HIGHLIGHTED PAPERS

PERSPECTIVES IN PHARMACOLOGY

Anatomically Selective Serotonergic Type 1A and Serotonergic Type 2A Therapies for Parkinson’s Disease: An Approach to Reducing Dyskinesia without Exacerbating Parkinsonism?
Philippe Huot, Susan H. Fox, Adrian Newman-Tancredi, and Jonathan M. Brotchie

BEHAVIORAL PHARMACOLOGY

Facilitation of Hippocampal Synaptogenesis and Spatial Memory by C-Terminal Truncated Nle⁴-Angiotensin IV Analogs
Caroline C. Benoist, John W. Wright, Mingyan Zhu, Suzanne M. Appleyard, Gary A. Wayman, and Joseph W. Harding

Blockade of Endocannabinoid Hydrolytic Enzymes Attenuates Precipitated Opioid Withdrawal Symptoms in Mice

Patterns of Nicotinic Receptor Antagonism: Nicotine Discrimination Studies
Emily M. Jutkiewicz, Emily A. Brooks, Adam D. Kynaston, Kenner C. Rice, and James H. Woods

CARDIOVASCULAR

A Clopidogrel-Insensitive Inducible Pool of P2Y₁₂ Receptors Contributes to Thrombus Formation: Inhibition by Elinogrel, a Direct-Acting, Reversible P2Y₁₂ Antagonist
Helena Haberstock-Debic, Patrick Andre, Scott Mills, David R. Phillips, and Pamela B. Conley

Chymase Inhibition Reduces Infarction and Matrix Metalloproteinase-9 Activation and Attenuates Inflammation and Fibrosis after Acute Myocardial Ischemia/Reperfusion
Shizuo Oyamada, Cesario Bianchi, Shinji Takai, Louis M. Chu, and Frank W. Sellke

Glucocorticoids Improve Renal Responsiveness to Atrial Natriuretic Peptide by Up-Regulating Natriuretic Peptide Receptor-A Expression in the Renal Inner Medullary Collecting Duct in Decompensated Heart Failure
Chao Liu, Ying Chen, Yunxiao Kang, Zhihua Ni, Heming Xiu, Jing Guan, and Kunshen Liu

Enhanced Hemeoxygenase Activity in the Rostral Ventrolateral Medulla Mediates Exaggerated Hemin-Evoked Hypotension in the Spontaneously Hypertensive Rat
Noha N. Nassar, Guichu Li, Aurel L. Strat, and Abdel A. Abdel-Rahman

Inhibition of Smooth Muscle Myosin as a Novel Therapeutic Target for Hypertension
Xin Zhao, David Ho, Patricio Aburzua, Sunil K. Dhar, Xi Wang, Zhiheng Jia, Malar Pannirselvam, David J. Morgans, Fady I. Malik, and Stephen F. Vatner
Cellular and Molecular

Role of Vimentin in the Inhibitory Effects of Low-Molecular-Weight Heparin on PC-3M Cell Adhesion to, and Migration through, Endothelium

Yan Pan, Tianluo Lei, Bao Teng, Jihong Liu, Jianzhao Zhang, Yu An, Yuan Xiao, Jing Han, Xueyang Pan, Junhua Wang, Heming Yu, Hong Ren, and Xuejun Li

Influence of Tissue Integrity on Pharmacological Phenotypes of Muscarinic Acetylcholine Receptors in the Rat Cerebral Cortex

Abu Syed Md Anisuzzaman, Atsushi Nishimune, Hatsumi Yoshiki, Junsuke Uwada, and Ikunobu Muramatsu

Caffeic Acid 3,4-Dihydroxy-Phenethyl Ester Induces Cancer Cell Senescence by Suppressing Twist Expression

Anliang Dong, Yuanzhang Fang, Li Zhang, Yuan Xie, Xian Wu, Lipeng Zhang, Xiaoyuan Lian, Yihua Chen, Jian Luo, and Mingyao Liu

Nonsteroidal Anti-Inflammatory Drug Flufenamic Acid Is a Potent Activator of AMP-Activated Protein Kinase

Yuan Chi, Kai Li, Qiaoqing Yan, Schuichi Koizumi, Liyi Shi, Shuhei Takahashi, Ying Zhu, Hiroyuki Matsue, Masayuki Takeda, Masanori Kitamura, and Jian Yao

Drug Discovery and Translational Medicine

Regulation of Ingestive Behaviors in the Rat by GSK1521498, a Novel μ-Opioid Receptor-Selective Inverse Agonist

Diane M. Ignar, Aaron S. Goetz, Kimberly Nichols Noble, Luz Carballo, Andrea E. Stroup, Julie C. Fisher, Joyce A. Boucheron, Tracy A. Brainard, Andrew L. Larkin, Andrea H. Epperly, Todd W. Shearer, Scott D. Sorensen, Jason D. Speake, and Jonathan D. Hommel

Pharmacologic Inhibition of Ghrelin Receptor Signaling Is Insulin Sparing and Promotes Insulin Sensitivity

Kenneth A. Longo, Elizabeth K. Govek, Anna Nolan, Thomas McDonagh, Soratree Charoenthongtrakul, Derek J. Giuliana, Kristen Morgan, Jeffrey Hixon, Choaeng Zhou, Bruce Kelder, John J. Kopchick, Jeffrey O. Saunders, Manuel A. Navia, Rory Curtis, Peter S. DiStefano, and Brad J. Geddes

Drug Targeting to Monocytes and Macrophages Using Esterase-Sensitive Chemical Motifs


ENZYMES AND METABOLISM

Novel N-1,2-Dihydroxypropyl Analogs of Lobelane Inhibit Vesicular Monoamine Transporter-2 Function and Methamphetamine-Evoked Dopamine Release

David B. Horton, Kiran B. Siripurapu, Guangrong Zheng, Peter A. Crooks, and Linda P. Dwoskin

AZD9668: Pharmacological Characterization of a Novel Oral Inhibitor of Neutrophil Elastase


ENDOCRINE AND DIABETES

TA-K875, an Orally Available G Protein-Coupled Receptor 40/Free Fatty Acid Receptor 1 Agonist, Enhances Glucose-Dependent Insulin Secretion and Improves Both Postprandial and Fasting Hyperglycemia in Type 2 Diabetic Rats

Yoshiyuki Tsujihata, Ryo Ito, Masami Suzuki, Ayako Harada, Nobuyuki Negoro, Tsuneo Yasuma, Yu Momose, and Koji Takeuchi

GASTROINTESTINAL, HEPATIC, PULMONARY, AND RENAL

Glycyrhrizin Prevents Liver Injury by Inhibition of High-Mobility Group Box 1 Production by Kupffer Cells after Ischemia-Reperfusion in Rats

Masahiro Ogita, Hiroshi Kono, Michio Haru, Masato Tsuchiya, and Hideki Fujii

Omeprazole Attenuates Hyperoxic Lung Injury in Mice via Aryl Hydrocarbon Receptor Activation and Is Associated with Increased Expression of Cytochrome P4501A Enzymes

Binoy Shivanna, Weiwu Jiang, Lihua Wang, Xanthi I. Couroucli, and Bhagavatula Moorathy

Signaling in H2O2-Induced Increase in Cell Proliferation in Barrett’s Esophageal Adenocarcinoma Cells

Xiaoxu Zhou, Dan Li, Murray B. Resnick, Jose Behar, Jack Wands, and Weibiao Cao

Thromboxane Prostanoid Receptor Activation Amplifies Airway Stretch-Activated Contractions Assessed in Perfused Intact Bovine Bronchial Segments

Jeremy Mark Hernandez and Luke Jeffrey Janssen

Copper Deficiency Exacerbates Bile Duct Ligation-Induced Liver Injury and Fibrosis in Rats

Ming Song, Zhaxiang Zhou, Theresa Chen, Jingwen Zhang, and Craig J. McClain
INFLAMMATION, IMMUNOPHARMACOLOGY, AND ASTHMA

Inhibition of Neutrophil Apoptosis via Sphingolipid Signaling in Acute Lung Injury
Wei-Chieh Lin, Chiou-Feng Lin, Chia-Ling Chen, Chang-Wen Chen, and Yee-Shin Lin

Distinct Effects of Imperatorin on Allergic Rhinitis: Imperatorin Inhibits Caspase-1 Activity In Vivo and In Vitro
Hyun-A Oh, Hyung-Min Kim, and Hyun-Ja Jeong

METABOLISM, TRANSPORT, AND PHARMACOGENOMICS

Genetic Variants in Cytosolic 5’-Nucleotidase II Are Associated with Its Expression and Cytarabine Sensitivity in HapMap Cell Lines and in Patients with Acute Myeloid Leukemia

NEUROPHARMACOLOGY

Antagonist Functional Selectivity: 5-HT2A Serotonin Receptor Antagonists Differentially Regulate 5-HT2A Receptor Protein Level In Vivo
Prem N. Yadav, Wesley K. Kroeze, Martilias S. Farrell, and Bryan L. Roth

Varenicline Is a Potent Agonist of the Human 5-Hydroxytryptamine3 Receptor
S. C. R. Lummis, A. J. Thompson, M. Bencherif, and H. A. Lester

Afobazole Modulates Neuronal Response to Ischemia and Acidosis via Activation of α-1 Receptors
Javier Cuevas, Adam Behensky, Wei Deng, and Christopher Katnik

Afobazole Modulates Microglial Function via Activation of Both α-1 and α-2 Receptors
Javier Cuevas, Alex Rodriguez, Adam Behensky, and Chris Katnik

Patterns of Brain Glucose Metabolism Induced by Phosphodiesterase 10A Inhibitors in the Mouse: A Potential Translational Biomarker
Stefanie Dedeurwaerdere, Cindy Wintmolders, Greet Vanhoof, and Xavier Langlois

Serotonin Transporter Occupancy in Rats Exposed to Serotonin Reuptake Inhibitors In Utero or via Breast Milk
Catherine F. Capello, Chase H. Bourke, James C. Ritchie, Zachary N. Stowe, D. Jeffrey Newport, Amanda Nemeroff, and Michael J. Owens

TOXICOLOGY

Generation and Characterization of a Cyp2f2-Null Mouse and Studies on the Role of CYP2F2 in Naphthalene-Induced Toxicity in the Lung and Nasal Olfactory Mucosa
Lei Li, Yuan Wei, Laura Van Winkle, Qing-Yu Zhang, Xin Zhou, Jinping Hu, Fang Xie, Kerri Kluetzman, and Xinxin Ding

ERRATUM

Correction to “Novel Peptide Antagonists of Adrenomedullin and Calcitonin Gene-Related Peptide Receptors: Identification, Pharmacological Characterization, and Interactions with Position 74 in Receptor Activity-Modifying Protein 1/3”

About the cover: Effects of IPT on eosinophil and mast cell infiltration and IL-1β expression in the AR nasal mucosa tissue. See the article by Oh et al. on page 72 of this issue.