

Product Information

Anti-RCC1 (N-terminal)

produced in rabbit, affinity isolated antibody

Catalog Number: **SAB4200277**

Product Description

Anti-RCC1 (N-terminal) is produced in rabbit using as immunogen a synthetic peptide corresponding to a sequence at the N-terminal region of human RCC1 (Gene ID: 1104), conjugated to KLH. The corresponding sequence differs by one amino acid in rat or mouse. The antibody is affinity-purified using the immunizing peptide immobilized on agarose.

Anti-RCC1 (N-terminal) recognizes human RCC1. The antibody may be used in several immunochemical techniques including immunoblotting (~45 kDa), immunofluorescence and immunoprecipitation. Detection of the RCC1 band by immunoblotting is specifically inhibited by the immunizing peptide.

RCC1, a nuclear chromatin-bound protein, is a guanine nucleotide exchange factor (GEF) for the nuclear Ran protein and is associated dynamically with chromatin through binding to histones H2A and/or H2B in a Ran-regulated manner. RCC1 has been shown to play essential roles in nuclear transport, spindle organization, and nuclear envelop formation.¹ Structurally, it consists of seven homologous repeats of 51–68 amino acid residues termed RLD domain, which adopt a seven-bladed β -propeller fold² and an amino-terminal tail extension which was shown to undergo α -methylation modification that further regulates RCC1's association with the chromatin.³

Reagent

Supplied as a solution in 0.01 M phosphate buffered saline, pH 7.4, containing 15 mM sodium azide as a preservative.

Antibody concentration: ~1.0 mg/mL

Precautions and Disclaimer

This product is for R&D use only, not for drug, household or other uses. Please consult the Material Safety Data Sheet for information regarding hazards and safe handling practices.

Storage/Stability

For continuous use, store at 2-8 °C for up to one month. For extended storage, freeze in working aliquots. Repeated freezing and thawing, or storage in "frost-free" freezers, is not recommended. If slight turbidity occurs upon prolonged storage, clarify the solution by centrifugation before use. Working dilutions should be discarded if not used within 12 hours.

Product Profile

Immunoblotting: a working antibody concentration of 0.5- 1.0 μ g/mL is recommended using lysates of HeLa cells.

Immunoprecipitation: a working amount of 2.5- 5.0 μ g is recommended using lysates of human HEK-293 cells.

immunofluorescence: a working antibody concentration of 1.0- 2.0 μ g/mL is recommended using paraformaldehyde fixed HeLa cells.

Note: In order to obtain the best results using various techniques and preparations, we recommend determining the optimal working dilutions by titration.

References

1. Hadjebi, O., et al., *Biochim. Biophys. Acta*, **1783**, 1467-1479 (2008).
2. Renault, L., et al., *Nature*, **392**, 97-101 (1998).
3. Chen, T. et al., *Nature Cell Biol.*, **9**, 596-603 (2007).

RC,KAA,PHC 05/11-1