CYP2J2 (h): 293T Lysate: sc-115223



The Power to Question

BACKGROUND

The cytochrome P450 proteins are monooxygenases that catalyze many reactions involved in drug metabolism and synthesis of cholesterol, steroids and other lipids. CYP2J2 (cytochrome P450 2J2), also known as CPJ2, is a member of the cytochrome P450 protein superfamily. Localized to the ER (endoplasmic reticulum) and microsomal membranes, CYP2J2 is one of three cytochrome P450 enzymes that are responsible for metabolizing arachidonic acid to epoxyeicosatrienoic acids. Functioning via an NADPH-dependent olefin epoxidation, CYP2J2 epoxidizes endogenous cardiac arachidonic acid pools to four different isoforms of epoxyeicosatrienoic acid, all of which are important regulators of cardiovascular homeostasis and vascular tone. CYP2J2 is highly expressed in the heart with low levels of expression found in the liver, colon and kidneys. Upregulation of CYP2J2 by a c-Jun responsive pathway is thought to promote the neoplastic phenotype of certain carcinoma cells, implicating CYP2J2 in carcinogenesis.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: CYP2J2 (human) mapping to 1p32.1.

PRODUCT

CYP2J2 (h): 293T Lysate represents a lysate of human CYP2J2 transfected 293T cells and is provided as 100 µg protein in 200 µl SDS-PAGE buffer.

APPLICATIONS

CYP2J2 (h): 293T Lysate is suitable as a Western Blotting positive control for human reactive CYP2J2 antibodies. Recommended use: 10-20 µl per lane.

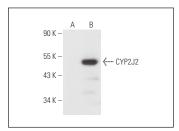
Control 293T Lysate: sc-117752 is available as a Western Blotting negative control lysate derived from non-transfected 293T cells.

CYP2J2 (E-6): sc-137100 is recommended as a positive control antibody for Western Blot analysis of enhanced human CYP2J2 expression in CYP2J2 transfected 293T cells (starting dilution 1:100, dilution range 1:100-1:1,000).

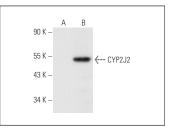
RECOMMENDED SUPPORT REAGENTS

To ensure optimal results, the following support reagents are recommended: 1) Western Blotting: use m-lgG κ BP-HRP: sc-516102 or m-lgG κ BP-HRP (Cruz Marker): sc-516102-CM (dilution range: 1:1000-1:10000), Cruz MarkerTM Molecular Weight Standards: sc-2035, UltraCruz® Blocking Reagent: sc-516214 and Western Blotting Luminol Reagent: sc-2048.

DATA







CYP2J2 (D-6): sc-137127. Western blot analysis of CYP2J2 expression in non-transfected: sc-117752 (A) and human CYP2J2 transfected: sc-115223 (B) 293T whole cell Ivsates.

STORAGE

Store at -20 $^{\circ}$ C. Repeated freezing and thawing should be minimized. Sample vial should be boiled once prior to use. Non-hazardous. No MSDS required.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PROTOCOLS

See our web site at www.scbt.com for detailed protocols and support products.