SANTA CRUZ BIOTECHNOLOGY, INC.

UGT2B (H-300): sc-50386



BACKGROUND

UDP-glucuronosyltransferase isoenzymes (UGTs) catalyze the glucuronidation of small lipophilic molecules, which regulates the bioactivity and metabolic fate of a wide range of endo- and xenobiotics. Glucuronidation increases the polarity of lipophilic molecules and facilitates their entry into aqueous compartments and their ultimate excretion. In essence, glucuronidation provides a protective function by terminating or attenuating the biological activity of its substrates. The UGT2B family of isoenzymes are highly expressed in liver, but are also detected in several non-hepatic tissues, including skin, breast, prostate, intestine, placenta and lung. Therefore, the UGT2B family may preferentially modulate steroid metabolism and excretion in addition to bile acids and xenobiotics. The human UGT2B genes localize as a cluster on chromosome 4q13.2.

SOURCE

UGT2B (H-300) is a rabbit polyclonal antibody raised against amino acids 188-487 mapping near the C-terminus of UGT2B4 of human origin.

PRODUCT

Each vial contains 200 μg lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

UGT2B (H-300) is recommended for detection of UGT2B family members and UGT2A1 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500), immunohistochemistry (including paraffin-embedded sections) (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

UGT2B (H-300) is also recommended for detection of UGT2B family members and UGT2A1 in additional species, including equine.

Molecular Weight of UGT2B: 52 kDa.

Positive Controls: UGT2B38 (m): 293T Lysate: sc-124455 or NIH/3T3 whole cell lysate: sc-2210.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker[™] compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker[™] Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) with UltraCruz[™] Mounting Medium: sc-24941. 4) Immuno-histochemistry: use ImmunoCruz[™]: sc-2051 or ABC: sc-2018 rabbit IgG Staining Systems.

STORAGE

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

DATA



UGT2B (H-300): sc-50386. Western blot analysis of UGT2B38 expression in non-transfected: sc-117752 (A) and mouse UGT2B38 transfected: sc-124455 (B) 293T whole cell lysates.



UGT2B (H-300): sc-50386. Immunoperoxidase staining of formalin fixed, paraffin-embedded human colon tissue showing cytoplasmic staining of glanduar cells (A). Immunoperoxidase staining of formalin fixed, paraffin-embedded human liver tissue showing cytoplasmic staining of hepatocytes. Kindly provided by The Swedish Human Protein Atlas (HPA) program (B).

SELECT PRODUCT CITATIONS

- Sivils, J.C., et al. 2010. Mice lacking Mrp1 have reduced testicular steroid hormone levels and alterations in steroid biosynthetic enzymes. Gen. Comp. Endocrinol. 167: 51-59.
- Wang, H., et al. 2011. Characterizing the effect of UDP-glucuronosyltransferase (UGT) 2B7 and UGT1A9 genetic polymorphisms on enantioselective glucuronidation of flurbiprofen. Biochem. Pharmacol. 82: 1757-1763.
- Zhang, H., et al. 2012. Human UDP-glucuronosyltransferase expression in insect cells: ratio of active to inactive recombinant proteins and the effects of a C-terminal his-tag on glucuronidation kinetics. Drug Metab. Dispos. 40: 1935-1944.

RESEARCH USE

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

PROTOCOLS

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

MONOS Satisfation Guaranteed Try UGT2B (E-6): sc-271777, our highly recommended monoclonal aternative to UGT2B (H-300).