

ERCC3 Antibody (N-term) Blocking Peptide

Synthetic peptide Catalog # BP17749a

Specification

ERCC3 Antibody (N-term) Blocking Peptide - Product Information

Primary Accession

P19447

ERCC3 Antibody (N-term) Blocking Peptide - Additional Information

Gene ID 2071

Other Names

TFIIH basal transcription factor complex helicase XPB subunit, Basic transcription factor 2 89 kDa subunit, BTF2 p89, DNA excision repair protein ERCC-3, DNA repair protein complementing XP-B cells, TFIIH basal transcription factor complex 89 kDa subunit, TFIIH 89 kDa subunit, TFIIH p89, Xeroderma pigmentosum group B-complementing protein, ERCC3, XPB, XPBC

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

ERCC3 Antibody (N-term) Blocking Peptide - Protein Information

Name ERCC3

Synonyms XPB, XPBC

Function

ATP-dependent 3'-5' DNA helicase, component of the general transcription and DNA repair factor IIH (TFIIH) core complex, which is involved in general and transcription-coupled nucleotide excision repair (NER) of damaged DNA and, when complexed to CAK, in RNA transcription by RNA polymerase II. In NER, TFIIH acts by opening DNA around the lesion to allow the excision of the damaged oligonucleotide and its replacement by a new DNA fragment. The ATPase activity of XPB/ERCC3, but not its helicase activity, is required for DNA opening. In transcription, TFIIH has an essential role in transcription initiation (PubMed:8157004, PubMed:30894545). When the pre-initiation complex (PIC) has been established, TFIIH is required for promoter opening and promoter escape (PubMed:<a href="http://www.uniprot.org/citations/8157004" target="http://www.uniprot.org/citations/8157004" target="http://www.uniprot.org/citations/8157004" target="http://www.uniprot.org/citations/8157004"

target="_blank">8157004). The ATP-dependent helicase activity of XPB/ERCC3 is required for promoter opening and promoter escape. Phosphorylation of the C-terminal tail (CTD) of the



largest subunit of RNA polymerase II by the kinase module CAK controls the initiation of transcription.

Cellular Location Nucleus.

ERCC3 Antibody (N-term) Blocking Peptide - Protocols

Provided below are standard protocols that you may find useful for product applications.

Blocking Peptides

ERCC3 Antibody (N-term) Blocking Peptide - Images

ERCC3 Antibody (N-term) Blocking Peptide - Background

ERCC3 is an ATP-dependent DNA helicase that functions innucleotide excision repair and complements xeroderma pigmentosumgroup B mutations. It also is the 89 kDa subunit of basaltranscription factor 2 (TFIIH) and thus functions in class Iltranscription.

ERCC3 Antibody (N-term) Blocking Peptide - References

Briggs, F.B., et al. Am. J. Epidemiol. 172(2):217-224(2010)Liu, C.Y., et al. Carcinogenesis 31(7):1259-1263(2010)Monsees, G.M., et al. Breast Cancer Res. Treat. (2010) In press :Arab, H.H., et al. PLoS ONE 5 (6), E11007 (2010) :Weber, A., et al. Cell. Oncol. 32 (1-2), 121-130 (2010) :