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# Rad18 Polyclonal Antibody

Catalog # AP72142

### **Product Information**

Application WB
Primary Accession Q9NS91
Reactivity Human, Rat
Host Rabbit
Clonality Polyclonal
Calculated MW 56223

#### **Additional Information**

**Gene ID** 56852

Other Names RAD18; RNF73; E3 ubiquitin-protein ligase RAD18; Postreplication repair

protein RAD18; hHR18; hRAD18; RING finger protein 73

Dilution WB~~Western Blot: 1/500 - 1/2000. ELISA: 1/40000. Not yet tested in other

applications.

Format Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.09% (W/V) sodium

azide.

Storage Conditions -20°C

#### **Protein Information**

Name RAD18

Synonyms RNF73

**Function** E3 ubiquitin-protein ligase involved in postreplication repair of UV-damaged

DNA. Postreplication repair functions in gap- filling of a daughter strand on replication of damaged DNA. Associates to the E2 ubiquitin conjugating enzyme UBE2B to form the UBE2B-RAD18 ubiquitin ligase complex involved in mono-ubiquitination of DNA- associated PCNA on 'Lys-164'. Has ssDNA

binding activity.

**Cellular Location** Nucleus. Cytoplasm, cytoskeleton, microtubule organizing center,

centrosome. Note=Associates with chromatin (PubMed:25931565).

Colocalizes with SLF1 in the nucleus and to centrosomes (PubMed:15632077).

Relocalizes with SLF1 to nuclear foci in response to DNA damage

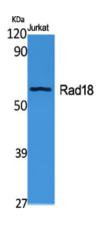
(PubMed:22036607). Accumulates with the SLF1- SLF2 and SMC5-SMC6 complexes at replication-coupled DNA interstrand repair and DNA double-strand breaks (DSBs) sites on chromatin in a ubiquitin-dependent

manner (PubMed:25931565)

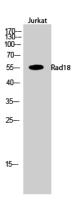
## **Background**

E3 ubiquitin-protein ligase involved in postreplication repair of UV-damaged DNA. Postreplication repair functions in gap- filling of a daughter strand on replication of damaged DNA. Associates to the E2 ubiquitin conjugating enzyme UBE2B to form the UBE2B-RAD18 ubiquitin ligase complex involved in monoubiquitination of DNA-associated PCNA on 'Lys-164'. Has ssDNA binding activity.

## **Images**



Western Blot analysis of various cells using Rad18 Polyclonal Antibody cells nucleus extracted by Minute TM Cytoplasmic and Nuclear Fractionation kit (SC-003,Inventbiotech,MN,USA).



Western Blot analysis of Jurkat cells using Rad18 Polyclonal Antibody cells nucleus extracted by Minute TM Cytoplasmic and Nuclear Fractionation kit (SC-003,Inventbiotech,MN,USA).

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