

ACLY Protein, Human (His-SUMO)

Cat. No.:	HY-P72070
Synonyms:	ACL; Acl; ACLY_HUMAN; ATP citrate pro-S; lyase; ATP citrate lyase; ATP citrate synthase; ATP-citrate pro-S; -lyase; ATP-citrate synthase; ATPcitrate synthase; ATPCL; Citrate cleavage enzyme; CLATP; OTTHUMP00000164773
Species:	Human
Source:	E. coli
Accession:	P53396 (K4-K265)
Gene ID:	47
Molecular Weight:	Approximately 45.5 kDa

PROPERTIES

AA Sequence	<pre> K A I S E Q T G K E L L Y K F I C T T S A I Q N R F K Y A R V T P D T D W A R L L Q D H P W L L S Q N L V V K P D Q L I K R R G K L G L V G V N L T L D G V K S W L K P R L G Q E A T V G K A T G F L K N F L I E P F V P H S Q A E E F Y V C I Y A T R E G D Y V L F H H E G G V D V G D V D A K A Q K L L V G V D E K L N P E D I K K H L L V H A P E D K K E I L A S F I S G L F N F Y E D L Y F T Y L E I N P L V V T K D G V Y V L D L A A K V D A T A D Y I C K V K W G D I E F P P P F G R E A Y P E E A Y I A D L D A K S G A S L K </pre>
Biological Activity	Data is not available.
Appearance	Lyophilized powder.
Formulation	Lyophilized from a 0.2 µm solution of Tris-based buffer, 50% Glycerol.
Endotoxin Level	<1 EU/µg, determined by LAL method.
Reconstitution	It is not recommended to reconstitute to a concentration less than 100 µg/mL in sterile distilled water.
Storage & Stability	Stored at -20°C. After reconstitution, it is stable at 4°C for 1 week or -20°C for longer. It is recommended to freeze aliquots at -20°C or -80°C for extended storage.
Shipping	Room temperature in continental US; may vary elsewhere.

DESCRIPTION

Background	ATP citrate lyase (ACLY) is an important enzyme linking carbohydrate to lipid metabolism by generating acetyl-CoA from citrate for fatty acid and cholesterol biosynthesis. ACLY is an important enzyme in the cholesterol biosynthetic pathway upstream of the 3-hydroxy3-methylglutaryl coenzyme A reductase (HMGCR) (which is targeted by statins). ACLY produces acetyl-CoA (AcCoA) from mitochondrial citrate for cholesterol and fatty acid biosynthesis. ACLY forms homotetramers
-------------------	--

through the C-terminus (citrate synthase homeodomain) to promote ACLY binding to CoA and AcCoA production^[1].

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA