

Bak Antibody (BH3 Domain Specific) Blocking peptide

Synthetic peptide Catalog # BP1301a

Specification

Bak Antibody (BH3 Domain Specific) Blocking peptide - Product Information

Primary Accession

016611

Bak Antibody (BH3 Domain Specific) Blocking peptide - Additional Information

Gene ID 578

Other Names

Bcl-2 homologous antagonist/killer, Apoptosis regulator BAK, Bcl-2-like protein 7, Bcl2-L-7, BAK1, BAK, BCL2L7, CDN1

Target/Specificity

The synthetic peptide sequence used to generate the antibody AP1301a was selected from the region of human Bak BH3 Domain. 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.

Bak Antibody (BH3 Domain Specific) Blocking peptide - Protein Information

Name BAK1

Synonyms BAK, BCL2L7, CDN1

Function

Plays a role in the mitochondrial apoptotic process. Upon arrival of cell death signals, promotes mitochondrial outer membrane (MOM) permeabilization by oligomerizing to form pores within the MOM. This releases apoptogenic factors into the cytosol, including cytochrome c, promoting the activation of caspase 9 which in turn processes and activates the effector caspases.

Cellular Location

Mitochondrion outer membrane; Single-pass membrane protein

Tissue Location



Expressed in a wide variety of tissues, with highest levels in the heart and skeletal muscle

Bak Antibody (BH3 Domain Specific) Blocking peptide - Protocols

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

• Blocking Peptides

Bak Antibody (BH3 Domain Specific) Blocking peptide - Images

Bak Antibody (BH3 Domain Specific) Blocking peptide - Background

BAK belongs to the BCL2 protein family. BCL2 family members form oligomers or heterodimers and act as anti- or pro-apoptotic regulators that are involved in a wide variety of cellular activities. BAK localizes to mitochondria, and functions to induce apoptosis. It interacts with and accelerates the opening of the mitochondrial voltage-dependent anion channel, which leads to a loss in membrane potential and the release of cytochrome c. This protein also interacts with the tumor suppressor P53 after exposure to cell stress.

Bak Antibody (BH3 Domain Specific) Blocking peptide - References

Cartron, P.F., et al., Mol. Cell. Biol. 23(13):4701-4712 (2003).Mikhailov, V., et al., J. Biol. Chem. 278(7):5367-5376 (2003).Werner, A.B., et al., J. Biol. Chem. 277(25):22781-22788 (2002).Bellosillo, B., et al., Blood 100(5):1810-1816 (2002).Grutkoski, P.S., et al., Shock 17(1):47-54 (2002).