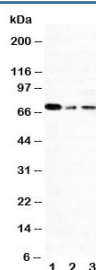


## XRCC1 Antibody (R30722)

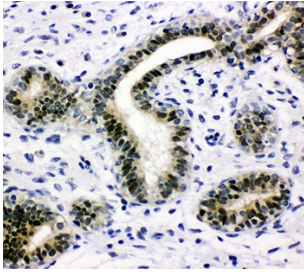
Catalog No.	Formulation	Size
R30722	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

**Bulk quote request**

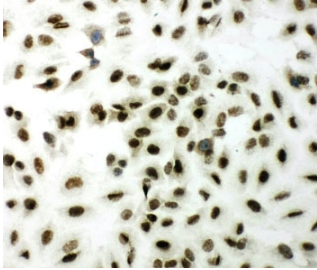
<b>Availability</b>	1-3 business days
<b>Species Reactivity</b>	Human, Mouse, Rat
<b>Format</b>	Antigen affinity purified
<b>Host</b>	Rabbit
<b>Clonality</b>	Polyclonal (rabbit origin)
<b>Isotype</b>	Rabbit IgG
<b>Purity</b>	Antigen affinity
<b>Buffer</b>	Lyophilized from 1X PBS with 2.5% BSA and 0.025% sodium azide/thimerosal
<b>UniProt</b>	P18887
<b>Localization</b>	Nuclear
<b>Applications</b>	Western Blot : 0.5-1ug/ml IHC (FFPE) : 0.5-1ug/ml Immunocytochemistry : 0.5-1ug/ml
<b>Limitations</b>	This XRCC1 antibody is available for research use only.



Western blot testing of XRCC1 antibody and Lane 1: 293T; 2: A431; 3: HeLa cell lysate.  
Routinely observed molecular weight: 69~90 kDa.



IHC-P: XRCC1 antibody testing of human breast cancer tissue



ICC testing of XRCC1 antibody and A549 cells

## Description

X-ray repair, complementing defective, in chinese hamster 1 is a DNA repair protein which complexes with DNA ligase III. The protein encoded by this gene is involved in the efficient repair of DNA single-strand breaks formed by exposure to ionizing radiation and alkylating agents. The XRCC1 gene is mapped to 19q13.31. The protein interacts with DNA ligase III, polymerase beta and poly(ADP-ribose) polymerase to participate in the base excision repair pathway. It may play a role in DNA processing during meiosis and recombination in germ cells. A rare microsatellite polymorphism in this gene is associated with cancer in patients of varying radiosensitivity. XRCC1 is phosphorylated in vivo and in vitro by CK2, and CK2 phosphorylation of ser518, thr519, and thr523 largely determines aprataxin binding to XRCC1 through its FHA domain.

## Application Notes

The stated application concentrations are suggested starting amounts. Titration of the XRCC1 antibody may be required due to differences in protocols and secondary/substrate sensitivity.

## Immunogen

An amino acid sequence from the N-terminus of human XRCC1 (QDSTHCAENLLKADTYRKWR) was used as the immunogen for this XRCC1 antibody (100% mouse homology).

## Storage

After reconstitution, the XRCC1 antibody can be stored for up to one month at 4°C. For long-term, aliquot and store at -20°C. Avoid repeated freezing and thawing.