Recombinant MFI protein (His tag)

Catalog Number	549841
Synonyms	Mitochondrial fission factor interactor
Species	Human
Expression System	E. coli
Accession	Q8NCR3
Molecular Weight	Predictes a molecular mass of 32.54 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 34 kDa band.

Product Information

Sequence Region	1-263
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 1-263 aa (Q8NCR3) 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 Protein MFI (Mitochondrial fission factor interactor) fragment (residues 1-263) is a high-quality, soluble protein designed for structural and functional studies. This fragment represents a stable and soluble unit of MFI, ideal for investigating its role as an inhibitor of mitochondrial fission. Protein MFI, encoded by the MFI gene in Homo sapiens, functions as a key regulator of mitochondrial dynamics by inhibiting mitochondrial fission. It interacts with MFF (mitochondrial fission factor) and prevents the recruitment of DNM1L (dynamin-1-like protein) to mitochondria, thereby promoting a more fused mitochondrial network. MFI predominantly localizes to the cytosol, with a minor fraction associated with the outer mitochondrial membrane, where it modulates mitochondrial morphology and function. This recombinant fragment (residues 1-263) was computationally selected to provide a stable and soluble unit for biochemical and structural analyses, enabling researchers to explore MFI's mechanistic role in mitochondrial regulation.