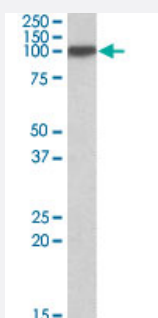


ACO1 polyclonal antibody

Catalog # PAB18708 Size 100 ug

Applications



Western Blot (Tissue lysate)

ACO1 polyclonal antibody (Cat # PAB18708) (0.1 ug/mL) staining of human liver lysate (35 ug protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

Specification

Product Description	Goat polyclonal antibody raised against synthetic peptide of ACO1.
Immunogen	A synthetic peptide corresponding to amino acids at internal region of human ACO1.
Sequence	C-QVDFNRRADSLQKNQ
Host	Goat
Theoretical MW (kDa)	100
Reactivity	Human
Form	Liquid
Purification	Antigen affinity purification
Concentration	0.5 mg/mL
Recommend Usage	ELISA (1:8000) Western Blot (0.1-0.3 ug/mL) The optimal working dilution should be determined by the end user.
Storage Buffer	In Tris saline, pH 7.3 (0.02% sodium azide, 0.5% BSA)

Storage Instruction

Store at -20°C.
Aliquot to avoid repeated freezing and thawing.

Note

This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.

Applications

- Western Blot (Tissue lysate)

ACO1 polyclonal antibody (Cat # PAB18708) (0.1 ug/mL) staining of human liver lysate (35 ug protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

- Enzyme-linked Immunoabsorbent Assay

Gene Info — ACO1

Entrez GeneID[48](#)**Protein Accession#**[NP_002188.1](#)**Gene Name**

ACO1

Gene Alias

ACONS, IREB1, IREBP, IREBP1, IRP1

Gene Description

aconitase 1, soluble

Omim ID[100880](#)**Gene Ontology**[Hyperlink](#)**Gene Summary**

Aconitase 1, also known as iron regulatory element binding protein 1 (IREB1), is a cytosolic protein which binds to iron-responsive elements (IREs). IREs are stem-loop structures found in the 5' UTR of ferritin mRNA, and in the 3' UTR of transferrin receptor mRNA. The iron-induced binding to the IRE results in repression of translation of ferritin mRNA, and inhibition of degradation of the otherwise rapidly degrading transferrin receptor mRNA. Thus, IREB1 plays a central role in cellular iron homeostasis. It was also shown to have aconitase activity, and hence grouped with the aconitase family of enzymes. [provided by RefSeq]

Other Designations

OTTHUMP00000021176|OTTHUMP00000021177|OTTHUMP00000045233|aconitase 1|aconitase hydratase|citrate hydro-lyase|ferritin repressor protein|iron regulatory protein 1|iron-responsive element binding protein 1

Pathway

- [Biosynthesis of alkaloids derived from histidine and purine](#)
- [Biosynthesis of alkaloids derived from ornithine](#)
- [Biosynthesis of alkaloids derived from shikimate pathway](#)
- [Biosynthesis of alkaloids derived from terpenoid and polyketide](#)
- [Biosynthesis of phenylpropanoids](#)
- [Biosynthesis of plant hormones](#)
- [Biosynthesis of terpenoids and steroids](#)
- [Citrate cycle \(TCA cycle\)](#)
- [Glyoxylate and dicarboxylate metabolism](#)
- [Metabolic pathways](#)
- [Reductive carboxylate cycle \(CO₂ fixation\)](#)