Recombinant HECD1 protein (His tag)

Catalog Number	539218
Synonyms	E3 ligase for inhibin receptor; EULIR; HECT domain-containing protein 1
Species	Human
Expression System	E. coli
Accession	Q9ULT8
Molecular Weight	Predictes a molecular mass of 33.92 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 37 kDa band.

Product Information

Sequence Region	1997-2279
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>86%, 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 1997-2279 aa (Q9ULT8) 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 HECTD1 E3 ubiquitin-protein ligase fragment (residues 1997-2279) from Homo sapiens, designed for structural and biochemical studies. This stable, soluble fragment supports research into ubiquitin signaling pathways and protein regulation mechanisms. HECTD1 is an E3 ubiquitin-protein ligase that facilitates the transfer of ubiquitin from E2 conjugating enzymes to specific substrates, primarily mediating 'Lys-63'-linked polyubiquitination. It plays critical roles in cellular processes, including the regulation of HSP90AA1 localization and secretion, which is essential for cranial neural development and neural tube closure. Additionally, HECTD1 promotes hematopoietic stem cell renewal by ubiquitinating and degrading ZNF622, a ribosomal assembly factor. The provided fragment represents a computationally optimized, stable region of the protein, enabling detailed investigation of its functional domains and interactions.