Recombinant TTC7A protein (His tag)

Catalog Number	539217
Synonyms	TPR repeat protein 7A
Species	Human
Expression System	E. coli
Accession	Q9ULT0
Molecular Weight	Predictes a molecular mass of 18.85 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 19 kDa band.

Product Information

Sequence Region	705-858
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>89%, 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 705-858 aa (Q9ULT0) 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 Tetratricopeptide repeat protein 7A (TPR repeat protein 7A) fragment (amino acids 705-858) is a high-quality protein preparation ideal for structural and biochemical studies. This 154-amino acid fragment represents a stable, soluble unit of TTC7A, carefully selected through computational analysis to maintain structural integrity while providing optimal experimental utility for researchers investigating phosphatidylinositol signaling pathways. Tetratricopeptide repeat protein 7A (TTC7A) is a crucial component of a protein complex required for localizing phosphatidylinositol 4-kinase (PI4K) to the plasma membrane. This complex functions as a key regulator of phosphatidylinositol 4-phosphate (PtdIns(4)P) synthesis, playing a central role in bridging PI4KA to EFR3B and HYCC1 through direct protein interactions. TTC7A primarily localizes to the cytoplasm and is recruited to the cell membrane following interaction with EFR3 proteins (EFR3A or EFR3B), making it essential for proper membrane organization and phosphoinositide signaling dynamics in cellular processes.