[KD Validated] Anti-ACLY Rabbit mAb

Purified Recombinant Rabbit Monoclonal Antibody

Catalog # R020320

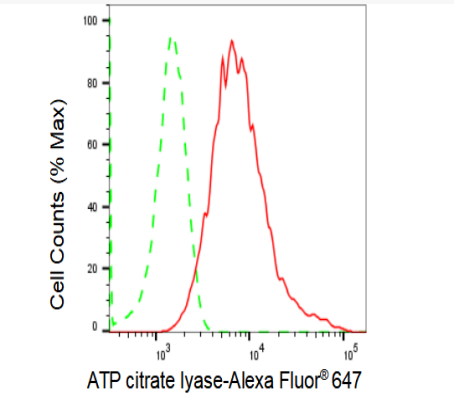
Product Information

Application	WB, FC, IF (Cell)/ICC
Reactivity	Human, Mouse, Rat
Dilution	WB 1:1,000~1:5,000; FC 1:200~1:2,000; IF 1:100~1:1,000
Host	Rabbit
Clonality	Monoclonal
Clone No.	75C11C87
Isotype	IgG
Label	Unconjugated
Immunogen	A synthesized peptide derived from human ATP citrate lyase
Format	Affinity purified monoclonal antibody supplied in PBS with 0.02% sodium azide and 50% glycerol, pH 7.3.
Storage	Shipped on wet ice. Store at -20°C. Stable for 12 months from date of receipt. Aliquoting is unnecessary for -20°C storage.
Precautions	[KD Validated] Anti-ACLY Rabbit mAb [75C11C87] is for research use only and not for use in diagnostic or therapeutic procedures.

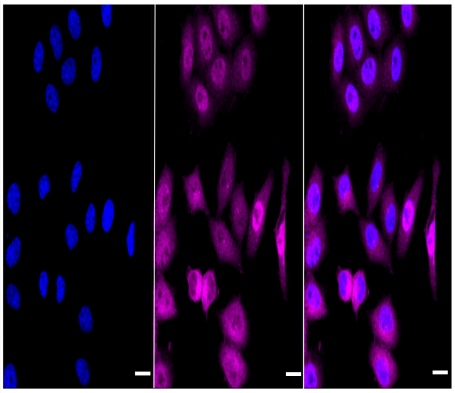
Protein Information

Synonyms	ACLY; ATP Citrate Lyase; ACL; ATPCL; CLATP; ATP-Citrate (Pro-S-)-Lyase; Citrate Cleavage Enzyme; ATP-Citrate Synthase; EC 2.3.3.8; ATP Citrate Synthase.
Calculated MW	Calculated MW: 121 kDa, Observed MW: 121 kDa
Uniprot ID	P53396
Gene ID	47
Background	ATP citrate lyase is the primary enzyme responsible for the synthesis of cytosolic acetyl-CoA in many tissues. The enzyme is a tetramer (relative molecular weight approximately 440,000) of apparently identical subunits. It catalyzes the formation of acetyl-CoA and oxaloacetate from citrate and CoA with a concomitant hydrolysis of ATP to ADP and phosphate. The product, acetyl-CoA, serves several important biosynthetic pathways, including lipogenesis and cholesterogenesis.

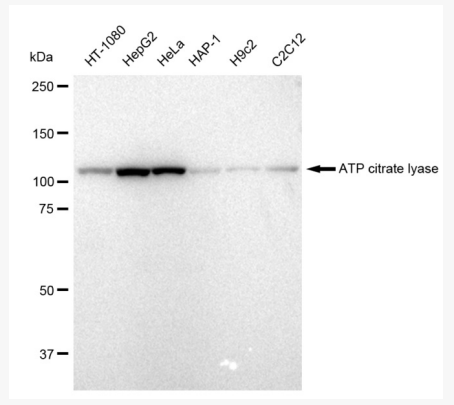
Validation Images



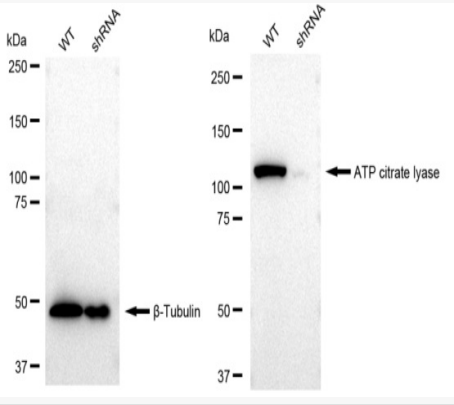
Flow cytometric analysis of ATP citrate lyase expression in HepG2 cells using ATP citrate lyase antibody (R020320, 1:2,000). Green, isotype control; red, ATP citrate lyase.



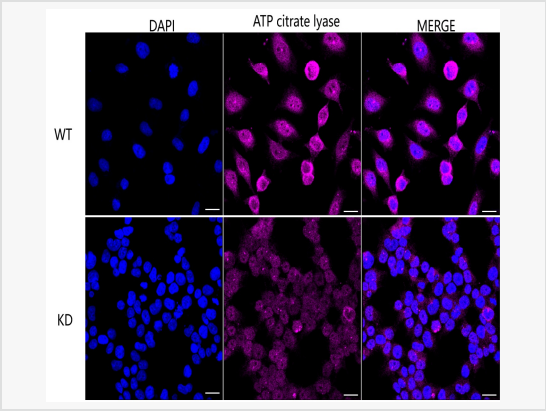
Immunocytochemical staining of HepG2 cells with ATP citrate lyase antibody (R020320, 1:1,000). Nuclei were stained blue with DAPI; ATP citrate lyase was stained magenta with Alexa Fluor® 647. Images were taken using Leica stellaris 5. Protein abundance based on laser Intensity and smart gain: High. Scale bar, 20 µm.



Western blotting analysis using ATP citrate lyase antibody (R020320). Total cell lysates (30 µg) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with ATP citrate lyase antibody (R020320, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (1:20,000) respectively. Image was developed using ECL Substrate Kit.



Western blotting analysis using ATP citrate lyase antibody (R020320). ATP citrate lyase expression in wild type (WT) and ATP citrate lyase shRNA knockdown (KD) HeLa cells with 30 µg of total cell lysates. β-Tubulin serves as a loading control. The blot was incubated with ATP citrate lyase antibody (R020320, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (1:20,000) respectively. Image was developed using ECL Substrate Kit.



Immunocytochemical staining of HeLa cells using ATP citrate lyase antibody (R020320, 1:1,000), Top panel: wild-type (WT); Bottom panal: ATP citrate lyase shRNA knockdown (KD). Nuclei were stained blue with DAPI; ATP citrate lyase was stained magenta with Alexa Fluor® 647. Scale bar, 20 µm. Permeabilization: Triton.