Recombinant DPY2 protein (His tag)

Catalog Number	533872
Synonyms	Protein dumpy-2
Species	Caenorhabditis elegans
Expression System	E. coli
Accession	P35799
Gene ID	174107
Molecular Weight	Predictes a molecular mass of 11.50 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 12 kDa band.

Product Information

Sequence Region	1-86
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 1-86 aa (P35799) 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 Cuticle Collagen DPY-2 Fragment (1-86) from Caenorhabditis elegans is a highly stable and soluble protein fragment designed for structural and biochemical studies. This 86-amino acid fragment represents a key region of the dumpy-2 protein, essential for understanding nematode cuticle composition and body morphology regulation. The full-length Cuticle Collagen DPY-2 (Protein Dumpy-2) is a critical component of the nematode cuticle in Caenorhabditis elegans. Nematode cuticles primarily consist of collagen-like proteins that serve dual functions as both an exoskeleton and a protective barrier against environmental factors. The dpy-2 protein plays a fundamental role in maintaining proper body shape, as mutations in this gene result in significant alterations to the worm's morphology. This recombinant fragment provides researchers with a valuable tool to investigate the structural and functional properties of this essential cuticular protein.