CONTENTS

SHORT COMMUNICATIONS

Inhibition of UDP-Glucuronosyltransferase 2B7-Catalyzed Morphine Glucuronidation by Ketoconazole: Dual Mechanisms Involving a Novel Noncompetitive Mode. SHUSO TAKEDA, YURIE KITAJIMA, YUI ISHIH, YOSHIO NISHIMURA, PETER I. MACKENZIE, KAZUTA OGURI, AND HIDEYUKI YAMADA .................................................. 1277

NMR Characterization of an S-Linked Glucuronide Metabolite of the Potent, Novel, Nonsteroidal Progesterone Agonist Tanaprost. KELLY A. KEATING, OLIVER MCCONNELL, YINGRUI ZHANG, LI SHEN, WILLIAM DEMAIO, LARRY MALLIS, SAYED ELMARAKBY, AND APPAVU CHANDRASEKARAN .... 1283

Kinetic Isotope Effects Implicate a Single Oxidant for Cytochrome P450-Mediated O-Dealkylation, N-Oxygenation, and Aromatic Hydroxylation of 6-Methoxyquinoline. TAMARA S. DOWERS AND JEFFREY P. JONES ........................................... 1288

ARTICLES

Evaluation of Time-Dependent Cytochrome P450 Inhibition Using Cultured Human Hepatocytes. DERMOT F. MCGINNITY, AMANDA J. BERRY, JANE R. KENNY, KEN GRIME, AND ROBERT J. RILEY ........ 1291


Metabolism of Nomifensine to a Dihydroisoquinolinium Ion Metabolite by Human Myeloperoxidase, Hemoglobin, Monoamine Oxidase A, and Cytochrome P450 Enzymes. R. SCOTT OBAR AND DEEPAK K. DALVIE ................................. 1310

Selective Metabolism of Vincristine in Vitro by CYP3A5. JENNIFER B. DENNISON, PALANIPPAAN KULANTHAYIL, ROBERT J. BARBUCI, JAMIE L. RENBARGER, WILLIAM J. EHLOHARDT, AND STEPHEN D. HALL ................................................................. 1317

Quantitative Determination of Metabolic Products of 19-Norandrostenediol in Human Plasma Using Gas Chromatography/Mass Spectrometry. YVONNE SCHRADER, MARIO THEVIS, AND WILHELM SCHÄNZER ..................................................... 1328

In Vitro and in Vivo Correlation of Hepatic Transporter Effects on Erythromycin Metabolism: Characterizing the Importance of Transporter-Enzyme Interplay. JUSTINE L. LAM, HIDEAKI OKOCHI, YONG HUANG, AND LESLIE Z. BENET .............................................. 1336

Pharmacokinetics and Metabolism of the Flavonoid Scutellarin in Humans after a Single Oral Administration. XIAOYAN CHEN, LIANG CUI, XIAOTAO DUAN, BIN MA, AND DAFANG ZHONG ........... 1345

Differential Effects of the Oxidized Metabolites of Oltipraz on the Activation of CCAAT/Enhancer Binding Protein-β and NF-E2-Related Factor-2 for GSTA2 Gene Induction. MYONG SUK KO, SEUNG JIN LEE, JIN WAN KIM, JEE WOONG LIM, AND SANG GEON KIM ................................................................. 1353

Effect of Cytochromes P450 Chemical Inhibitors and Monoclonal Antibodies on Human Liver Microsomal Esterase Activity. STACEY L. POLSKY-FISHER, HONG CAO, PING LU, AND CHRISTOPHER R. GIBSON .................................................................................. 1361

Continued on next page
Species Differences in Metabolism and Pharmacokinetics of a Sphingosine-1-Phosphate Receptor Agonist in Rats and Dogs: Formation of a Unique Glutathione Adduct in the Rat. M. REZA ANARI, MELLISSA D. CREIGHTON, JASON S. NGUI, RICHARD A. TSCHIRRET-GUTH, YOHANNES TEFFERA, GEORGE A. DOSS, WEI TANG, NATHAN X. YU, SUZANNE L. CICCOTTO, DONALD F. HOBRA JR., JOHN B. COLEMAN, STELLA H. VINCENT, AND DAVID C. EVANS

Induction of CYP1A and CYP2-Mediated Arachidonic Acid Epoxidation and Suppression of 20-Hydroxyeicosatetraenoic Acid by Imidazole Derivatives Including the Aromatase Inhibitor Vorozole. SILVIA DIANI-MOORE, FOTINI PAPACHRISTOPOULOU, ERIN LABITZKE, AND ARLEEN B. RIFKIND

In Silico Prediction of Drug Binding to CYP2D6: Identification of a New Metabolite of Metoclopramide. JINGLEI YU, MARK J. I. PAINE, JEANDIDIER MARÉCHAL, CAROL A. KEMP, CLIVE J. WARD, SIMON BROWN, MICHAEL J. SUCLIFFE, GORDON C. K. ROBERTS, ELAINE M. RANKIN, AND C. ROLAND WOLF

Intravenously Administered Short Interfering RNA Accumulates in the Kidney and Selectively Suppresses Gene Function in Renal Proximal Tubules. FEMKE M. VAN DE WATER, OTTO C. BOERMAN, ALFONS C. WOUTERSE, JANNY G. P. PETERS, FRANS G. M. RUSSEL, AND ROSALINDA MASEJEK

The Environmental Pollutant and Carcinogen 3-Nitrobenzanthrone and Its Human Metabolite 3-Ami-

N-Glucuronidation of Perfluorooctanesulfonamide by Human, Rat, Dog, and Monkey Liver Microsomes and by Expressed Rat and Human UDP-Glucuronosyltransferases. LIN XU, DARI A M. KRENTSKY, ANDREW M. SEACAT, JOHN L. BUTENHOFF, THOMAS R. TEPILY, AND M. W. ANDERS

New Cytochrome P450 2D6*56 Allele Identified by Genotype/Phenotype Analysis of Cryopreserved Human Hepatocytes. LI LI, RUN-MEI PAN, TODD D. PORTER, NEIL S. JENSEN, PAUL SILBER, GUY RUSSO, JOHN A. TINE, JOHN HEIM, BARBARA RING, AND PETER J. WEDLUND

Covalent Binding of Radioactivity from [14C]Rofecoxib, But Not [14C]Celecoxib or [14C]CS-706, to the Arterial Elastin of Rats. MASATAKA OITATE, TAKASHI HIROTA, KUMIKO KOYAMA, SHIN-ICHI INAGOE, KENJI KAWAI, AND TOSHIHIKO IKEDA

Predominant Contribution of Organic Anion Transporting Polypeptide OATP-B (OATP2B1) to Apical Uptake of Estrone-3-sulfate by Human Intestinal Caco-2 Cells. YOSHIMICHI SAI, YOSUKE KANeko, SATsuki ITO, KEISuke MIzUOKA, YUKIO KATO, IKumi TAMAI, PER ARTURSSON, AND AkiRA TSUJI

Supplemental material is available online at http://dmd.aspetjournals.org.

About the cover: Confocal laser scanning microscopic analysis of immunocytochemical localization of OATP-B protein in Caco-2 cells. See the article by Sai et al. on page 1423 of this issue.