Recombinant PROF1 protein (His tag)

Catalog Number	537447
Synonyms	Epididymis tissue protein Li 184a; Profilin I
Species	Human
Expression System	E. coli
Accession	P07737
Molecular Weight	Predictes a molecular mass of 16.58 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 17 kDa band.

Product Information

Sequence Region	2-140
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>90%, 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 2-140 aa (P07737) 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 Profilin-1 (PFN1) Fragment (2-140) is a high-purity, soluble protein derived from human Profilin-1, designed for structural and biochemical studies. This fragment retains key functional regions, enabling research into actin cytoskeleton regulation and androgen receptor inhibition. Profilin-1 (PFN1) is a cytoskeletal protein in Homo sapiens that binds actin and modulates cytoskeleton dynamics by promoting or inhibiting actin polymerization depending on concentration. It also interacts with phosphatidylinositol 4,5-bisphosphate (PIP2) to inhibit inositol trisphosphate (IP3) and diacylglycerol (DG) formation. Additionally, Profilin-1 suppresses aggregation of the androgen receptor (AR) and huntingtin (HTT), with G-actin binding being essential for AR inhibition. It is localized in the cytoplasm and cytoskeleton, playing critical roles in cell structure and signaling pathways.