Recombinant DNJB2 protein (His tag)

Catalog Number	542221
Synonyms	Heat shock 40 kDa protein 3; Heat shock protein J1; HSJ-1
Species	Human
Expression System	E. coli
Accession	P25686
Molecular Weight	Predictes a molecular mass of 13.94 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 15 kDa band.

Product Information

Sequence Region	2-109
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>85%, 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 2-109 aa (P25686) 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 DNAJB2 (DnaJ homolog subfamily B member 2) Fragment (aa 2-109) is a high-purity protein designed for studying the J domain's role in co-chaperone activity and protein quality control. This fragment is ideal for investigating HSP70 interactions and ubiquitin-mediated degradation pathways. DNAJB2, also known as Heat Shock Protein J1 (HSJ-1), functions as a co-chaperone that regulates substrate binding and activates the ATPase activity of HSP70 family chaperones. It plays a crucial role in ubiquitin-dependent proteasomal degradation of misfolded proteins, including HTT, MC4R, PRKN, RHO, and SOD1, thereby regulating protein aggregation and promoting functional recovery. Isoform 2 localizes to the cytoplasm and nucleus, while Isoform 1 is anchored to the endoplasmic reticulum membrane and participates in ER-associated degradation. This recombinant fragment (aa 2-109) contains the complete J domain (aa 2-71), enabling targeted studies of domain-specific functions in protein homeostasis and cellular stress response.