Recombinant SET26 protein (His tag)

Catalog Number	534218
Species	Caenorhabditis elegans
Expression System	E. coli
Accession	Q9U263
Gene ID	178463
Molecular Weight	Predictes a molecular mass of 37.01 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 44 kDa band.

Product Information

Sequence Region	904-1213
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>88%, 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 904-1213 aa (Q9U263) 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 Histone-lysine N-methyltransferase set-26 (EC 2.1.1.355) fragment (residues 904-1213) from Caenorhabditis elegans, encompassing the complete SET domain. This high-purity protein is an essential tool for investigating histone methylation mechanisms, transcriptional regulation, and epigenetic control in aging and germline development. Histone-lysine N-methyltransferase set-26 is a nucleus-localized enzyme that catalyzes trimethylation of histone H3 at lysine 9 (H3K9me3) in vitro. It plays a critical role in transcriptional regulation, lifespan modulation, and heat resistance, functioning alongside set-9 to negatively regulate longevity in a partially daf-16-dependent manner. The protein is also involved in germline development and maintenance, where it helps restrict H3K4me3 marks to target genes. Additionally, set-26 collaborates with spr-5 to maintain transgenerational fertility. The provided fragment (904-1213) contains the full SET domain (residues 973-1064), enabling focused studies on domain-specific methyltransferase activity and epigenetic functions.