

LRPPRC Blocking Peptide (Center)

Synthetic peptide

Catalog # BP21869c

Specification

LRPPRC Blocking Peptide (Center) - Product Information

Primary Accession

[P42704](#)

Other Accession

[Q6PB66](#), [Q5SGE0](#)**LRPPRC Blocking Peptide (Center) - Additional Information**

Gene ID 10128

Other Names

Leucine-rich PPR motif-containing protein, mitochondrial, 130 kDa leucine-rich protein, LRP 130, GP130, LRPPRC, LRP130

Target/Specificity

The synthetic peptide sequence is selected from aa 867-876 of HUMAN LRPPRC

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

LRPPRC Blocking Peptide (Center) - Protein Information

Name LRPPRC

Synonyms LRP130

Function

May play a role in RNA metabolism in both nuclei and mitochondria. In the nucleus binds to HNRPA1-associated poly(A) mRNAs and is part of nmRNP complexes at late stages of mRNA maturation which are possibly associated with nuclear mRNA export. Positively modulates nuclear export of mRNAs containing the EIF4E sensitivity element (4ESE) by binding simultaneously to both EIF4E and the 4ESE and acting as a platform for assembly for the RNA export complex (PubMed: [19262567](http://www.uniprot.org/citations/19262567), PubMed: [28325843](http://www.uniprot.org/citations/28325843)). Also binds to exportin XPO1/CRM1 to engage the nuclear pore and traffic the bound mRNAs to the cytoplasm (PubMed: [28325843](http://www.uniprot.org/citations/28325843)). May bind mature mRNA in the nucleus outer membrane. In mitochondria binds to poly(A) mRNA. Plays a role in translation or stability of mitochondrially

encoded cytochrome c oxidase (COX) subunits. May be involved in transcription regulation. Cooperates with PPARGC1A to regulate certain mitochondrially encoded genes and gluconeogenic genes and may regulate docking of PPARGC1A to transcription factors. Seems to be involved in the transcription regulation of the multidrug-related genes MDR1 and MVP. Part of a nuclear factor that binds to the invMED1 element of MDR1 and MVP gene promoters. Binds single-stranded DNA (By similarity). Required for maintaining mitochondrial potential (PubMed:23822101). Suppresses the initiation of basal levels of autophagy and mitophagy by sustaining BCL2 levels (PubMed:23822101).

Cellular Location

Mitochondrion. Nucleus Nucleus, nucleoplasm. Nucleus inner membrane. Nucleus outer membrane
Note=Seems to be predominantly mitochondrial

Tissue Location

Expressed ubiquitously. Expression is highest in heart, skeletal muscle, kidney and liver, intermediate in brain, non- mucosal colon, spleen and placenta, and lowest in small intestine, thymus, lung and peripheral blood leukocytes

LRPPRC Blocking Peptide (Center) - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Blocking Peptides](#)

LRPPRC Blocking Peptide (Center) - Images

LRPPRC Blocking Peptide (Center) - Background

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LRPPRC Blocking Peptide (Center) - References

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Ota T.,et al.Nat. Genet. 36:40-45(2004).
Hillier L.W.,et al.Nature 434:724-731(2005).
Hou J.,et al.In Vitro Cell. Dev. Biol. Anim. 30A:111-114(1994).
Bienvenut W.V.,et al.Submitted (JUL-2007) to UniProtKB.