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SDHAF1 Antibody
Catalog # ASC11491

Specification

SDHAF1 Antibody - Product Information

Application	**WB, IF, ICC, E**
Primary Accession	A6NFY7
Other Accession	NP_001036096, 111038124
Reactivity	**Human, Mouse**
Host	**Rabbit**
Clonality	**Polyclonal**
Isotype	**IgG**
Application Notes	**SDHAF1 antibody can be used for detection of SDHAF1 by Western blot at 1 - 2 µg/mL. Antibody can also be used for immunocytochemistry starting at 5 µg/mL. For immunofluorescence start at 5 µg/mL.**

SDHAF1 Antibody - Additional Information

Gene ID **644096**

Target/Specificity
SDHAF1; SDHAF1 antibody is predicted to not cross-react with other SDHAF protein family members.

Reconstitution & Storage
SDHAF1 antibody can be stored at 4℃ for three months and -20℃, stable for up to one year. As with all antibodies care should be taken to avoid repeated freeze thaw cycles. Antibodies should not be exposed to prolonged high temperatures.

Precautions
SDHAF1 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

SDHAF1 Antibody - Protein Information

Name SDHAF1 {ECO:0000303|PubMed:19465911, ECO:0000312|HGNC:HGNC:33867}

Function
Plays an essential role in the assembly of succinate dehydrogenase (SDH), an enzyme complex (also referred to as respiratory complex II) that is a component of both the tricarboxylic acid (TCA) cycle and the mitochondrial electron transport chain, and which couples the oxidation of succinate to fumarate with the reduction of ubiquinone (coenzyme Q) to ubiquinol (PubMed:19465911, PubMed:24954417). Promotes maturation of the iron-sulfur protein subunit SDHB of the SDH catalytic dimer, protecting it from the deleterious effects of oxidants (PubMed:24954417). May act together with SDHAF3 (PubMed:24954417). Contributes

to iron-sulfur cluster incorporation into SDHB by binding to SDHB and recruiting the iron-sulfur transfer complex formed by HSC20, HSPA9 and ISCU through direct binding to HSC20 (PubMed:26749241).

Cellular Location
Mitochondrion matrix

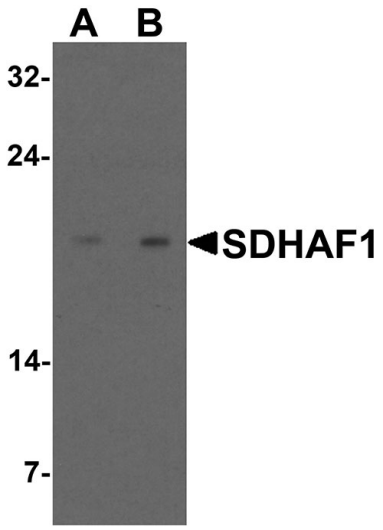
Tissue Location
Ubiquitously expressed.

SDHAF1 Antibody - 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

SDHAF1 Antibody - Images



Western blot analysis of SDHAF1 in 3T3 cell lysate with SDHAF1 antibody at (A) 1 and (B) 2 µg/mL.

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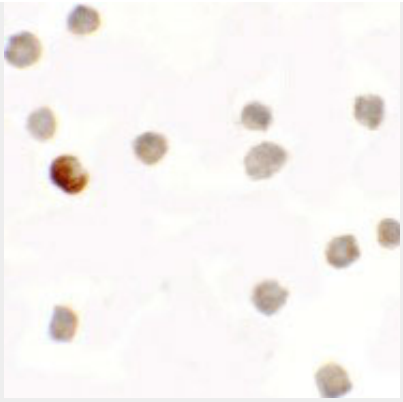
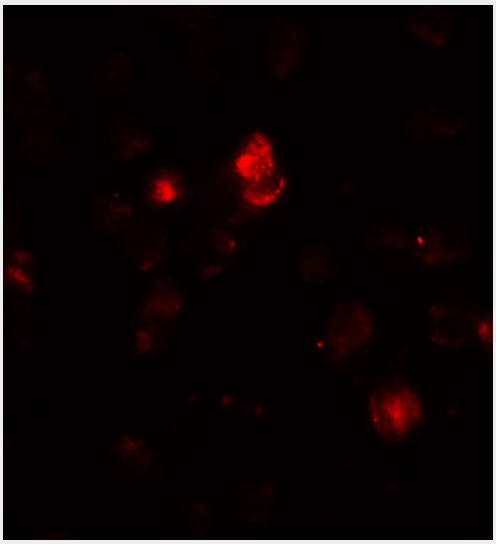


Immunocytochemistry of SDHAF1 in 3T3 cells with SDHAF1 antibody at 5 µg/mL.



Immunofluorescence of SDHAF1 in 3T3 cells with SDHAF1 antibody at 20 µg/mL.

SDHAF1 Antibody - Background

SDHAF1 Antibody: SDHAF1 (Succinate dehydrogenase complex assembly factor 1) is one of the subunits of the succinate dehydrogenase (SDH) complex (or complex II) of the mitochondrial respiratory chain. SDHAF1 resides in the mitochondria, and is essential for SDH assembly, but does not physically associate with the complex in vivo. Mutations in this gene are associated with SDH-defective infantile leukoencephalopathy (mitochondrial complex II deficiency). Unlike the related protein SDHAF2, SDHAF1 is not thought to be a tumor suppressor.

SDHAF1 Antibody - References

Ghezzi D, Goffrini P, Uziel G, et al. SDHAF1, encoding a LYR complex-II specific assembly factor, is mutated in SDH-defective infantile leukoencephalopathy. Nat. Genet. 2009; 41:654-6.
Hensen EE and Bayley JP. Recent advances in the genetics of SDH-related paraganglioma and pheochromocytoma. Fam. Cancer 2011; 10:355-63.