

PTEN Monoclonal Antibody

Description

Product type	Primary Antibody
Code	BT-MCA1072
Host	Mouse
Isotype	IgG
Size	50ul, 100ul
Immunogen	Purified recombinant fragment of PTEN expressed in E. Coli.
Mol wt	N/A
Species reactivity	Human, Mouse
Clonality	Monoclonal
Recommended application	WB, IF, ICC, FCM, ELISA
Concentration	1 mg/ml
Full name	Phosphatidylinositol 3,4,5-trisphosphate 3-phosphatase and dual-specificity protein phosphatase PTEN
Synonyms	PTEN; MMAC1; TEP1; Phosphatidylinositol 3; 4; 5-trisphosphate 3-phosphatase and dual-specificity protein phosphatase PTEN; Mutated in multiple advanced cancers 1; Phosphatase and tensin homolog

This product is for research use only, not for use in human, therapeutic or diagnostic procedure.

Background

This gene was identified as a tumor suppressor that is mutated in a large number of cancers at high frequency. The protein encoded by this gene is a phosphatidylinositol-3,4,5-trisphosphate 3-phosphatase. It contains a tensin like domain as well as a catalytic domain similar to that of the dual specificity protein tyrosine phosphatases. Unlike most of the protein tyrosine phosphatases, this protein preferentially dephosphorylates phosphoinositide substrates. It negatively regulates intracellular levels of phosphatidylinositol-3,4,5-trisphosphate in cells and functions as a tumor suppressor by negatively regulating AKT/PKB signaling pathway. The use of a non-canonical (CUG) upstream initiation site produces a longer isoform that initiates translation with a leucine, and is thought to be preferentially associated with the mitochondrial inner membrane. This longer isoform may help regulate ener

Recommended Dilution

ELISA: 1:10000

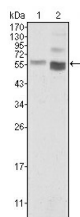
FC: 1:200 - 1:400

IF: 1:200 - 1:1000

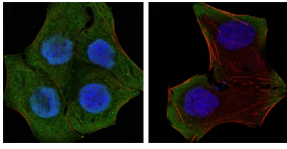
WB: 1:500 - 1:2000

Not yet tested in other applications.

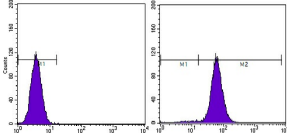
Images



Western Blot analysis using PTEN Monoclonal antibody against HeLa (1) and NIH/3T3 (2) cell lysate.



Confocal immunofluorescence analysis of HeLa (left) and HepG2 (right) cells using PTEN Monoclonal antibody (green). Red: Actin filaments have been labeled with DY-554 phalloidin. Blue: DRAQ5 fluorescent DNA dye.



Flow cytometric analysis of HeLa cells using PTEN Monoclonal antibody (right) and negative control (left).

Storage

-20°C for one year

501 Changsheng S Rd, Nanhu Dist, Jiaxing, Zhejiang, China

Tel: 86 21 31007137 | E-mail: save@bt-laboratory.com | www.bt-laboratory.com