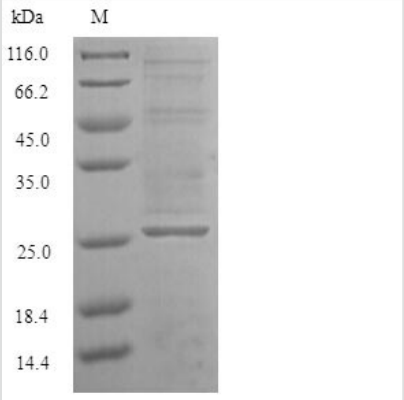
Recombinant Saccharomyces cerevisiae GTP-binding nuclear protein GSP1/CNR1 (GSP1)

Product Code	CSB-YP333740SVG
Relevance	GTP-binding protein involved in nucleoCytoplasmic domain transport. Required for the import of protein into the nucleus and also for RNA export. Essential for cell viability. By analogy with Ras, Ran may be activated when GTP is exchanged for bound GDP by RCC1 and inactivated when GTP is hydrolyzed by Ran upon activation by RanGAP1.
Abbreviation	Recombinant Saccharomyces cerevisiae GSP1 protein
Storage	The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.
Uniprot No.	P32835
Alias	Chromosome stability protein 17 GTPase Ran homolog Genetic suppressor of PRP20-1
Product Type	Recombinant Protein
Immunogen Species	Saccharomyces cerevisiae (strain ATCC 204508 / S288c) (Baker's yeast)
Purity	Greater than 90% as determined by SDS-PAGE.
Sequence	SAPAANGEVPTFKLVLVGDGGTGKTTFVKRHLTGEFEKKYIATIGVEVHPLSFY TNFGEIKFDVWDTAGQEKFGGLRDGYYINAQCAIIMFDVTSRITYKNVPNWHR DLVRVCENIPIVLCGNKVDVKERKVKAKTITFHRKKNLQYYDISAKSNYNFEKPF LWLARKLAGNPQLEFVASPALAPPEVQVDEQLMQQYQQEMEQATALPLPDED DADL
Research Area	Others
Source	Yeast
Target Names	GSP1
Protein Names	Recommended name: GTP-binding nuclear protein GSP1/CNR1 Alternative name(s): Chromosome stability protein 17 GTPase Ran homolog Genetic suppressor of PRP20-1
Expression Region	2-219aa
Notes	Repeated freezing and thawing is not recommended. Store working aliquots at 4°C for up to one week.
Tag Info	N-terminal 6xHis-tagged
Mol. Weight	26.7kDa
Protein Length	Full Length of Mature Protein
Image	



(Tris-Glycine gel) Discontinuous SDS-PAGE (reduced) with 5% enrichment gel and 15% separation gel.

Description

The recombinant Saccharomyces cerevisiae (strain ATCC 204508 / S288c) GSP1 protein production in Yeast cells involves the integration of a DNA fragment encoding the Saccharomyces cerevisiae (strain ATCC 204508 / S288c) GSP1 protein (2-219aa) into a plasmid vector, which is then introduced into Yeast cells. Following screening, positive cells are cultured and induced to synthesize the GSP1 protein. A N-terminal 6xHis tag is attached to the protein. Cell lysis is carried out to harvest the recombinant Saccharomyces cerevisiae (strain ATCC 204508 / S288c) GSP1 protein, which is purified through affinity purification and then analyzed using SDS-PAGE and subsequent staining of the gel with Coomassie Brilliant Blue. The purity of the resulting recombinant Saccharomyces cerevisiae (strain ATCC 204508 / S288c) GSP1 protein reaches over 90%.

Reconstitution

We recommend that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Please reconstitute protein in deionized sterile water to a concentration of 0.1-1.0 mg/mL.We recommend to add 5-50% of glycerol (final concentration) and aliquot for long-term storage at -20°C/-80°C. Our default final concentration of glycerol is 50%. Customers could use it as reference.

Shelf Life

The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself.
Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.