

Anti-UQCRC2 Monoclonal Antibody

Catalog # ABO14514

Specification

Anti-UQCRC2 Monoclonal Antibody - Product Information

WB, IHC, IF, ICC, IP, FC Application **Primary Accession** P22695 Rabbit Host Isotype **Rabbit IgG** Reactivity Rat, Human, Mouse Clonality Monoclonal Format Liquid Description Anti-UQCRC2 Monoclonal Antibody . Tested in WB, IHC, ICC/IF, IP, Flow Cytometry applications. This antibody reacts with Human, Mouse, Rat.

Anti-UQCRC2 Monoclonal Antibody - Additional Information

Gene ID 7385

Other Names Cytochrome b-c1 complex subunit 2, mitochondrial, Complex III subunit 2, Core protein II, Ubiquinol-cytochrome-c reductase complex core protein 2, UQCRC2

Application Details WB 1:500-1:2000
IHC 1:50-1:200
ICC/IF 1:50-1:200
IP 1:50
FC 1:50

Contents

Rabbit IgG in phosphate buffered saline, pH 7.4, 150 mM NaCl, 0.02% sodium azide and 50% glycerol, 0.4-0.5 mg/ml BSA.

Immunogen A synthesized peptide derived from human UQCRC2.

Purification Affinity-chromatography

Storage

Store at -20°C for one year. For short term storage and frequent use, store at 4°C for up to one month. Avoid repeated freeze-thaw cycles.

Anti-UQCRC2 Monoclonal Antibody - Protein Information

Name UQCRC2

Function

Component of the ubiquinol-cytochrome c oxidoreductase, a multisubunit transmembrane



complex that is part of the mitochondrial electron transport chain which drives oxidative phosphorylation. The respiratory chain contains 3 multisubunit complexes succinate dehydrogenase (complex II, CII), ubiquinol-cytochrome c oxidoreductase (cytochrome b-c1 complex, complex III, CIII) and cytochrome c oxidase (complex IV, CIV), that cooperate to transfer electrons derived from NADH and succinate to molecular oxygen, creating an electrochemical gradient over the inner membrane that drives transmembrane transport and the ATP synthase. The cytochrome b-c1 complex catalyzes electron transfer from ubiquinol to cytochrome c, linking this redox reaction to translocation of protons across the mitochondrial inner membrane, with protons being carried across the membrane as hydrogens on the quinol. In the process called Q cycle, 2 protons are consumed from the matrix, 4 protons are released into the intermembrane space and 2 electrons are passed to cytochrome c (By similarity). The 2 core subunits UQCRC1/QCR1 and UQCRC2/QCR2 are homologous to the 2 mitochondrial-processing peptidase (MPP) subunits beta-MPP and alpha-MPP respectively, and they seem to have preserved their MPP processing properties (By similarity). May be involved in the in situ processing of UQCRFS1 into the mature Rieske protein and its mitochondrial targeting sequence (MTS)/subunit 9 when incorporated into complex III (Probable).

Cellular Location

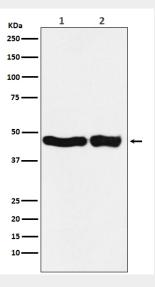
Mitochondrion inner membrane {ECO:0000250|UniProtKB:P07257}; Peripheral membrane protein {ECO:0000250|UniProtKB:P07257}; Matrix side {ECO:0000250|UniProtKB:P07257}

Anti-UQCRC2 Monoclonal Antibody - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Anti-UQCRC2 Monoclonal Antibody - Images



Western blot analysis of UQCRC2 expression in (1) HEK293 cell lysate; (2) Mouse kidney lysate.