



Rabbit Anti-GRPEL2 antibody

SL16325R

Product Name:	GRPEL2
Chinese Name:	GRPEL2蛋白抗体
Alias:	GrpE like 2, mitochondrial; GrpE protein homolog 2; GRPE2_HUMAN; GRPEL 2; Grpel2; mitochondrial; Mt GrpE#2; Mt-GrpE#2.
Organism Species:	Rabbit
Clonality:	Polyclonal
React Species:	Human,Mouse,Rat,Dog,Pig,Cow,Horse,Rabbit,Sheep,
Applications:	ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800ICC=1:100-500IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Molecular weight:	21kDa
Cellular localization:	cytoplasmic
Form:	Lyophilized or Liquid
Concentration:	1mg/ml
immunogen:	KLH conjugated synthetic peptide derived from human GRPEL2:33-130/225
Lsotype:	IgG
Purification:	affinity purified by Protein A
Storage Buffer:	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
Storage:	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20°C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
PubMed:	PubMed
Product Detail:	GrpEL2 (GrpE protein homolog 2) is a 225 amino acid mitochondrial matrix protein and component of the PAM complex. Consisting of Tim44, Tim14, HSP 70, Magmas, GrpEL1 and GrpEL2, the PAM complex plays an essential role in the ATP-dependent translocation of transit peptide-containing proteins to the mitochondrial matrix from the inner membrane. GrpEL2 regulates the nucleotide-dependent binding of mitochondrial HSP70 to substrate proteins and stimulates its ATPase activity. The gene encoding

GrpEL2 maps to human chromosome 5, which contains 181 million base pairs and comprises nearly 6% of the human genome. Deletion of the p arm of chromosome 5 leads to Cri du chat syndrome, while deletion of the q arm or of chromosome 5 altogether is common in therapy-related acute myelogenous leukemias and myelodysplastic syndrome.

Function:

Essential component of the PAM complex, a complex required for the translocation of transit peptide-containing proteins from the inner membrane into the mitochondrial matrix in an ATP-dependent manner. Seems to control the nucleotide-dependent binding of mitochondrial HSP70 to substrate proteins. Stimulates ATPase activity of mt-HSP70. May also serve to modulate the interconversion of oligomeric (inactive) and monomeric (active) forms of mt-HSP70.

Subcellular Location:

Mitochondrion matrix.

Similarity:

Belongs to the grpE family.

SWISS:

Q8TAA5

Gene ID:

134266

Database links:

[Entrez Gene: 134266](#) Human

[Entrez Gene: 17714](#) Mouse

[Entrez Gene: 688777](#) Rat

[SwissProt: Q8TAA5](#) Human

[SwissProt: O88396](#) Mouse

[Unigene: 511816](#) Human

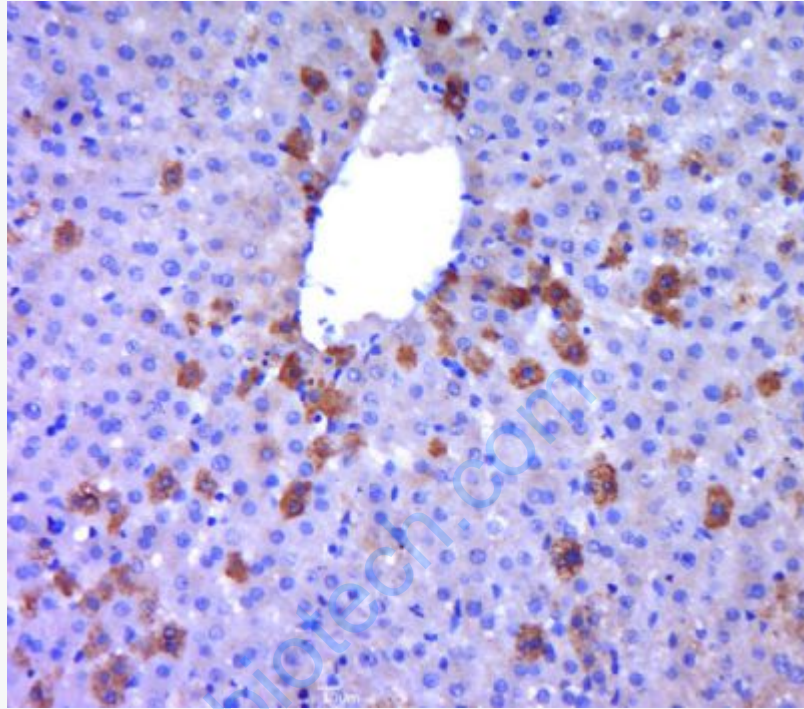
[Unigene: 269657](#) Mouse

[Unigene: 103300](#) Rat

Important Note:

This product as supplied is intended for research use only, not for use in human,

therapeutic or diagnostic applications.



Picture:

Paraformaldehyde-fixed, paraffin embedded (rat liver tissue); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (GRPEL2) Polyclonal Antibody, Unconjugated (SL16325R) at 1:400 overnight at 4°C, followed by a conjugated secondary (sp-0023) for 20 minutes and DAB staining.