

ERCC6 / CSB Antibody (aa346-766)
Rabbit Polyclonal Antibody
Catalog # ALS16885**Specification**

ERCC6 / CSB Antibody (aa346-766) - Product Information

Application	IHC
Primary Accession	Q03468
Other Accession	2074
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Calculated MW	168416

ERCC6 / CSB Antibody (aa346-766) - Additional Information**Gene ID** 2074**Other Names**

ERCC6, ARMD5, Cockayne syndrome B protein, Cockayne syndrome protein CSB, COFS, CSB, Rad26 homolog, ATP-dependent helicase ERCC6, CKN2, COFS1, RAD26, UVSS1

Target/Specificity

Human CSB / ERCC6

Reconstitution & Storage

0.1 M Tris-glycine, pH 7.0, 10% glycerol, 0.01% Thimerosal. Keep as concentrated solution. Aliquot and store at -20°C or below. Avoid multiple freeze-thaw cycles.

Precautions

ERCC6 / CSB Antibody (aa346-766) is for research use only and not for use in diagnostic or therapeutic procedures.

ERCC6 / CSB Antibody (aa346-766) - Protein Information**Name** ERCC6 ([HGNC:3438](#))**Synonyms** CSB**Function**

Essential factor involved in transcription-coupled nucleotide excision repair which allows RNA polymerase II-blocking lesions to be rapidly removed from the transcribed strand of active genes (PubMed:20541997, PubMed:26620705, PubMed:16246722). Upon DNA-binding, it locally modifies DNA conformation by wrapping the DNA around itself, thereby modifying the interface between stalled RNA polymerase II and DNA (PubMed:16246722).

[15548521](http://www.uniprot.org/citations/15548521)). It is required for transcription-coupled repair complex formation (PubMed: [16916636](http://www.uniprot.org/citations/16916636)). It recruits the CSA complex (DCX(ERCC8) complex), nucleotide excision repair proteins and EP300 to the sites of RNA polymerase II-blocking lesions (PubMed: [16916636](http://www.uniprot.org/citations/16916636)). Plays an important role in regulating the choice of the DNA double-strand breaks (DSBs) repair pathway and G2/M checkpoint activation; DNA-dependent ATPase activity is essential for this function (PubMed: [25820262](http://www.uniprot.org/citations/25820262)). Regulates the DNA repair pathway choice by inhibiting non-homologous end joining (NHEJ), thereby promoting the homologous recombination (HR)-mediated repair of DSBs during the S/G2 phases of the cell cycle (PubMed: [25820262](http://www.uniprot.org/citations/25820262)). Mediates the activation of the ATM- and CHEK2-dependent DNA damage responses thus preventing premature entry of cells into mitosis following the induction of DNA DSBs (PubMed: [25820262](http://www.uniprot.org/citations/25820262)). Acts as a chromatin remodeler at DSBs; DNA-dependent ATPase-dependent activity is essential for this function. Remodels chromatin by evicting histones from chromatin flanking DSBs, limiting RIF1 accumulation at DSBs thereby promoting BRCA1-mediated HR (PubMed: [29203878](http://www.uniprot.org/citations/29203878)). Required for stable recruitment of ELOA and CUL5 to DNA damage sites (PubMed: [28292928](http://www.uniprot.org/citations/28292928)). Involved in UV-induced translocation of ERCC8 to the nuclear matrix (PubMed: [26620705](http://www.uniprot.org/citations/26620705)). Essential for neuronal differentiation and neuritogenesis; regulates transcription and chromatin remodeling activities required during neurogenesis (PubMed: [24874740](http://www.uniprot.org/citations/24874740)).

Cellular Location

Nucleus.

Volume

50 µl

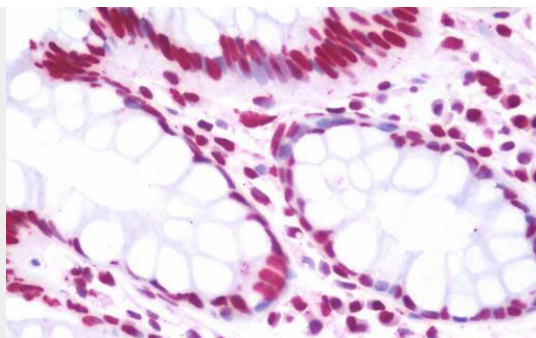
ERCC6 / CSB Antibody (aa346-766) - Protocols

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](#)

ERCC6 / CSB Antibody (aa346-766) - Images





Anti-CSB / ERCC6 antibody IHC staining of human colon.

ERCC6 / CSB Antibody (aa346-766) - Background

Essential factor involved in transcription-coupled nucleotide excision repair which allows RNA polymerase II-blocking lesions to be rapidly removed from the transcribed strand of active genes. Upon DNA-binding, it locally modifies DNA conformation by wrapping the DNA around itself, thereby modifying the interface between stalled RNA polymerase II and DNA. It is required for transcription-coupled repair complex formation. It recruits the CSA complex (DCX(ERCC8) complex), nucleotide excision repair proteins and EP300 to the at sites of RNA polymerase II- blocking lesions.

ERCC6 / CSB Antibody (aa346-766) - References

Troelstra C.,et al.Cell 71:939-953(1992).
Troelstra C.,et al.Nucleic Acids Res. 21:419-426(1993).
Deloukas P.,et al.Nature 429:375-381(2004).
Mural R.J.,et al.Submitted (SEP-2005) to the EMBL/GenBank/DDBJ databases.
Cleaver J.E.,et al.Hum. Mutat. 14:9-22(1999).