Product Name: CYP19A1 Rabbit Polyclonal Antibody
Catalog #: APRab09628
For research use only.

Summary

Description	Rabbit polyclonal Antibody
Host	Rabbit
Application	WB,IHC,ICC/IF,ELISA
Reactivity	Human,Mouse,Rat
Conjugation	Unconjugated
Modification	Unmodified
Isotype	IgG
Clonality	Polyclonal
Form	Liquid
Concentration	1mg/ml
Storage	Aliquot and store at -20°C (valid for 12 months). Avoid freeze/thaw cycles.
Shipping	Ice bags
Buffer	Liquid in PBS containing 50% glycerol, 0.5% protective protein and 0.02% New type preservative N.
Purification	Affinity purification

Application

Dilution Ratio	WB 1:500-1:2000,IHC 1:100-1:300,ICC/IF 1:200-1:1000,ELISA 1:10000-1:20000
Molecular Weight	53kDa

Antigen Information

Gene Name	CYP19A1
Alternative Names	CYP19A1; ARO1; CYAR; CYP19; Cytochrome P450 19A1; Aromatase; CYPXIX; Cytochrome P-450AROM; Estrogen synthase
Gene ID	1588.0
SwissProt ID	P11511
Immunogen	The antiserum was produced against synthesized peptide derived from human Cytochrome P450 19A1. AA range:221-270

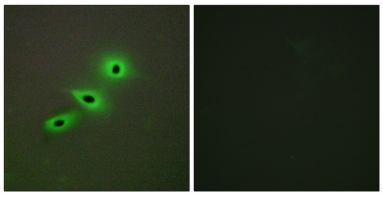
Background

cytochrome P450 family 19 subfamily A member 1(CYP19A1) Homo sapiens This gene encodes a member of the cytochrome P450 superfamily of enzymes. The cytochrome P450 proteins are monooxygenases which catalyze many reactions involved in drug metabolism and synthesis of cholesterol, steroids and other lipids. This protein localizes to the endoplasmic reticulum and catalyzes the last steps of estrogen biosynthesis. Mutations in this gene can result in either increased or decreased aromatase activity; the associated phenotypes suggest that estrogen functions both as a sex steroid hormone and in growth or differentiation. Alternative splicing results in multiple transcript variants. [provided by RefSeq, May 2014],catalytic activity:RH + reduced flavoprotein + O(2) = ROH + oxidized flavoprotein + H(2)O.,cofactor:Heme group.,disease:Defects in CYP19A1 are a cause of familial gynecomastia [MIM:139300]. This is characterized by an estrogen excess due to an increased aromatase activity.,disease:Defects in CYP19A1 are the cause of aromatase deficiency (AROD) [MIM:107910]. AROD is a rare disease in which fetal androgens are not converted into estrogens due to placental aromatase deficiency. Thus, pregnant women exhibit a hirsutism, which spontaneously resolves after post-partum. At birth, female babies present with pseudohermaphroditism due to virilization of extern genital organs. In adult females, manifestations include delay of puberty, breast hypoplasia and primary amenorrhoea with multicystic ovaries.,function:Catalyzes the formation of aromatic C18 estrogens from C19 androgens.,online information:Aromatase entry,similarity:Belongs to the cytochrome P450 family.,tissue specificity:Brain, placenta and gonads.,

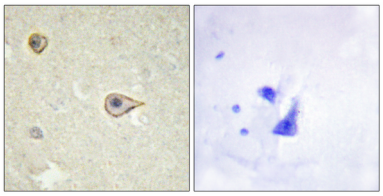
Research Area

Steroid hormone biosynthesis;Androgen and estrogen metabolism;

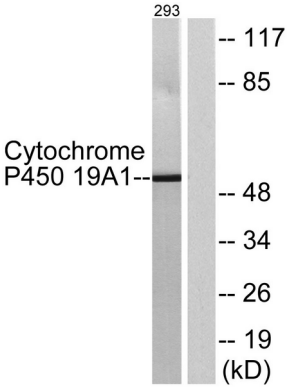
Image Data



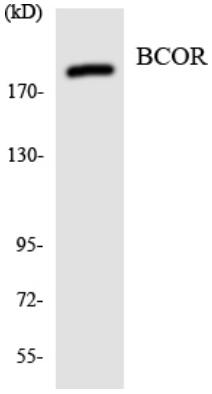
Immunofluorescence analysis of A549 cells, using Cytochrome P450 19A1 Antibody. The picture on the right is blocked with the synthesized peptide.



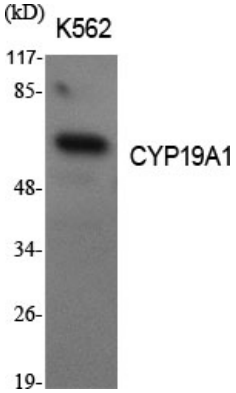
Immunohistochemistry analysis of paraffin-embedded human brain tissue, using Cytochrome P450 19A1 Antibody. The picture on the right is blocked with the synthesized peptide.



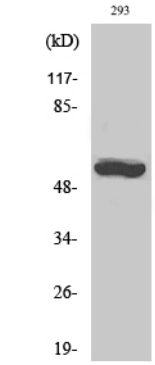
Western blot analysis of lysates from 293 cells, using Cytochrome P450 19A1 Antibody. The lane on the right is blocked with the synthesized peptide.



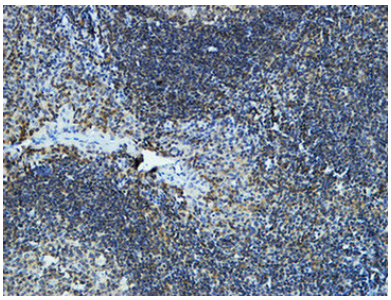
Western blot analysis of the lysates from HeLa cells using BCOR antibody.



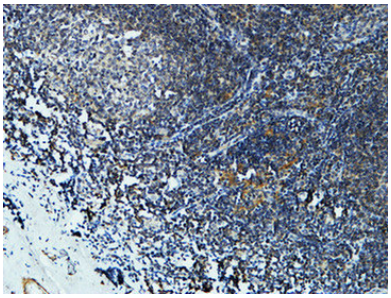
Western Blot analysis of various cells using CYP19A1 Polyclonal Antibody diluted at 1：1000



Western Blot analysis of 293 cells using CYP19A1 Polyclonal Antibody diluted at 1:1000



Immunohistochemical analysis of paraffin-embedded Human Amygdala. 1, Antibody was diluted at 1:100（4°,overnight）. 2, High-pressure and temperature EDTA, pH8.0 was used for antigen retrieval. 3,Secondary antibody was diluted at 1:200（room temperature, 30min）.



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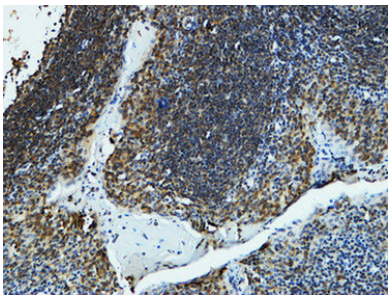

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