Recombinant SPDYC protein (His tag)

Catalog Number	549773
Synonyms	Rapid inducer of G2/M progression in oocytes C; RINGO C; hSpy/Ringo C
Species	Human
Expression System	E. coli
Accession	Q5MJ68
Molecular Weight	Predictes a molecular mass of 21.62 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 22 kDa band.

Product Information

Sequence Region	31-200
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 31-200 aa (Q5MJ68) 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	Introducing the recombinant Speedy protein C (RINGO C) fragment (amino acids 31-200), a high-quality protein designed for investigating cell cycle progression and spindle-assembly checkpoint mechanisms. This stable and soluble fragment enables reliable structural and biochemical studies, supporting research in cell division and mitotic regulation. Speedy protein C, encoded by the SPDYC gene in humans, plays a critical role in cell cycle regulation by binding and activating CDK1 and CDK2, thereby promoting G2/M phase progression. It is essential for the spindle-assembly checkpoint, facilitating the recruitment of key checkpoint proteins such as MAD2L1, BUBR1, and BUB1 to kinetochores and ensuring proper localization of Aurora B during prometaphase. Subcellularly, it localizes to the cytoplasm, colocalizing with tubulin gamma in interphase, and enriches at spindle poles and the midbody during mitosis, underscoring its importance in mitotic fidelity and cellular division processes.