

ACAT1 Antibody

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP50955

Product Information

Application	WB
Primary Accession	<u>P24752</u>
Reactivity	Human, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Calculated MW	45200

Additional Information

Gene ID	38
Other Names	Acetyl-CoA acetyltransferase, mitochondrial, Acetoacetyl-CoA thiolase, T2, ACAT1, ACAT, MAT
Target/Specificity	KLH-conjugated synthetic peptide encompassing a sequence within the center region of human ACAT1. The exact sequence is proprietary.
Dilution	WB~~ 1:1000
Format	0.01M PBS, pH 7.2, 0.09% (W/V) Sodium azide, Glycerol 50%
Storage	Store at -20 °C.Stable for 12 months from date of receipt

Protein Information

Name	ACAT1
Synonyms	ACAT, MAT
Function	This is one of the enzymes that catalyzes the last step of the mitochondrial beta-oxidation pathway, an aerobic process breaking down fatty acids into acetyl-CoA (PubMed: <u>1715688</u> , PubMed: <u>7728148</u> , PubMed: <u>9744475</u>). Using free coenzyme A/CoA, catalyzes the thiolytic cleavage of medium- to long-chain 3-oxoacyl-CoAs into acetyl-CoA and a fatty acyl-CoA shortened by two carbon atoms (PubMed: <u>1715688</u> , PubMed: <u>7728148</u> , PubMed: <u>9744475</u>). The activity of the enzyme is reversible and it can also catalyze the condensation of two acetyl-CoA molecules into acetoacetyl-CoA (PubMed: <u>17371050</u>). Thereby, it plays a major role in ketone body metabolism (PubMed: <u>1715688</u> , PubMed: <u>17371050</u> , PubMed: <u>7728148</u> , PubMed: <u>9744475</u>).
Cellular Location	Mitochondrion.

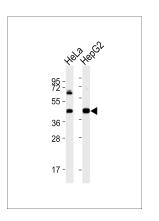
Background

Plays a major role in ketone body metabolism.

References

Fukao T.,et al.J. Clin. Invest. 86:2086-2092(1990). Kano M.,et al.Gene 109:285-290(1991). Ota T.,et al.Nat. Genet. 36:40-45(2004). Mural R.J.,et al.Submitted (JUL-2005) to the EMBL/GenBank/DDBJ databases. Aboulaich N.,et al.Biochem. J. 383:237-248(2004).

Images



All lanes : Anti-ACAT1 Antibody at 1:1000 dilution Lane 1: HeLa whole cell lysates Lane 2: HepG2 whole cell lysates Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L),Peroxidase conjugated at 1/10000 dilution Predicted band size : 45 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.