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CYP21A2 Polyclonal Antibody

Catalog # AP69379

Product Information

Application	WB, IHC-P, IF, ICC, E
Primary Accession	P08686
Reactivity	Human, Rat, Mouse
Host	Rabbit
Clonality	Polyclonal
Calculated MW	56001

Additional Information

Gene ID	1589
Other Names	CYP21A2; CYP21; CYP21B; Steroid 21-hydroxylase; 21-OHase; Cytochrome P-450c21; Cytochrome P450 21; Cytochrome P450 XXI; Cytochrome P450-C21; Cytochrome P450-C21B
Dilution	WB~~Western Blot: 1/500 - 1/2000. Immunohistochemistry: 1/100 - 1/300. ELISA: 1/40000. Not yet tested in other applications. IHC-P~~N/A IF~~1:50~200 ICC~~N/A E~~N/A
Format	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.09% (W/V) sodium azide.
Storage Conditions	-20℃

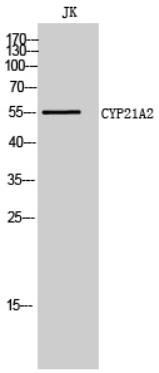
Protein Information

Name	CYP21A2
Synonyms	CYP21, CYP21B
Function	A cytochrome P450 monooxygenase that plays a major role in adrenal steroidogenesis. Catalyzes the hydroxylation at C-21 of progesterone and 17alpha-hydroxyprogesterone to respectively form 11- deoxycorticosterone and 11-deoxycortisol, intermediate metabolites in the biosynthetic pathway of mineralocorticoids and glucocorticoids (PubMed:10602386, PubMed:16984992, PubMed:22014889, PubMed:25855791, PubMed:27721825). Mechanistically, uses molecular oxygen inserting one oxygen atom into a substrate, and reducing the second into a water molecule, with two electrons provided by NADPH via cytochrome P450 reductase (CPR; NADPH-ferrihemoprotein reductase) (PubMed:25855791).
Cellular Location	Endoplasmic reticulum membrane; Peripheral membrane protein. Microsome membrane; Peripheral membrane protein

Background

Specifically catalyzes the 21-hydroxylation of steroids. Required for the adrenal synthesis of mineralocorticoids and glucocorticoids (PubMed:22014889).

Images



Western Blot analysis of JK cells using CYP21A2 Polyclonal Antibody

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.