

## 32-3072: PDK1 Recombinant Protein

**Alternative Name :** Pyruvate dehydrogenase kinase isoform 1, PDK1, Pyruvate dehydrogenase (lipoamide) kinase isozyme 1 mitochondrial.

### Description

Source : Escherichia Coli. PDK1 Human Recombinant produced in E.Coli is a single, non-glycosylated, polypeptide chain containing 429 amino acids (29-436) and having a molecular mass of 48.6 kDa. PDK1 is fused to 20 a.a. His-Tag at N-terminus and purified by proprietary chromatographic techniques. PDK1 takes part in the regulation of enzymatic activity of mammalian pyruvate dehydrogenase which is part of a mitochondrial multienzyme complex to catalyze the oxidative decarboxylation of pyruvate and is one of the major enzymes responsible for the regulation of homeostasis of carbohydrate fuels in mammals. PDK1 inhibits glioblastoma growth. PDK1 inhibits the mitochondrial pyruvate dehydrogenase complex by phosphorylation of the e1 alpha subunit, therefore contributing to the regulation of glucose metabolism. PDK1 kinase activity is negatively regulated by binding to 14-3-3.

### Product Info

**Amount :** 50 µg  
**Purification :** Greater than 95.0% as determined by SDS-PAGE.  
**Content :** PDK1 solution containing 20mM Tris pH-7, 0.5mM DTT, 0.1M NaCl, 0.1mM EDTA 0.1mM PMSF, 1mM MgCl<sub>2</sub> and 40% glycerol.  
**Storage condition :** PDK1 Human Recombinant although stable at 4°C for 1 week, should be stored below -18°C. Please prevent freeze thaw cycles.  
**Amino Acid :** MGSSHHHHHH SSSLVPRGSH MSSDSGSSPA SERGVPGQVD FYARFSPSPL SMKQFLDFGS  
VNACEKTSFM FLRQELPVRL ANIMKEISLLPDNLLRTPSV QLVQSWYIQS LQELDFKDK SAEDAKAIYD  
FTDTVIRIRN RHNDVIPTMA QGVIEYKESF GVDPVTSQNV QYFLDRFYMS RISIRMLLNQ HSLFLGGKGGK  
GSPSHRKHIG SINPNCNVLE VIKDGYENAR RLCDLYYINS PELELEELNA KSPGQPIQVV  
YVPSHLYHMFELFKNAMRA TMEHHANRGV YPPIQVHVTG GNEDLTVKMS DRGGGVPLRK IDRLFNYMYS  
TAPRPRVETS RAVPLAGFGY GLPISRLYAQ YFQGDCLKLYS LEGYGTDAVI YIKALSTDSI ERLPVYNKAA  
WKHYNTNHEA DDWCVPSREP KDMTTFRSA.

