



Recombinant Human Translation initiation factor IF-2, mitochondrial (MTIF2)

Product Code	CSB-EP015164HU-B
Storage	Store at -20°C, for extended storage, conserve at -20°C or -80°C.
Uniprot No.	P46199
Product Type	Recombinant Protein
Immunogen Species	Homo sapiens (Human)
Purity	≥85% (SDS-PAGE)
Sequence	L RQWRHGFSSA YPVWTAQLCA WPWPTDVLTG AALSQYRLLV TKKEEGPWKS QLSSTKSKKV VEVWIGMTIE ELARAMEKNT DYVYEALLNT DIDIDSLEAD SHLDEVWIKE VITKAGMKLK WSKLKQDKVR KNKDAVRRPQ ADPALLTPRS PVVTIMGHVD HGKTTLLDKF RKTQVAAVET GGITQHIGAF LVSLPSGEKI TFLDTPGHAA FSAMRARGAQ VTDIVVLVVA ADDGVMKQTV ESIQHAKDAQ VPIILAVNKC DKAEADPEKV KKELLAYDVV CEDYGGDVQA VPVSALTGDN LMALAEATVA LAEMLELKAD PNGPVEGTVI ESFTDKGRGL VTTAIIQRGT LRKGSVLVAG KCWAKVRLMF DENGKTIDEA YPSMPVGITG WRDLPSAGEE ILEVESEPPRA REVVDWRKYE QEKEGQEDL KIIIEKRKEH KEAHQKAREK YGHLLWKKRS ILRFLERKEQ IPLKPKEKRE RDSNVLSVII KGDVDGSVEA ILNIIDTYDA SHECELELVH FGVGDVSAND VNLAETFDGV YGFNPNAGN VIQQSAAKKG VKIKLHKIY RLVEDLQEEL SSRLPCAVEE HPVGEASILA TFSVTEGKKK VPVAGCRVQK GQLEKQKKFK LTRNGHVIWK GSLTSLKHHK DDISIVKTGM DCGLSLDEDN MEFQVGDRIV CYEEKQIQAK TSWDPGF
Source	E.coli
Target Names	MTIF2
Protein Names	Recommended name: Translation initiation factor IF-2, mitochondrial Short name= IF-2(Mt) Short name= IF-2Mt Short name= IF2(mt)
Expression Region	30-727
Notes	Repeated freezing and thawing is not recommended. Store working aliquots at 4°C for up to one week.
Tag Info	Tag type will be determined during the manufacturing process.
Protein Length	Full Length of Mature Protein
Target Details	During the initiation of protein biosynthesis, initiation factor-2 (IF-2) promotes the binding of the initiator tRNA to the small subunit of the ribosome in a GTP-dependent manner. Prokaryotic IF-2 is a single polypeptide, while eukaryotic cytoplasmic IF-2 (eIF-2) is a trimeric protein. Bovine liver mitochondria contain IF-2(mt), an 85-kD monomeric protein that is equivalent to prokaryotic IF-2. The predicted 727-amino acid human protein contains a 29-amino acid presequence. Human IF-2(mt) shares 32 to 38% amino acid sequence identity with yeast IF-2(mt) and several prokaryotic IF-2s, with the greatest degree of



conservation in the G domains of the proteins. Two transcript variants encoding the same protein have been found for this gene.

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.