Recombinant APC5 protein (His tag)

Catalog Number	546201
Synonyms	APC5; Cyclosome subunit 5
Species	Human
Expression System	E. coli
Accession	Q9UJX4
Molecular Weight	Predictes a molecular mass of 20.53 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 21 kDa band.

Product Information

Sequence Region	1-166
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 1-166 aa (Q9UJX4) 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 Human Anaphase-promoting complex subunit 5 (APC5) fragment (residues 1-166) is a high-purity protein designed for structural and biochemical studies. This stable, soluble fragment retains key characteristics of the full-length APC5 subunit, enabling researchers to investigate its role in cell cycle regulation through the APC/C ubiquitin ligase complex. Anaphase-promoting complex subunit 5 (APC5) is an essential component of the anaphase promoting complex/cyclosome (APC/C), a cell cycle-regulated E3 ubiquitin ligase that controls progression through mitosis and the G1 phase. The APC/C complex primarily mediates formation of 'Lys-11'-linked polyubiquitin chains and, to a lesser extent, 'Lys-48'- and 'Lys-63'-linked chains, facilitating targeted protein degradation. Recent research shows the complex catalyzes assembly of branched 'Lys-11'-/'Lys-48'-linked ubiquitin chains on target proteins. APC5 localizes to both the nucleus and the cytoplasmic spindle apparatus, reflecting its critical role in mitotic regulation and cell division processes.