

ATP5G1 Antibody (Center)
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP22100c**Specification**

ATP5G1 Antibody (Center) - Product Information

Application	WB,E
Primary Accession	P05496
Other Accession	P32876 , Q9CR84 , A1XOS5 , Q06645 , P17605 , P07926 , Q06055 , P56383 , Q5RAP9 , Q06646 , Q06056 , Q3ZC75 , P48201 , P56384 , Q5RFL2 , Q71S46
Reactivity	Human, Rat
Predicted	Bovine, Mouse, Pig, Sheep
Host	Rabbit
Clonality	polyclonal
Isotype	Rabbit IgG
Calculated MW	14277

ATP5G1 Antibody (Center) - Additional Information**Gene ID** 516**Other Names**

ATP synthase F(0) complex subunit C1, mitochondrial, ATP synthase lipid-binding protein, ATP synthase proteolipid P1, ATP synthase proton-transporting mitochondrial F(0) complex subunit C1, ATPase protein 9, ATPase subunit c, ATP5G1

Target/Specificity

This ATP5G1 antibody is generated from a rabbit immunized with a KLH conjugated synthetic peptide between 41-71 amino acids from the Central region of human ATP5G1.

Dilution

WB~~1:2000

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

ATP5G1 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

ATP5G1 Antibody (Center) - Protein Information

Name ATP5MC1 ([HGNC:841](#))

Function Subunit c, of the mitochondrial membrane ATP synthase complex (F(1)F(0) ATP synthase or Complex V) that produces ATP from ADP in the presence of a proton gradient across the membrane which is generated by electron transport complexes of the respiratory chain (Probable). ATP synthase complex consist of a soluble F(1) head domain - the catalytic core - and a membrane F(1) domain - the membrane proton channel (PubMed:[37244256](#)). These two domains are linked by a central stalk rotating inside the F(1) region and a stationary peripheral stalk (PubMed:[37244256](#)). During catalysis, ATP synthesis in the catalytic domain of F(1) is coupled via a rotary mechanism of the central stalk subunits to proton translocation (Probable). With the subunit a (MT- ATP6), forms the proton-conducting channel in the F(0) domain, that contains two crucial half-channels (inlet and outlet) that facilitate proton movement from the mitochondrial intermembrane space (IMS) into the matrix (PubMed:[37244256](#)). Protons are taken up via the inlet half- channel and released through the outlet half-channel, following a Grotthuss mechanism (PubMed:[37244256](#)).

Cellular Location

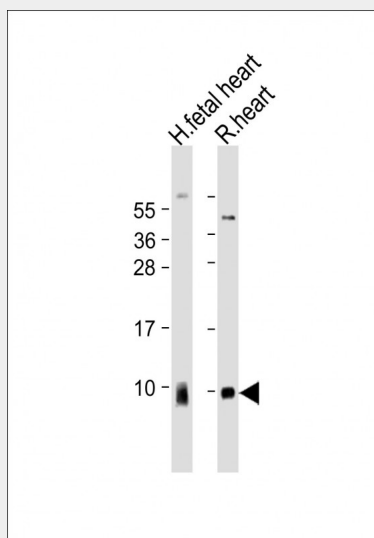
Mitochondrion membrane; Multi-pass membrane protein

ATP5G1 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 Cytometry](#)
- [Cell Culture](#)

ATP5G1 Antibody (Center) - Images



All lanes : Anti-ATP5G1 Antibody (Center) at 1:2000 dilution Lane 1: human fetal heart lysate Lane 2: rat heart lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG,

(H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 14 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

ATP5G1 Antibody (Center) - Background

Mitochondrial membrane ATP synthase (F(1)F(0) ATP synthase or Complex V) produces ATP from ADP in the presence of a proton gradient across the membrane which is generated by electron transport complexes of the respiratory chain. F-type ATPases consist of two structural domains, F(1) - containing the extramembraneous catalytic core and F(0) - containing the membrane proton channel, linked together by a central stalk and a peripheral stalk. During catalysis, ATP synthesis in the catalytic domain of F(1) is coupled via a rotary mechanism of the central stalk subunits to proton translocation. Part of the complex F(0) domain. A homomeric c-ring of probably 10 subunits is part of the complex rotary element.

ATP5G1 Antibody (Center) - References

Dyer M.R.,et al.Biochem. J. 293:51-64(1993).
Higuti T.,et al.Biochim. Biophys. Acta 1173:87-90(1993).
Wiemann S.,et al.Genome Res. 11:422-435(2001).
Kalnine N.,et al.Submitted (OCT-2004) to the EMBL/GenBank/DDBJ databases.
Farrell L.B.,et al.Biochem. Biophys. Res. Commun. 144:1257-1264(1987).