

MCM7 Antibody

Rabbit mAb Catalog # AP91495

Specification

MCM7 Antibody - Product Information

Application Primary Accession Reactivity Clonality Other Names CDC47 homolog; P1.1-MCM3; MCM7; CDC47; MCM	WB, IHC, FC, ICC, IP <u>P33993</u> Rat Monoclonal 12; P1CDC47; P85MCM; PNAS146; PPP1R104;
Isotype Host Calculated MW	Rabbit IgG Rabbit 81308 Da
MCM7 Antibody - Additional Information	
Purification Immunogen	Affinity-chromatography A synthesized peptide derived from human
Description	MCM7 Acts as component of the MCM2-7 complex (MCM complex) which is the putative replicative helicase essential for 'once per cell cycle' DNA replication initiation and elongation in eukaryotic cells. The active ATPase sites in the MCM2-7 ring are formed through the interaction surfaces of two neighboring subunits such that a critical structure of a conserved arginine finger motif is provided in trans relative to the ATP-binding site of the Walker A box of
Storage Condition and Buffer	the adjacent subunit. Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term. Avoid freeze / thaw cycle.

MCM7 Antibody - Protein Information

Name MCM7 (HGNC:6950)

Synonyms CDC47, MCM2

Function

Acts as a component of the MCM2-7 complex (MCM complex) which is the replicative helicase essential for 'once per cell cycle' DNA replication initiation and elongation in eukaryotic cells. Core



component of CDC45-MCM-GINS (CMG) helicase, the molecular machine that unwinds template DNA during replication, and around which the replisome is built (PubMed:25661590, PubMed:32453425, PubMed:34694004, PubMed:34700328, PubMed:3453425, PubMed:35585232, PubMed:9305914). The active ATPase sites in the MCM2-7 ring are formed through the interaction surfaces of two neighboring subunits such that a critical structure of a conserved arginine finger motif is provided in trans relative to the ATP-binding site of the Walker A box of the adjacent subunit. The six ATPase active sites, however, are likely to contribute differentially to the complex helicase activity (PubMed:32453425). Required for S-phase checkpoint activation upon UV-induced damage.

Cellular Location

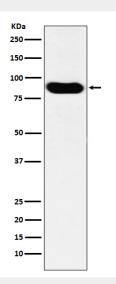
Nucleus. Chromosome. Note=Associated with chromatin before the formation of nuclei and detaches from it as DNA replication progresses.

MCM7 Antibody - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- <u>Immunofluorescence</u>
- Immunoprecipitation
- <u>Flow Cytomety</u>
- <u>Cell Culture</u>

MCM7 Antibody - Images



Western blot analysis of MCM7 expression in Hela cell lysate.