Recombinant PHB2 protein (His tag)

Catalog Number	531001
Synonyms	Prohibitin-2
Species	Caenorhabditis elegans
Expression System	E. coli
Accession	P50093
Gene ID	174034
Molecular Weight	Predictes a molecular mass of 30.22 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 30 kDa band.

Product Information

Sequence Region	43-294
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 43-294 aa (P50093) 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	This product is a high-quality recombinant protein fragment of Mitochondrial Prohibitin Complex Protein 2 (Prohibitin-2) from Caenorhabditis elegans, encompassing residues 43-294. It is designed to support studies of mitochondrial biogenesis, embryonic development, and germline differentiation by providing a stable, soluble unit ideal for structural and biochemical applications. Prohibitin-2, encoded by the phb-2 gene, plays a critical role in embryonic development and somatic and germline differentiation within the larval gonad. It is essential for mitochondrial biogenesis in body wall muscle cells and facilitates the clearance of paternal mitochondria post-fertilization. The protein localizes to the inner mitochondrial membrane as a single-pass type II membrane protein, oriented toward the intermembrane space, underscoring its importance in mitochondrial function and cellular integrity.