

Recombinant Human PTEN protein, His-tagged

Cat. No. PTEN-523H **Lot. No.** (See product label)

SPECIFICATION

Product Overview	Recombinant Human PTEN fused with His tag at C-terminal was expressed in Insect cells.
Species	Human
Source	Insect Cells
ProteinLength	403 amino acid
Description	Phosphatase and tensin homology on chromosome 10 (PTEN) functions as a key regulatory enzyme in many signal transduction pathways by dephosphorylating proteins and lipids such as AKT and phosphatidylinositol 3,4,5-trisphosphate (PIP3). PTEN interacts with many other proteins to regulate cell division and migration, as well as promoting apoptosis when necessary. Mutation of PTEN results in many human cancers including melanoma and prostate carcinoma, making PTEN an important tumor suppressor.
Form	50 mM Tris-HCl, pH 8.0, containing 100 mM sodium chloride, 5 mM DDT, and 20% glycerol
Molecular Mass	50.8 kDa
Purity	> 95% estimated by SDS-PAGE
Stability	6 months

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

Storage Storage at -80 centigrade

GENE INFORMATION

Gene Name PTEN phosphatase and tensin homolog [Homo sapiens]

Official Symbol PTEN

Synonyms

PTEN; phosphatase and tensin homolog; BZS, MHAM; phosphatidylinositol-3,4,5-trisphosphate 3-phosphatase and dual-specificity protein phosphatase PTEN; MMAC1; mutated in multiple advanced cancers 1; PTEN1; TEP1; phosphatase and tensin-like protein; MMAC1 phosphatase and tensin homolog deleted on chromosome 10; BZS; DEC; GLM2; MHAM; 10q23del; MGC11227;

Gene ID 5728

mRNA Refseq NM_000314

Protein Refseq NP_000305

MIM 601728

UniProt ID P60484

Chromosome Location 10q23

Pathway

3-phosphoinositide degradation, organism-specific biosystem; 3-phosphoinositide degradation, conserved biosystem; Adaptive Immune System, organism-specific biosystem; Androgen Receptor Signaling Pathway, organism-specific biosystem; BCR signaling pathway, organism-specific biosystem; Class I PI3K signaling events,

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

organism-specific biosystem; D-myo-inositol (1,3,4)-trisphosphate biosynthesis, organism-specific biosystem;

Function

PDZ domain binding; anaphase-promoting complex binding; enzyme binding; hydrolase activity; inositol-1,3,4,5-tetrakisphosphate 3-phosphatase activity; lipid binding; magnesium ion binding; phosphatidylinositol-3,4,5-trisphosphate 3-phosphatase activity; phosphatidylinositol-3,4,5-trisphosphate 3-phosphatase activity; phosphatidylinositol-3,4-bisphosphate 3-phosphatase activity; phosphatidylinositol-3-phosphatase activity; phosphoprotein phosphatase activity; protein binding; protein serine/threonine phosphatase activity; protein tyrosine phosphatase activity; protein tyrosine/serine/threonine phosphatase activity;

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA