



Mouse Monoclonal Antibody **SDHB** conjugated to Sepharose Beads

CatalogNo: **ANT8296-M**

Size 200ul

Storage Store at 4 °C for frequent use

Description

This Antagene antibody is immobilized by the covalent reaction of hydrazinonicotinamide-modified antibody with formylbenzamide-modified beads. It is useful for immunoprecipitation.

SDHB (ANT0060R) Rabbit mAb

Formulation: Each vial contains 1mg/ml Magnetic Bead in PBS, pH 7.2, 0.05mg ANaN3.

Host Species

- Rabbit
- Human, Mouse, Rat,

Reactivity

- WB, IHC, IF, IP, ELISA

Applications

MW

- 31kD (Calculated)
 - IgG, Kappa
- 31kD (Observed)

Isotype

Recommended Dilution Ratios

IP

Basic Information

Clonality Monoclonal

Clone Number ANT0060R

Immunogen Information

Specificity Endogenous

Target Information

Gene name SDHB

Protein Name Succinate dehydrogenase [ubiquinone] iron-sulfur subunit mitochondrial

Organism	Gene ID	UniProt ID
Human	6390 ;	P21912 ;
Mouse	67680 ;	Q9CQA3 ;
Rat	298596 ;	P21913 ;

Cellular Localization Mitochondrion inner membrane

Tissue specificity Brain,Fibroblast,Liver,

Function Catalytic activity:Succinate + ubiquinone = fumarate + ubiquinol.,cofactor:binds 1 2Fe-2S cluster.,cofactor:binds 1 3Fe-4S cluster.,cofactor:binds 1 4Fe-4S cluster.,Disease:Defects in SDHB are a cause of Cowden-like syndrome [MIM:612359]. Cowden-like syndrome is a cancer predisposition syndrome associated with elevated risk for tumors of the breast, thyroid, kidney and uterus.,Disease:Defects in SDHB are a cause of paraganglioma and gastric stromal sarcoma [MIM:606864]; also called Carney-Stratakis syndrome. Gastrointestinal stromal tumors may be sporadic or inherited in an autosomal dominant manner, alone or as a component of a syndrome associated with other tumors, such as in the context of neurofibromatosis type 1 (NF1). Patients have both gastrointestinal stromal tumors and paragangliomas. Susceptibility to the tumors was inherited in an apparently autosomal dominant manner, with incomplete penetrance.,Disease:Defects in SDHB are a cause of pheochromocytoma [MIM:171300]. The pheochromocytomas are catecholamine-producing, chromaffin tumors that arise in the adrenal medulla in 90% of cases. In the remaining 10% of cases, they develop in extra-adrenal sympathetic ganglia and may be referred to as "paraganglioma." Pheochromocytoma usually presents with hypertension. Approximately 10% of pheochromocytoma is hereditary. Although pheochromocytoma susceptibility may be associated with germline mutations in the tumor-suppressor genes VHL and NF1 and in the proto-oncogene RET, the genetic basis for most cases of nonsyndromic familial pheochromocytoma is unknown.,Disease:Defects in SDHB are the cause of hereditary paragangliomas type 4 (PLG4) [MIM:115310]; also known as familial nonchromaffin paragangliomas type 4. Paragangliomas refer to rare and mostly benign tumors that arise from any component of the neuroendocrine system. PLG4 is characterized by the development of mostly benign, highly vascular, slow growing tumors in the head and neck. In the head and neck region, the carotid body is the largest of all paraganglia and is also the most common site of the tumors.,Function:Iron-sulfur protein (IP) subunit of succinate dehydrogenase (SDH) that is involved in complex II of the mitochondrial electron transport chain and is responsible for transferring electrons from succinate to ubiquinone (coenzyme Q).,pathway:Carbohydrate metabolism; tricarboxylic acid cycle.,similarity:Belongs to the succinate dehydrogenase/fumarate reductase iron-sulfur protein family.,similarity:Contains 1 2Fe-2S ferredoxin-type domain.,similarity:Contains 1 4Fe-4S ferredoxin-type domain.,subunit:Component of complex II composed of four subunits: the flavoprotein

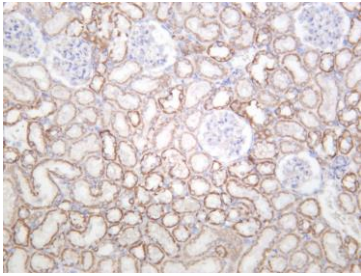
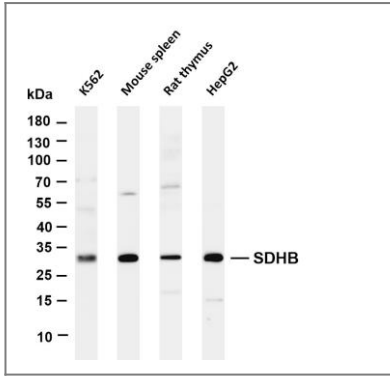
(FP) sdha, iron-sulfur protein (IP) sdhb, and a cytochrome b560 composed of sdhc and sdhd.,

Validation

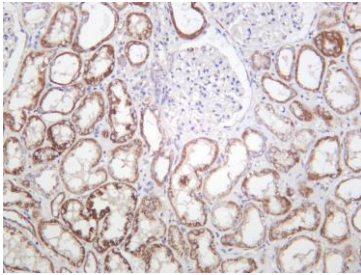
Data

Various whole cell lysates were separated by 4-20% SDS-PAGE, and the membrane was blotted with anti-SDHB (ANT0060R) antibody. The HRPconjugated Goat anti-Rabbit IgG(H + L) antibody was used to detect the antibody. Lane 1: K562 Lane 2: Mouse spleen Lane 3: Rat thymus Lane 4:

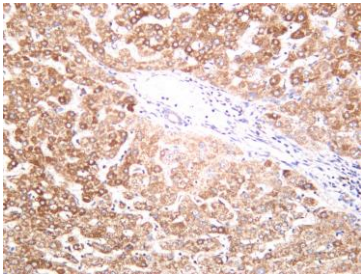
HepG2 Predicted band size: 31kDa Observed band size: 31kDa



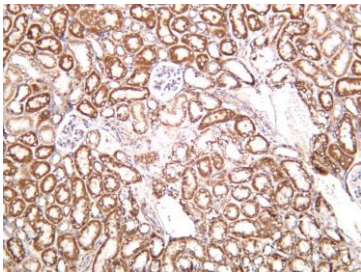
Rat kidney was stained with anti-SDHB (ANT0060R) rabbit antibody



Human kidney was stained with anti-SDHB (ANT0060R) rabbit antibody



Human liver was stained with anti-SDHB (ANT0060R) rabbit antibody



Mouse kidney was stained with anti-SDHB (ANT0060R) rabbit antibody

For Research use only, not for diagnostics and clinical use
Contact Antagene Inc Tel 1-866-964-2589 Email: info@antageneinc.com