Recombinant DCTD protein (His tag)

Catalog Number	534736
Synonyms	dCMP deaminase
Species	Caenorhabditis elegans
Expression System	E. coli
Accession	P30648
Gene ID	191373
Molecular Weight	Predictes a molecular mass of 19.27 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 20 kDa band.

Product Information

Sequence Region	46-197
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>89%, 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 46-197 aa (P30648) 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 Probable Deoxycytidylate Deaminase (dCMP Deaminase) Fragment (residues 46-197) from Caenorhabditis elegans. This 152-amino acid fragment fully encompasses the conserved CMP/dCMP-type deaminase domain, providing an ideal tool for studying nucleotide metabolism and enzyme function in biochemical assays. The full-length Probable Deoxycytidylate Deaminase (EC 3.5.4.12) plays a crucial role in nucleotide metabolism by supplying the nucleotide substrate for thymidylate synthetase. This enzymatic function is essential for DNA synthesis and repair processes. The recombinant fragment (46-197) maintains the core catalytic domain, enabling focused investigation of deaminase activity and its contribution to nucleotide substrate provision in research applications.