

COX10 Polyclonal Antibody

Catalog No :	YT1068
Reactivity :	Human;Rat;Mouse;
Applications :	WB;ELISA
Target :	COX10
Fields :	>>Oxidative phosphorylation;>>Porphyrin metabolism;>>Metabolic pathways;>>Biosynthesis of cofactors;>>Thermogenesis
Gene Name :	COX10
Protein Name :	Protoheme IX farnesyltransferase mitochondrial
Human Gene Id :	1352
Human Swiss Prot No :	Q12887
Mouse Swiss Prot No :	Q8CFY5
Immunogen :	The antiserum was produced against synthesized peptide derived from human COX10. AA range:98-147
Specificity :	COX10 Polyclonal Antibody detects endogenous levels of COX10 protein.
Formulation :	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source :	Polyclonal, Rabbit,IgG
Dilution :	WB 1:500 - 1:2000. ELISA: 1:10000. Not yet tested in other applications.
Purification :	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Concentration :	1 mg/ml
Storage Stability :	-15°C to -25°C/1 year(Do not lower than -25°C)

Observed Band : 49kD

Cell Pathway : Oxidative phosphorylation;Porphyrin and chlorophyll metabolism;

Background : Cytochrome c oxidase (COX), the terminal component of the mitochondrial respiratory chain, catalyzes the electron transfer from reduced cytochrome c to oxygen. This component is a heteromeric complex consisting of 3 catalytic subunits encoded by mitochondrial genes and multiple structural subunits encoded by nuclear genes. The mitochondrially-encoded subunits function in electron transfer, and the nuclear-encoded subunits may function in the regulation and assembly of the complex. This nuclear gene encodes heme A:farnesyltransferase, which is not a structural subunit but required for the expression of functional COX and functions in the maturation of the heme A prosthetic group of COX. This protein is predicted to contain 7-9 transmembrane domains localized in the mitochondrial inner membrane. A gene mutation, which results in the substitution of a lys

Function : disease:Defects in COX10 are a cause of cytochrome c oxidase deficiency (COX deficiency) [MIM:220110]. COX deficiency is a clinically heterogeneous disorder. The clinical features are ranging from isolated myopathy to severe multisystem disease, with onset from infancy to adulthood.,disease:Defects in COX10 are a cause of Leigh syndrome (LS) [MIM:256000]. LS is a severe neurological disorder characterized by bilaterally symmetrical necrotic lesions in subcortical brain regions.,function:Converts protoheme IX and farnesyl diphosphate to heme O.,similarity:Belongs to the ubiA prenyltransferase family.,

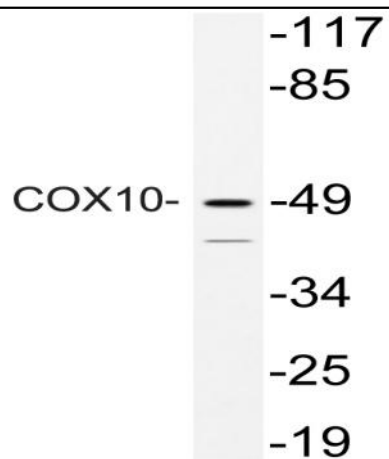
Subcellular Location : Mitochondrion membrane; Multi-pass membrane protein.

Expression : Brain,

Products Images



Western blot analysis of mouse-kidney mouse-brain HeLa KB 293T lysis using COX10 antibody. Antibody was diluted at 1:1000



Western blot analysis of lysate from HeLa cells, using COX10 antibody.