

## Anti-MTCO2 Rabbit mAb

Purified Recombinant Rabbit Monoclonal Antibody

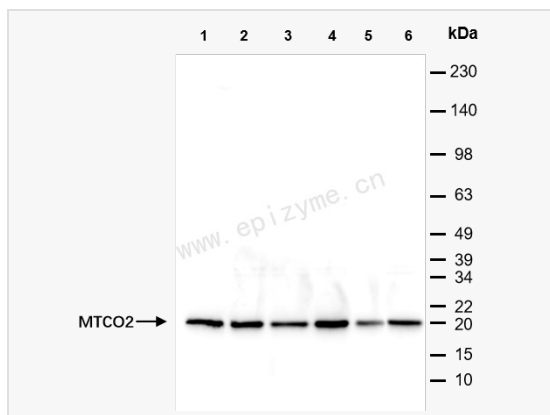
Catalog # R014578

### Product Information

Application	WB, IHC-P/IF (Tissue-P), IF (Cell)/ICC, ELISA
Reactivity	Human
Dilution	WB 1:1,000~1:2,000; IHC-P 1:100~1:200; IF 1:100~1:200
Host	Rabbit
Clonality	Monoclonal
Clone No.	45E53B75
Isotype	IgG
Label	Unconjugated
Immunogen	A synthesized peptide derived from human MTCO2
Format	Affinity purified monoclonal antibody supplied in PBS with 0.01% sodium azide and 50% glycerol, pH 7.3.
Storage	Shipped on wet ice. Store at -20°C. Stable for 24 months from date of receipt. Aliquoting is unnecessary for -20°C storage.
Precautions	Anti-MTCO2 Rabbit mAb [45E53B75] is for research use only and not for use in diagnostic or therapeutic procedures.

### Protein Information

Synonyms	COII, COX 2, COX II, COX2, COX2_HUMAN, COXII, Cytochrome c oxidase II, Cytochrome c oxidase polypeptide II, Cytochrome c oxidase subunit 2, MT CO2, MT-CO2, MTCO2.
Calculated MW	Calculated MW: 26 kDa; Observed MW: 21 kDa
Uniprot ID	P00403
Gene ID	4513
Background	Cytochrome c oxidase is the component of the respiratory chain that catalyzes the reduction of oxygen to water. Subunits 1-3 form the functional core of the enzyme complex. Subunit 2 transfers the electrons from cytochrome c via its binuclear copper A center to the bimetallic center of the catalytic subunit 1.
Cellular Location	Mitochondrion inner membrane.



Western Blot - Anti-MTCO2 Rabbit mAb [45E53B75]

All lanes: R014578 at 1:1,000 dilution

Lane 1: HeLa (Human cervix adenocarcinoma epithelial cell) whole cell lysates

Lane 2: HepG2 (Human hepatocarcinoma epithelial cell) whole cell lysates

Lane 3: HCT116 (Human colorectal carcinoma epithelial cell) whole cell lysates

Lane 4: A431 (Human epidermoid teratoma cell line) whole cell lysates

Lane 5: T24 (Human bladder cancer epithelial cell) whole cell lysates

Lane 6: U2OS (Human osteosarcoma epithelial cell) whole cell lysates

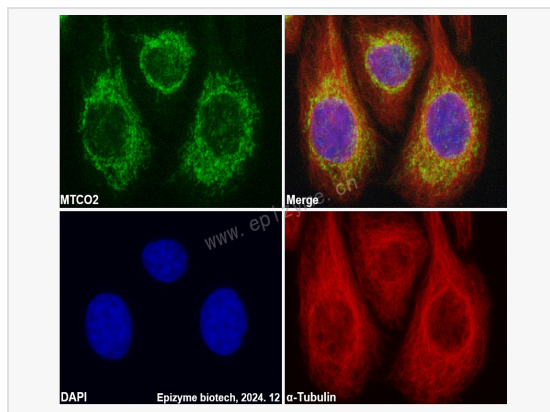
Lysates/proteins at 10 µg per lane.

Secondary antibody: Goat Anti-Rabbit IgG (H+L), HRP Conjugated (Cat. No. LF102) at 1:5,000 dilution

Predicted band size: 26 kDa

Observed band size: 21 kDa

Developed using the ECL technique (Cat. No. SQ201).



Immunofluorescence - Anti-MTCO2 Rabbit mAb [45E53B75]

Sample: HeLa cells

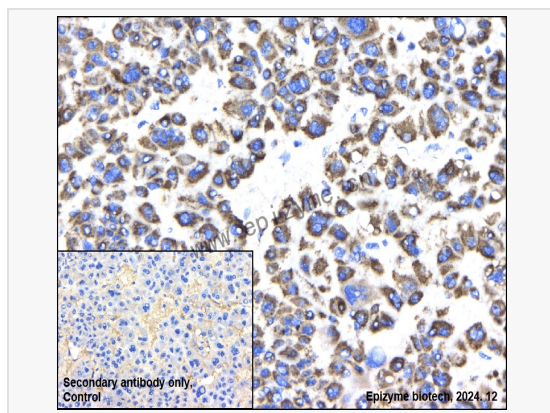
The cells were fixed with 4% paraformaldehyde (10 min), permeabilized with 0.5% Triton X-100 for 10 minutes and then blocked with 5% BSA in 0.1% PBS-Tween for 0.5 hours.

Primary antibodies: R014578 at 1:100 dilution and  $\alpha$ -tubulin Mouse Monoclonal

Antibody (Cat. No. LF209) at 1:100 dilution

Secondary antibodies: Goat anti-Rabbit (488) at 1:1,000 dilution (shown in green) and Goat anti-Mouse (555) at 1:1,000 dilution (shown in red)

Nuclei were stained with DAPI (shown in blue).



Immunohistochemistry - Anti-MTCO2 Rabbit mAb [45E53B75]

Sample: Paraformaldehyde-fixed, paraffin embedded human hepatoma tissue

Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0) for 30 mins.

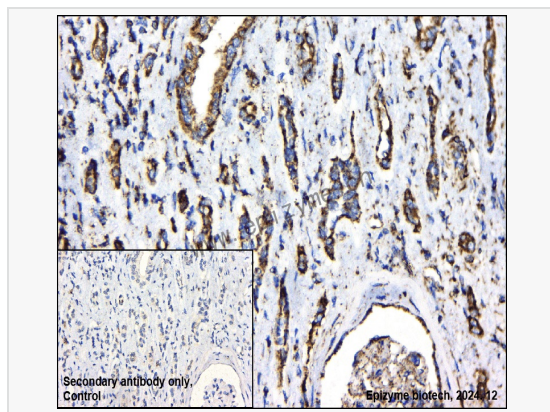
Primary antibody: R014578 at 1:200 dilution

Secondary antibody: Goat Anti-Rabbit IgG (H+L), HRP conjugated at 1:1,000 dilution DAB was used as the chromogen.

Counter stained with hematoxylin.

Positive/negative staining were presented.

Only the secondary antibody was used as the negative control.



Immunohistochemistry - Anti-MTCO2 Rabbit mAb [45E53B75]

Sample: Paraformaldehyde-fixed, paraffin embedded human renal carcinoma tissue

Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0) for 30 mins.

Primary antibody: R014578 at 1:200 dilution

Secondary antibody: Goat Anti-Rabbit IgG (H+L), HRP conjugated at 1:1,000 dilution DAB was used as the chromogen.

Counter stained with hematoxylin.

Positive/negative staining were presented.

Only the secondary antibody was used as the negative control.