



## Rabbit Anti-MCM10 antibody

SL18728R

<b>Product Name:</b>	MCM10
<b>Chinese Name:</b>	微小染色体维持缺陷蛋白10抗体
<b>Alias:</b>	FLJ31133 ; HsMCM10 ; mcm10 ; MCM10 minichromosome maintenance deficient 10 ; MCM10_HUMAN ; Minichromosome maintenance protein 10 isoform 1 ; PRO2249 ; Protein MCM10 homolog.
<b>Organism Species:</b>	Rabbit
<b>Clonality:</b>	Polyclonal
<b>React Species:</b>	Human,Mouse,Rat,Cow,Horse,Rabbit,Sheep,
<b>Applications:</b>	ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800ICC=1:100-500IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
<b>Molecular weight:</b>	98kDa
<b>Cellular localization:</b>	The nucleus
<b>Form:</b>	Lyophilized or Liquid
<b>Concentration:</b>	1mg/ml
<b>immunogen:</b>	KLH conjugated synthetic peptide derived from human MCM10:781-875/875
<b>Lsotype:</b>	IgG
<b>Purification:</b>	affinity purified by Protein A
<b>Storage Buffer:</b>	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
<b>Storage:</b>	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20°C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
<b>PubMed:</b>	<a href="#">PubMed</a>
<b>Product Detail:</b>	The protein encoded by this gene is one of the highly conserved mini-chromosome maintenance proteins (MCM) that are involved in the initiation of eukaryotic genome replication. The hexameric protein complex formed by MCM proteins is a key component of the pre-replication complex (pre-RC) and it may be involved in the formation of replication forks and in the recruitment of other DNA replication related

proteins. This protein can interact with MCM2 and MCM6, as well as with the origin recognition protein ORC2. It is regulated by proteolysis and phosphorylation in a cell cycle-dependent manner. Studies of a similar protein in *Xenopus* suggest that the chromatin binding of this protein at the onset of DNA replication is after pre-RC assembly and before origin unwinding. Alternatively spliced transcript variants encoding distinct isoforms have been identified. [provided by RefSeq, Jul 2008]

**Function:**

Acts as a replication initiation factor that brings together the MCM2-7 helicase and the DNA polymerase alpha/primase complex in order to initiate DNA replication. Additionally, plays a role in preventing DNA damage during replication.

**Subcellular Location:**

Nucleus. Colocalizes with ORC2 in nuclei foci. Associated with chromatin in S phase. From early to mid-S phase located in discrete nuclear foci. In early S phase, several hundred foci appeared throughout the nucleus. In mid-S phase, the foci appeared at the nuclear periphery and nucleolar regions. In the late S and G phases localized to nucleoli. Target information above from: UniProt accession Q7L590 The UniProt Consortium The Universal Protein Resource (UniProt) in 2010 *Nucleic Acids Res.* 38:D142-D148 (2010) .

**Post-translational modifications:**

Phosphorylated upon DNA damage, probably by ATM or ATR.

**Similarity:**

Belongs to the MCM10 family.

**SWISS:**

Q7L590

**Gene ID:**

55388

**Database links:**

[Entrez Gene: 55388](#) Human

[Entrez Gene: 70024](#) Mouse

[Entrez Gene: MCM10](#) Rat

[Omim: 609357](#) Human

[SwissProt: Q3MIR3](#) Human

[SwissProt: Q5T670](#) Human

[SwissProt: Q7L590](#) Human

[SwissProt: Q9H0D7](#) Human

[SwissProt: Q9H3P9](#) Human

[SwissProt: Q0VBD2](#) Mouse

[SwissProt: Q505F3](#) Mouse

[SwissProt: Q8BMJ1](#) Mouse

[SwissProt: Q8BY66](#) Mouse

[Unigene: 198363](#) Human

[Unigene: 23828](#) Mouse

[Unigene: 447935](#) Mouse

**Important Note:**

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.