

BCCIP Antibody (Center)) Blocking Peptide
Synthetic peptide
Catalog # BP1923a**Specification**

BCCIP Antibody (Center)) Blocking Peptide - Product Information

Primary Accession [O9P287](#)
Other Accession [Q8ND15](#)

BCCIP Antibody (Center)) Blocking Peptide - Additional Information

Gene ID 56647

Other Names

BRCA2 and CDKN1A-interacting protein, P21- and CDK-associated protein 1, Protein TOK-1, BCCIP, TOK1

Target/Specificity

The synthetic peptide sequence used to generate the antibody [AP1923a](/product/products/AP1923a) was selected from the Center) region of human BCCIP. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

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.

BCCIP Antibody (Center)) Blocking Peptide - Protein Information

Name BCCIP

Synonyms TOK1

Function

During interphase, required for microtubule organizing and anchoring activities. During mitosis, required for the organization and stabilization of the spindle pole (PubMed: [28394342](http://www.uniprot.org/citations/28394342)). Isoform 2/alpha is particularly important for the regulation of microtubule anchoring, microtubule stability, spindle architecture and spindle orientation, compared to isoform 1/beta (PubMed: [28394342](http://www.uniprot.org/citations/28394342)). May promote cell cycle arrest by enhancing the inhibition of CDK2 activity by CDKN1A. May be required for repair of DNA damage by homologous recombination in conjunction with BRCA2. May not be

involved in non-homologous end joining (NHEJ).

Cellular Location

Nucleus. Cytoplasm, cytoskeleton, microtubule organizing center, centrosome, centriole. Cytoplasm, cytoskeleton, spindle pole. Note=Colocalizes with BRCA2 in discrete nuclear foci (PubMed:15713648). In interphase, preferential localizes to the mother centriole (PubMed:28394342). Recruited to the spindle pole matrix and centrosome by microtubules and dynein/dynactin activity (PubMed:28394342). [Isoform 2]: Cytoplasm, cytoskeleton, microtubule organizing center, centrosome. Cytoplasm, cytoskeleton, spindle pole. Note=Isoform 2/alpha tends to be more abundant at, and more strongly associated with, centrosomes than isoform 1/beta.

Tissue Location

Expressed at high levels in testis and skeletal muscle and at lower levels in brain, heart, kidney, liver, lung, ovary, pancreas, placenta, and spleen.

BCCIP Antibody (Center)) Blocking Peptide - Protocols

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

- [Blocking Peptides](#)

BCCIP Antibody (Center)) Blocking Peptide - Images**BCCIP Antibody (Center)) Blocking Peptide - Background**

BCCIP was isolated on the basis of its interaction with BRCA2 and p21 proteins. It is an evolutionarily conserved nuclear protein with multiple interacting domains. The N-terminal half shares moderate homology with regions of calmodulin and M-calpain, suggesting that it may also bind calcium. Functional studies indicate that this protein may be an important cofactor for BRCA2 in tumor suppression, and a modulator of CDK2 kinase activity via p21.

BCCIP Antibody (Center)) Blocking Peptide - References

Lu, H., et al., Mol. Cell. Biol. 25(5):1949-1957 (2005). Meng, X., et al., Cell Cycle 3(3):343-348 (2004). Robson, M., et al., J. Med. Genet. 39(2):126-128 (2002). Armakolas, A., et al., Hum. Mutat. 19(1):81-82 (2002). Liu, J., et al., Oncogene 20(3):336-345 (2001).