

anti-Rad51 (human) antibody, Sepharose 4BTM * conjugated IgY

70-007 100 ul,

Human Rad51 protein is a functional and structural homolog of *E. coli* RecA protein, which plays a major role in genetic recombination and recombination repair by mediating strand exchange reaction between homologous DNA strands (1). Rad51 functionally and physically interacts with its paralogs Dmc1, Rad51B, Rad51C, Rad51D, Xrcc2 and Xrcc3, and also with Rad52 in recombination processes. It also interacts with oncogenes and tumor suppressors such as BRACA1, BRACA2, and P53 for the maintenance of genome stability (1).

The antibody was raised by immunizing chicken with full-size recombinant Rap51 protein. The IgY fraction was purified by proprietary chromatography processes from the egg yolk. The IgY was conjugated with cyanogen bromide-activated Sepharose 4BTM *. Chicken IgY antibodies have less backgrounds than mammalian IgGantibodies in immuno-reactions.

Applications

- 1. Immunoprecipitation (native and denatured forms)
- 2. Identification of proteins physically interacting with Rad51 protein by immuno-coprecipaitation

Reactivity: React with animal Rad51 proteins including human, mouse, rat

and chicken. Not tested in other species.

Conjugate: IgY conjugated with Sepharose 4BTM *.(100 ul suspension contains 280 ug of IgY).

Form: Suspension in PBS(-)added with 0.09 % sodium azide

Storage: $4 \, ^{\circ}\text{C}$

Data Link UniProtKB/Swiss-Prot Q06609 (RAD51_HUMAN)

References

- 1. Friedberg EC *et al. DNA Repair and Mutagenesis* 2nd ed., ASM Press (2006)
- Tashiro S *et al* "Rad51 accumulation at sites of DNA damage and in postreplicative chromatin" *J Cell Biol* 150: 283-291 (2000) PMID: 10908572



Fig.1 Western blot analysis of Rad51 in HeLa cell extract with chicken anti-Rad51 IgY

Related products:

10-001 Rad51 protein (human)
10-003 Rad52 protein (human)
70-001 anti-Rad51 (human) antibody, rabbit antiserum
70-009 anti-Rad51 (human), antigen affinity-purified IgY
70-015 anti-Rad52 (human) antibody

(*:Sepharose 4BTM is a trade mark of GE Healthcare Life Sciences)

BioAcademia, Inc. Tel. 81-6-6877-2335 Fax. 81-6-6877-2336 info@bioacademia.co.jp http://www.bioacademia.co.jp/en/