

Anti-Mer2 (RABBIT) Antibody
Mer2 Antibody
Catalog # ASR5348**Specification**

Anti-Mer2 (RABBIT) Antibody - Product Information

| | |
|------------------|---|
| Host | Rabbit |
| Conjugate | Unconjugated |
| Target Species | Saccharomyces cerevisiae |
| Reactivity | Saccharomyces cerevisiae |
| Clonality | Polyclonal |
| Application | WB, E, IP, I, LCI |
| Application Note | This affinity purified antibody has been tested for use in ELISA and by western blot. Specific conditions for reactivity should be optimized by the end user. Expect a band approximately 50 kDa in size corresponding to Mer2 protein by western blotting in the appropriate cell lysate or extract. This antibody is reactive with both phosphorylated and unphosphorylated Mer2 at the S30 position. |
| Physical State | Liquid (sterile filtered) |
| Buffer | 0.02 M Potassium Phosphate, 0.15 M Sodium Chloride, pH 7.2 |
| Immunogen | This affinity purified antibody was prepared from whole rabbit serum produced by repeated immunizations with a synthetic peptide corresponding to amino acids 26-35 of Saccharomyces cerevisiae Mer2 protein. |
| Preservative | 0.01% (w/v) Sodium Azide |

Anti-Mer2 (RABBIT) Antibody - Additional Information**Gene ID** 853478**Other Names**
853478**Purity**

This affinity-purified antibody is directed against the Saccharomyces cerevisiae Mer2 protein. The product was affinity purified from monospecific antiserum by immunoaffinity purification. Reactivity occurs against Saccharomyces cerevisiae Mer2 protein and reactivity is independent of phosphorylation at residue S30. A BLAST analysis was used to suggest minimal cross reactivity with Mer2 homologues from other sources.

Storage Condition

Store vial at -20° C prior to opening. Aliquot contents and freeze at -20° C or below for extended

storage. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. This product is stable for several weeks at 4° C as an undiluted liquid. Dilute only prior to immediate use.

Precautions Note

This product is for research use only and is not intended for therapeutic or diagnostic applications.

Anti-Mer2 (RABBIT) Antibody - Protein Information

Name REC107

Synonyms MER2

Function

Essential for meiotic chromosome segregation. MER1 and MER2 proteins must interact directly or indirectly. MER1 might be responsible for regulating the MER2 gene and/or gene product. MER2 is not required for mitosis and mitotic DNA repair mechanisms. Component of the MER2-MEI4-REC114 complex which seems to be required for meiotic double-strand break (DSB) formation.

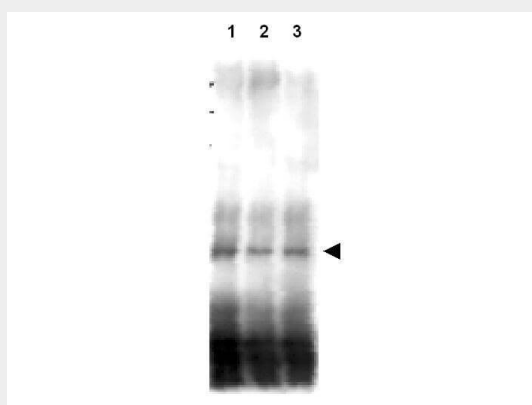
Cellular Location

Nucleus. Chromosome. Note=Localizes to chromosomes

Anti-Mer2 (RABBIT) 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](#)

Anti-Mer2 (RABBIT) Antibody - Images

Western blot using Rockland's affinity purified anti-S.cerevisiae Mer2 antibody shows detection of

phosphorylated and unphosphorylated Mer2 in wild type, phosphatase treated and mutant cells. Lane 1 contains Mer2-myc protein detected in wild type cells after first immunoprecipitating the protein using anti-myc antibody. Cells were harvested 4 h after the initiation of meiosis and therefore contain mostly phosphorylated Mer2. Lane 2 contains the same preparation after treatment with phosphatase. Lane 3 contains Mer2-S30A protein as a phosphorylation control. This antibody is reactive with both phosphorylated and unphosphorylated Mer2 at the S30 position. The primary antibody was used at a 1:5,000 dilution. Personal Communication. Michael Lichten, NIH, CCR, Bethesda, MD.

Anti-Mer2 (RABBIT) Antibody - Background

This antibody is designed, produced, and validated as part of a collaboration between Rockland and the National Cancer Institute (NCI) and is suitable for Cancer, Immunology and Nuclear Signaling research. Mer2 (also known as meiotic recombination 2 protein) is a chromosomal protein that is critical for meiotic recombination and progression. It is phosphorylated at two serine residues, S30 and S271 by the yeast Cdk1 cyclin- dependent kinase homolog. This phosphorylation is S-phase specific, and thus has the potential to be a specific assay for S-phase cyclin-dependent kinases. Moreover, there are hints that the phosphorylation may be a mark of replication fork passage, which would indicate that S-phase CDK associates with the replication fork.