Recombinant RM44 protein (His tag)

Catalog Number	543646
Synonyms	39S ribosomal protein L44, mitochondrial; L44mt; MRP-L44
Species	Human
Expression System	E. coli
Accession	Q9H9J2
Molecular Weight	Predictes a molecular mass of 36.03 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 37 kDa band.

Product Information

Sequence Region	31-332
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>87%, 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 31-332 aa (Q9H9J2) 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 Large Ribosomal Subunit Protein mL44 Fragment (31-332) - A high-purity protein fragment encompassing the complete RNase III and DRBM functional domains, ideal for investigating mitochondrial ribosome assembly and nascent polypeptide stabilization mechanisms. The full-length Large Ribosomal Subunit Protein mL44 (MRPL44) is an essential component of the 39S subunit of the mitochondrial ribosome. Located within the mitochondrion, this protein plays a critical role in mitochondrial protein synthesis, with evidence suggesting it contributes to the assembly and stability of nascent mitochondrial polypeptides as they exit the ribosome. The mitochondrial ribosome is specialized for synthesizing proteins encoded by the mitochondrial genome, making mL44 fundamental to cellular energy production and mitochondrial function.