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MOSC1 Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP9754c

Specification

MOSC1 Antibody (Center) - Product Information

Application	**WB, IHC-P,E**
Primary Accession	Q5VT66
Reactivity	**Human**
Host	**Rabbit**
Clonality	**Polyclonal**
Isotype	**Rabbit IgG**
Antigen Region	**175-204**

MOSC1 Antibody (Center) - Additional Information

Gene ID 64757

Other Names
Mitochondrial amidoxime-reducing component 1, mARC1, 1---, Molybdenum cofactor sulfurase C-terminal domain-containing protein 1, MOSC domain-containing protein 1, Moco sulfurase C-terminal domain-containing protein 1, MARC1, MOSC1

Target/Specificity
This MOSC1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 175-204 amino acids from the Central region of human MOSC1.

Dilution
WB~~1:1000
IHC-P~~1:50~100

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
MOSC1 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

MOSC1 Antibody (Center) - Protein Information

Name MTARC1 (HGNC:26189)

Synonyms MARC1, MOSC1

Function Catalyzes the reduction of N-oxygenated molecules, acting as a counterpart of cytochrome P450 and flavin-containing monooxygenases in metabolic cycles (PubMed:19053771, PubMed:21029045, PubMed:30397129). As a component of prodrug-converting system, reduces a multitude of N-hydroxylated prodrugs particularly amidoximes, leading to increased drug bioavailability (PubMed:19053771). May be involved in mitochondrial N(omega)-hydroxy-L-arginine (NOHA) reduction, regulating endogenous nitric oxide levels and biosynthesis (PubMed:21029045). Postulated to cleave the N-OH bond of N-hydroxylated substrates in concert with electron transfer from NADH to cytochrome b5 reductase then to cytochrome b5, the ultimate electron donor that primes the active site for substrate reduction (PubMed:21029045, PubMed:19053771).

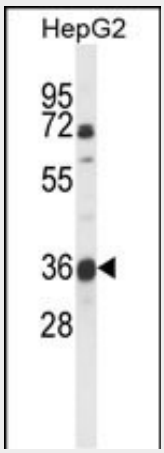
Cellular Location
Mitochondrion outer membrane; Single-pass type II membrane protein. Membrane; Lipid-anchor. Note=Mitochondrial import is mediated by AA 1-40 and requires ATP

MOSC1 Antibody (Center) - Protocols

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

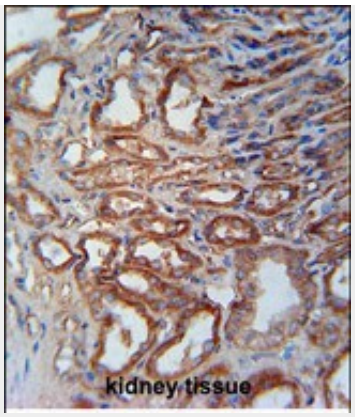
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

MOSC1 Antibody (Center) - Images



Western blot analysis of MOSC1 Antibody (Center) (Cat. #AP9754c) in HepG2 cell line lysates (35ug/lane). MOSC1 (arrow) was detected using the purified Pab.

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MOSC1 Antibody (Center) (Cat. #AP9754c) immunohistochemistry analysis in formalin fixed and paraffin embedded human kidney tissue followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of the MOSC1 Antibody (Center) for immunohistochemistry. Clinical relevance has not been evaluated.

MOSC1 Antibody (Center) - References

Gruenewald, S., et al. J. Med. Chem. 51(24):8173-8177(2008) Anantharaman, V., et al. FEMS Microbiol. Lett. 207(1):55-61(2002)

MOSC1 Antibody (Center) - Citations

- The Pivotal Role of the Mitochondrial Amidoxime Reducing Component 2 in Protecting Human Cells Against Apoptotic Effects of the Base Analog N6-Hydroxylaminopurine.
- The involvement of mitochondrial amidoxime reducing components 1 and 2 and mitochondrial cytochrome b5 in N-reductive metabolism in human cells.