

# **Screening Libraries**

**Proteins** 

# **Product** Data Sheet

# PIP4K2C Protein, Human

Cat. No.: HY-P701750

Synonyms: PIP4K2C; Phosphatidylinositol 5-phosphate 4-kinase type-2 gamma; Phosphatidylinositol 5-

phosphate 4-kinase type II gamma; PI(5)P 4-kinase type II gamma; PIP4KII-gamma

Species: Human Source: E. coli

Accession: Q8TBX8 (A2-A421)

79837 Gene ID:

Molecular Weight:

# **PROPERTIES**

Appearance	Solution.
Formulation	Supplied as a 0.22 μm filtered solution of 50 mM Tris-HCl, pH7.5, 200 mM NaCl, 20% glycerol.
Endotoxin Level	<1 EU/µg, determined by LAL method.
Reconsititution	Please use rapid thawing with running water to thaw the protein.
Storage & Stability	Stored at -80°C for 1 year. It is stable at -20°C for 3 months after opening. It is recommended to freeze aliquots at -80°C for extended storage. Avoid repeated freeze-thaw cycles.
Shipping	Shipping with dry ice.

# **DESCRIPTION**

# Background

PIP4K2C Protein, a phosphatidylinositol 5-phosphate 4-kinase, exhibits low enzymatic activity and is proposed to function as a GTP sensor, displaying higher GTP-dependent kinase activity compared to ATP-dependent kinase activity. Beyond its catalytic role, PIP4K2C, like other PIP4Ks, plays a significant role in negatively regulating insulin signaling through a catalytic-independent mechanism. This involves the interaction with PIP5Ks, leading to the suppression of PIP5K-mediated phosphatidylinositol 4,5-bisphosphate (PtdIns(4,5)P2) synthesis and inhibiting the insulin-dependent conversion to phosphatidylinositol 3,4,5-trisphosphate (PtdIns(3,4,5)P3). These regulatory actions underscore the intricate involvement of PIP4K2C in cellular processes related to insulin signaling and lipid metabolism.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: 609-228-6898 Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA

Page 1 of 1