Recombinant PP4C protein (His tag)

Catalog Number	532567
Synonyms	PP4C
Species	Drosophila melanogaster
Expression System	E. coli
Accession	O76932
Gene ID	45031
Molecular Weight	Predictes a molecular mass of 37.00 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 39 kDa band.

Product Information

Sequence Region	1-307
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>86%, by SDS-PAGE with Coomassie Brilliant Blue staining.
Endotoxin	Not tested.
Activity	Not tested.
Stability	Samples are stable for up to twelve months from date of receipt at -70℃
Protein Construction	DNA encoding 1-307 aa (O76932) were fused with 6His tag.

Storage & Handling

Reconstitution	Reconstitute at 0.25 μg/μl in sterile water for short-term storage. Reconstitution with 50% glycerol solution is recommended for longer term storage (see Stability and Storage for more details). If a different concentration is needed for your purposes please adjust the reconstitution volume as required (please note: the ion concentration of the final solution will vary according to the volume used). Note: Centrifuge vial before opening. When reconstituting, gently pipet and wash down the sides of the vial to ensure full recovery of the protein into solution.
Storage	Store it under sterile conditions at -20℃ to -80℃. It is recommended that the protein be aliquoted for optimal storage. Avoid repeated freeze-thaw cycles.
Shipping	In general, recombinant proteins are provided as lyophilized powder which are shipped at ambient temperature. Bulk packages of recombinant proteins are provided as frozen liquid. They are shipped out with blue ice unless customers require otherwise.

Description

Description	Recombinant Drosophila melanogaster Serine/threonine-protein phosphatase 4 catalytic subunit (PP4C) fragment (amino acids 1-307) is a high-quality protein preparation ideal for structural and biochemical studies. This fragment represents a stable, soluble unit of PP4C, maintaining functional integrity for research applications investigating phosphatase activity and microtubule regulation. Serine/threonine-protein phosphatase 4 catalytic subunit (PP4C), encoded by the Pp4-19C gene in Drosophila melanogaster, is a key regulatory enzyme involved in multiple cellular processes including microtubule organization at centrosomes. The protein forms part of the PP4 complex (Pp4-19C-PPP4R2r-flfl) that plays a critical role in preventing caspase-induced cell death in vitro. PP4C exhibits dynamic subcellular localization, predominantly residing in the cytoplasm during interphase with transient nuclear enrichment during early prophase, and localizing to the cytoplasm after nuclear envelope breakdown. The protein is also found at microtubule organizing centers and centrosomes, highlighting its importance in cytoskeletal organization and cell division processes.