Synonyms	MAD2B, REV7
Function	Adapter protein able to interact with different proteins and involved in different biological processes (PubMed: 11459825 , PubMed: 11459826 , PubMed: 17296730 , PubMed: 17719540 , PubMed: 19443654 , PubMed: 29656893). Mediates the interaction between the error-prone DNA polymerase zeta catalytic subunit REV3L and the inserter polymerase REV1, thereby mediating the second polymerase switching in translesion DNA synthesis (PubMed: 20164194 , PubMed: 23143872). Translesion DNA synthesis releases the replication blockade of replicative polymerases, stalled in presence of DNA lesions (PubMed: 20164194). Component of the shieldin complex, which plays an important role in repair of DNA double-stranded breaks (DSBs) (PubMed: 29656893). During G1 and S phase of the cell cycle, the complex functions downstream of TP53BP1 to promote non-homologous end joining (NHEJ) and suppress DNA end resection (PubMed: 29656893).

Mediates various NHEJ-dependent processes including immunoglobulin class-switch recombination, and fusion of unprotected telomeres (PubMed:[29656893](#)). May also regulate another aspect of cellular response to DNA damage through regulation of the JNK-mediated phosphorylation and activation of the transcriptional activator ELK1 (PubMed:[17296730](#)). Inhibits the FZR1- and probably CDC20-mediated activation of the anaphase promoting complex APC thereby regulating progression through the cell cycle (PubMed:[11459825](#), PubMed:[17719540](#)). Regulates TCF7L2-mediated gene transcription and may play a role in epithelial-mesenchymal transdifferentiation (PubMed:[19443654](#)).

Cellular Location

Nucleus. Cytoplasm, cytoskeleton, spindle. Cytoplasm. Chromosome.
Note=Recruited to sites of chromosomal double-stranded breaks during G1 and S phase of the cell cycle

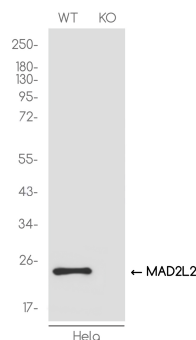
Tissue Location

Ubiquitously expressed.

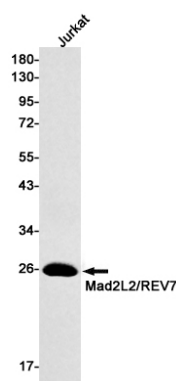
Background

Adapter protein able to interact with different proteins and involved in different biological processes. Mediates the interaction between the error-prone DNA polymerase zeta catalytic subunit REV3L and the inserter polymerase REV1, thereby mediating the second polymerase switching in translesion DNA synthesis.

Images

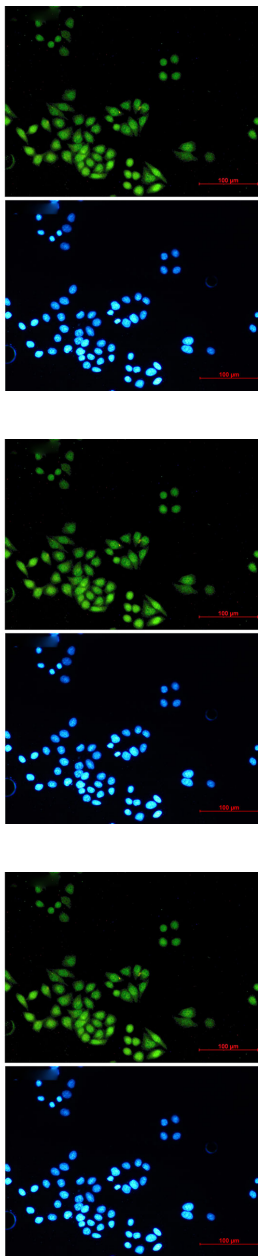


Western blot analysis of MAD2L2 in HeLa(WT) and MAD2L2-Knockout HeLa(KO) using MAD2L2 antibody.



Western blot analysis of Mad2L2/REV7 in Jurkat lysates using MAD2L2 antibody.

Immunocytochemistry analysis of Mad2L2/REV7 (green) in HeLa using Mad2L2/REV7 antibody, and DAPI(blue)



Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.