

Basic Information

Product Name	Anti-CYP19A1 Antibody
Gene Name	CYP19A1
Source	Rabbit
Isotype	IgG
Species Reactivity	human, mouse, rat
Tested Application	WB, ELISA
Contents	500 ug/ml antibody with PBS, 0.02% NaN ₃ , 1 mg BSA and 50% glycerol.
Immunogen	E.coli-derived mouse Aromatase/Cyp19a1 recombinant protein (Position: N75-Q428).
concentration	500 ug/ml
Purification	Immunogen affinity purified.
Observed MW	58KD
Dilution Ratios	Western blot(WB):1:500-2000 (ELISA): 1:100-1000

Storage

12 months from date of receipt, -20°C as supplied. 6 months 2 to 8°C after reconstitution. Avoid repeated freezing and thawing.

Background Information

CYP19A1, also called Aromatase, is an enzyme responsible for a key step in the biosynthesis of estrogens. It is a member of the cytochrome P450 superfamily, which are monooxygenases that catalyze many reactions involved in steroidogenesis. In particular, aromatase is responsible for the aromatization of androgens into estrogens. The CYP19 gene spans at least 70 kb of genomic DNA and contains 10 exons. By in situ hybridization, the ARO gene is mapped to 15q21.1. The aromatase enzyme can be found in many tissues including gonads, brain, adipose tissue, placenta, blood vessels, skin, bone, and endometrium, as well as in tissue of endometriosis, uterine fibroids, breast cancer, and endometrial cancer. It is an important factor in sexual development. Some bodybuilders taking steroids also take antiaromatase supplements to prevent excess testosterone conversion into estrogens, which can cause gynecomastia.

Selected Validation Data

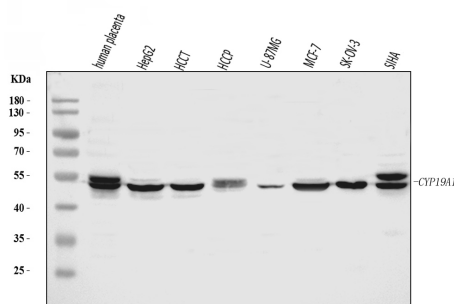


Figure 1. Western blot analysis of anti- CYP19A1 Antibody (A00071-2). The sample well of each lane was loaded with 50ug of sample under reducing conditions.

Lane 1: human placenta tissue lysates,

Lane 2: HepG2 whole cell lysates,

Lane 3: HCCT tissue lysates,

Lane 4: HCCP tissue lysates,

Lane 5: U-87MG whole cell lysates,

Lane 6: MCF-7 whole cell lysates,

Lane 7: SK-OV-3 whole cell lysates,

Lane 8: SIHA whole cell lysates.

Use rabbit anti- CYP19A1 1:1000, probed with a goat anti-rabbit IgG-HRP secondary antibody. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit (Catalog # EK1002). A specific band was detected for CYP19A1 at approximately 49-58KD. The expected band size for CYP19A1 is at 58KD.