Recombinant PPR17 protein (His tag)

Catalog Number	550064
Synonyms	G-substrate
Species	Human
Expression System	E. coli
Accession	O96001
Molecular Weight	Predictes a molecular mass of 11.01 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 12 kDa band.

Product Information

Sequence Region	1-81
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>87%, 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 1-81 aa (O96001) 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 Human Protein Phosphatase 1 Regulatory Subunit 17 (G-substrate) Fragment (residues 1-81) is a high-purity, soluble protein designed for structural and biochemical studies. This fragment, derived from the PPP1R17 gene, retains functional relevance as an inhibitor of protein phosphatase 1 (PP1) and protein phosphatase 2A (PP2A) complexes, offering researchers a stable tool for exploring phosphatase regulation mechanisms. Protein phosphatase 1 regulatory subunit 17 (G-substrate), encoded by the PPP1R17 gene in Homo sapiens, functions as a key regulator of cellular signaling by inhibiting the phosphatase activities of both PP1 and PP2A complexes. This inhibition plays a critical role in modulating phosphorylation-dependent pathways, which are essential for processes such as cell cycle control, signal transduction, and metabolic regulation. The recombinant fragment (residues 1-81) was selected based on computational predictions to ensure stability and solubility, enabling detailed investigations into the molecular basis of phosphatase inhibition without the complexities of the full-length protein.