

**DCI Antibody (C-term)**  
**Affinity Purified Rabbit Polyclonal Antibody (Pab)**  
**Catalog # AP8770b****Specification**

---

**DCI Antibody (C-term) - Product Information**

Application	FC, IHC-P, WB,E
Primary Accession	<a href="#">P42126</a>
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	32816
Antigen Region	275-302

**DCI Antibody (C-term) - Additional Information****Gene ID** 1632**Other Names**

Enoyl-CoA delta isomerase 1, mitochondrial, 2-trans-enoyl-CoA isomerase, Delta(3),  
Delta(2)-enoyl-CoA isomerase, D3, D2-enoyl-CoA isomerase, Dodecenoyl-CoA isomerase, ECI1, DCI

**Target/Specificity**

This DCI antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 275-302 amino acids from the C-terminal region of human DCI.

**Dilution**

FC~~1:10~50

IHC-P~~1:10~50

WB~~1:1000

E~~Use at an assay dependent concentration.

**Format**

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

**Storage**

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

**Precautions**

DCI Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

**DCI Antibody (C-term) - Protein Information****Name** ECI1

## Synonyms DCI

**Function** Key enzyme of fatty acid beta-oxidation (Probable). Able to isomerize both 3-cis (3Z) and 3-trans (3E) double bonds into the 2- trans (2E) form in a range of enoyl-CoA species, with a preference for (3Z)-enoyl-CoAs over (3E)-enoyl-CoAs (By similarity) (PubMed:[7818490](#)). The catalytic efficiency of this enzyme is not affected by the fatty acyl chain length (By similarity).

## Cellular Location

Mitochondrion matrix {ECO:0000250|UniProtKB:P23965}

## Tissue Location

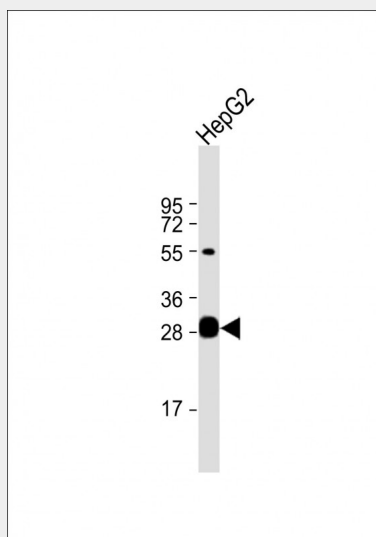
Expressed in liver (at protein level).

## DCI Antibody (C-term) - Protocols

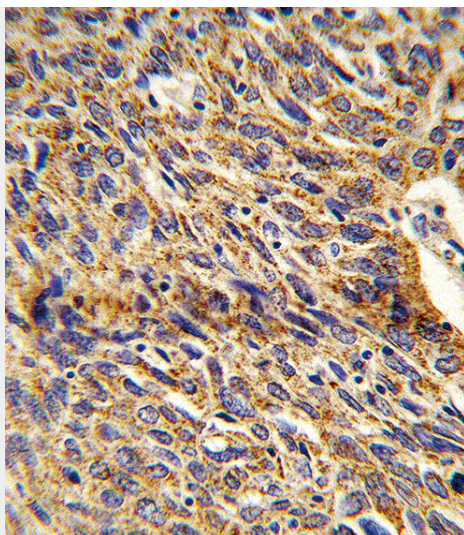
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

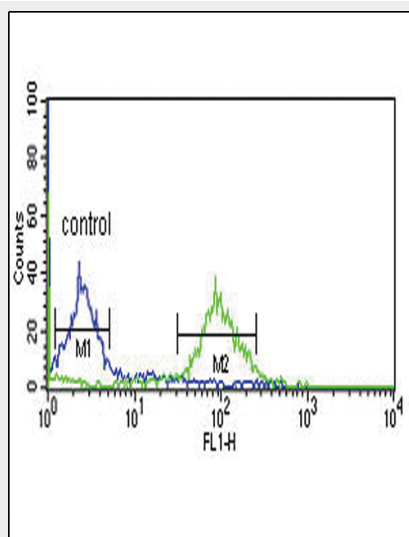
## DCI Antibody (C-term) - Images



Anti-DCI Antibody (C-term) at 1:1000 dilution + HepG2 whole cell lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 33 kDa Blocking/Dilution buffer: 5% NFDM/TBST.



Formalin-fixed and paraffin-embedded human lung carcinoma reacted with DCI Antibody (C-term), which was peroxidase-conjugated to the secondary antibody, followed by DAB staining. This data demonstrates the use of this antibody for immunohistochemistry; clinical relevance has not been evaluated.



DCI Antibody (C-term) (Cat. #AP8770b) flow cytometric analysis of MCF-7 cells (right histogram) compared to a negative control cell (left histogram). FITC-conjugated goat-anti-rabbit secondary antibodies were used for the analysis.

### DCI Antibody (C-term) - Background

DCI is a member of the hydratase/isomerase superfamily. The protein encoded is a key mitochondrial enzyme involved in beta-oxidation of unsaturated fatty acids. It catalyzes the transformation of 3-cis and 3-trans-enoyl-CoA esters arising during the stepwise degradation of cis-, mono-, and polyunsaturated fatty acids to the 2-trans-enoyl-CoA intermediates.

### DCI Antibody (C-term) - References

Takahashi, Y., et al., Biochem. J. 304 (PT 3), 849-852 (1994)