

Aurora-C Antibody (C-term) Blocking Peptide

Synthetic peptide
Catalog # BP7000c

Specification

Aurora-C Antibody (C-term) Blocking Peptide - Product Information

Primary Accession [Q9UQB9](#)

Aurora-C Antibody (C-term) Blocking Peptide - Additional Information

Gene ID 6795

Other Names

Aurora kinase C, Aurora 3, Aurora/IPL1-related kinase 3, ARK-3, Aurora-related kinase 3, Aurora/IPL1/Eg2 protein 2, Serine/threonine-protein kinase 13, Serine/threonine-protein kinase aurora-C, AURKC, AIE2, AIK3, AIRK3, ARK3, STK13

Target/Specificity

The synthetic peptide sequence used to generate the antibody [AP7000c](#) was selected from the C-term region of human Aurora-C . 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.

Aurora-C Antibody (C-term) Blocking Peptide -

Aurora-C Antibody (C-term) Blocking Peptide - Background

Chromosomal segregation during mitosis as well as meiosis is regulated by kinases and phosphatases. The Aurora kinases, members of the Ser/Thr protein kinase family, associate with microtubules during chromosome movement and segregation. Aurora kinase C may play a part in organizing microtubules in relation to the function of the centrosome/spindle pole during mitosis. This protein is localized to centrosome from anaphase to cytokinesis. Expression is limited to testis in normal cells. Elevated expression levels are seen only in a subset of cancer cells such as HepG2, HuH7 and HeLa cells. Aurora-C expression is maximum at M phase.

Aurora-C Antibody (C-term) Blocking Peptide - References

Kimura, M., et al., J. Biol. Chem. 274(11):7334-7340 (1999). Tseng, T.C., et al., DNA Cell Biol. 17(10):823-833 (1998). Bernard, M., et al., Genomics 53(3):406-409 (1998).

Protein Information

Name AURKC

Synonyms AIE2, AIK3, AIRK3, ARK3, STK13

Function

Serine/threonine-protein kinase component of the chromosomal passenger complex (CPC), a complex that acts as a key regulator of mitosis. The CPC complex has essential functions at the centromere in ensuring correct chromosome alignment and segregation and is required for chromatin-induced microtubule stabilization and spindle assembly. Plays also a role in meiosis and more particularly in spermatogenesis. Has redundant cellular functions with AURKB and can rescue an AURKB knockdown. Like AURKB, AURKC phosphorylates histone H3 at 'Ser-10' and 'Ser-28'. AURKC phosphorylates the CPC complex subunits BIRC5/survivin and INCENP leading to increased AURKC activity. Phosphorylates TACC1, another protein involved in cell division, at 'Ser-228'.

Cellular Location

Nucleus. Chromosome. Chromosome, centromere. Cytoplasm, cytoskeleton, spindle. Note=Distributes in the condensed chromosomes during prophase to metaphase. After entering anaphase, there is a dissociation from separated chromosomes and a redistribution to midzone microtubules, and finally remains in the midbody during cytokinesis.

Tissue Location

Isoform 1 and isoform 2 are expressed in testis. Elevated expression levels were seen only in a subset of cancer cell lines such as Hep-G2, Huh-7 and HeLa. Expression is maximum at M phase

Aurora-C Antibody (C-term) Blocking Peptide - Protocols

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

- [Blocking Peptides](#)