

Product datasheet for **AM06375PU-N**

PTEN Mouse Monoclonal Antibody [Clone ID: 1B8]

Product data:

Product Type:	Primary Antibodies
Clone Name:	1B8
Applications:	ELISA, IF, WB
Recommended Dilution:	Western Blot: 1/500 - 1/2000. Immunofluorescence: 1/200 - 1/1000. Flow cytometry: 1/200 - 1/400. ELISA: 1/10000.
Reactivity:	Human, Mouse
Host:	Mouse
Isotype:	IgG1
Clonality:	Monoclonal
Immunogen:	Purified recombinant fragment of PTEN expressed in E. Coli.
Specificity:	This antibody reacts to PTEN.
Formulation:	PBS State: Aff - Purified State: Liquid purified Ig fraction Stabilizer: 50% glycerol Preservative: 0,03% sodium azide
Purification:	Affinity chromatography on Protein G
Conjugation:	Unconjugated
Storage:	Store the antibody undiluted at 2-8°C for one month or (in aliquots) at -20°C for longer. Avoid repeated freezing and thawing.
Stability:	Shelf life: one year from despatch.
Predicted Protein Size:	54 kDa
Gene Name:	phosphatase and tensin homolog
Database Link:	Entrez Gene 5728 Human P60484



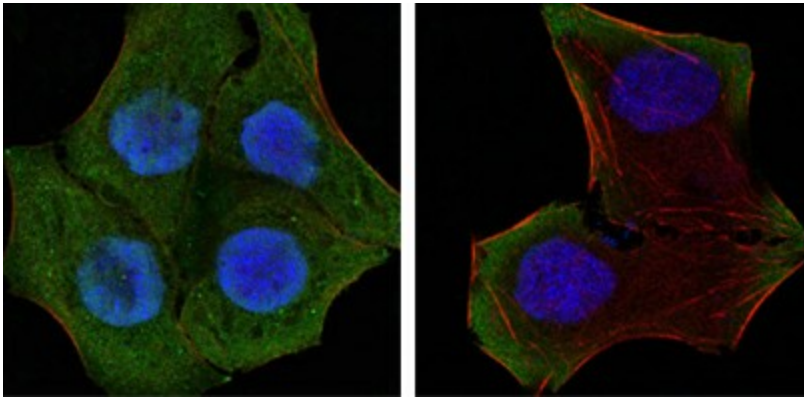
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Background:

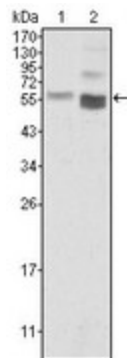
PTEN (phosphatase and tensin homolog) was identified as a tumor suppressor that is mutated in a large number of cancers at high frequency. This protein is a phosphatidylinositol-3,4,5-trisphosphate 3-phosphatase. It contains a tensin like domain as well as a catalytic domain similar to that of the dual 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.

Synonyms:

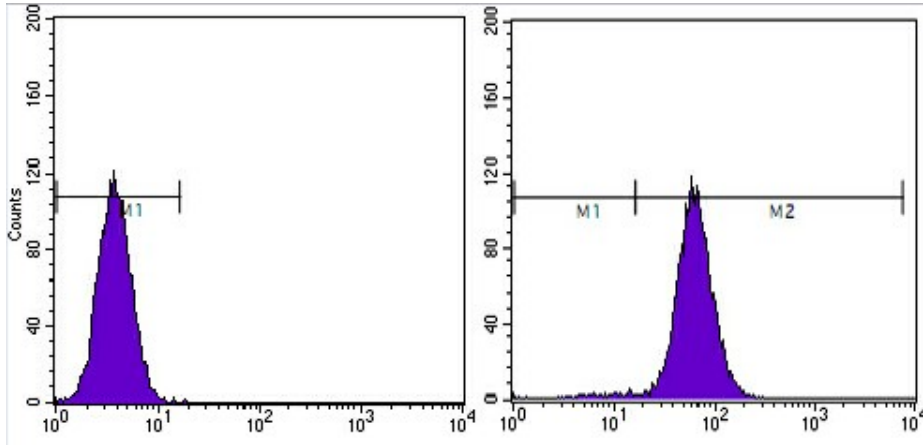
MMAC1, TEP1

Product images:


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



Western blot analysis using PTEN mouse mAb against HeLa (1) and NIH/3T3 (2) cell lysate.



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