Recombinant ARP8 protein (His tag)

Catalog Number	543642
Synonyms	hArp8; INO80 complex subunit N
Species	Human
Expression System	E. coli
Accession	Q9H981
Molecular Weight	Predictes a molecular mass of 47.52 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 48 kDa band.

Product Information

Sequence Region	34-436
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 34-436 aa (Q9H981) 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 Actin-related protein 8 (hArp8), corresponding to amino acids 34-436 of the human protein, is a high-purity fragment optimized for structural and biochemical studies. This product provides a stable and soluble unit ideal for investigating chromatin remodeling and mitotic chromosome organization. Actin-related protein 8 (hArp8), encoded by the ACTR8 gene, is a proposed core component of the chromatin remodeling INO80 complex involved in transcriptional regulation, DNA replication, and DNA repair. It plays a critical role in recruiting the INO80 complex to DNA damage sites and exhibits strong binding preference for nucleosomes and H3-H4 tetramers, suggesting it functions as a nucleosome recognition module. Additionally, hArp8 is essential for the functional organization of mitotic chromosomes, localizing specifically to chromosomes during mitosis, though it demonstrates low basal ATPase activity and lacks polymerization capability. Its nuclear and chromosomal localization underscores its importance in chromatin dynamics and genome maintenance.