Recombinant PSDE protein (His tag)

Catalog Number	535211
Synonyms	26S proteasome regulatory subunit rpn11
Species	Caenorhabditis elegans
Expression System	E. coli
Accession	O76577
Gene ID	173744
Molecular Weight	Predictes a molecular mass of 36.25 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 36 kDa band.

Product Information

Sequence Region	1-312
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 1-312 aa (O76577) 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 26S proteasome non-ATPase regulatory subunit 14 (RPN-11) fragment from Caenorhabditis elegans, encompassing residues 1-312 and containing the full MPN domain. This high-purity protein is an essential tool for investigating deubiquitination mechanisms, specifically Lys-63-linked polyubiquitin chain cleavage, in proteasome-mediated protein degradation pathways. The 26S proteasome non-ATPase regulatory subunit 14, encoded by the rpn-11 gene, functions as a metalloprotease component within the 26S proteasome complex. It specifically cleaves 'Lys-63'-linked polyubiquitin chains and participates in the ATP-dependent degradation of ubiquitinated proteins, a critical process in cellular protein homeostasis. While the proteasome's role in ubiquitin-dependent proteolysis is well-established, the specific biological implications of Lys-63-linked deubiquitination by this subunit remain an area of active research, highlighting its importance in understanding nuanced regulatory mechanisms in protein turnover.