**HIGHLIGHTED PAPERS**

1 **PERPECTIVES IN PHARMACOLOGY**

Mechanisms of Cadmium-Induced Proximal Tubule Injury: New Insights with Implications for Biomonitoring and Therapeutic Interventions

*Walter C. Prozialeck and Joshua R. Edwards*

2 **BEHAVIORAL PHARMACOLOGY**

Roles of µ-Opioid Receptors and Nociceptin/Orphanin FQ Peptide Receptors in Buprenorphine-Induced Physiological Responses in Primates

*Colette M. Cremeans, Erin Grauley, Donald J. Kyle, and Mei-Chuan Ko*

Antagonism of Metabotropic Glutamate 1 Receptors Attenuates Behavioral Effects of Cocaine and Methamphetamine in Squirrel Monkeys

*Cindy Achat-Mendes, Donna M. Platt, and Roger D. Spearman*

214 **CARDIOVASCULAR**

Carvedilol Enhances Mesenchymal Stem Cell Therapy for Myocardial Infarction via Inhibition of Caspase-3 Expression

*Fatemat Hassan, Sarath Meduru, Kazaaki Taguchi, M. Lakshmi Kuppasamy, Mahmoud Mostafa, Periannan Kuppasamy, and Mahmoud Khan*

Aldehyde Dehydrogenase Type 2 Activation by Adenosine and Histamine Inhibits Ischemic Norepinephrine Release in Cardiac Sympathetic Neurons: Mediation by Protein Kinase Cε

*Pablo A. Robador, Nahid Seyedi, Noel Yan-Ki Chan, Kenichiro Koda, and Roberto Levi*

Acute Myocardial Infarction Inhibits the Neurogenic Tachycardic and Vasopressor Response in Rats via Presynaptic Cannabinoid Type 1 Receptor

*Radosław Rudź, Eberhard Schlicker, Urszula Baranowska, Justyna Marciniak, Piotr Karabowicz, and Barbara Malinowska*

Rosiglitazone Improves Insulin Sensitivity and Baroreflex Gain in Rats with Diet-Induced Obesity

*Ding Zhao, Belinda H. McCall, and Virginia L. Brooks*

**CELLULAR AND MOLECULAR**

Structural Changes of Regulatory Domain Heterodimer of N-Methyl-D-aspartate Receptor Subunits GluN1 and GluN2B through the Binding of Spermine and Hynprodil

*Hideyuki Tomitori, Akiko Suganami, Ryotaro Satki, Satomi Mizuno, Yuki Yoshizawa, Takashi Masuko, Yutaka Tamura, Kazuhiro Nishimura, Toshikiko Toida, Keith Williams, Keiko Kashiwagi, and Kazuei Igarashi*

Modulation of Inflammation by Cicaderma Ointment Accelerates Skin Wound Healing

*Christophe Morin, Audrey Roumegous, Gilles Carpentier, Véronique Barbier-Chassefière, Laure Garrigue-antar, Stéphane Caredda, and José Courty*

Cannabinoid Receptor Activation Correlates with the Proapoptotic Action of the β2-Adrenergic Agonist (R,R’)-4-Methoxy-1-Naphthylfenoterol in HepG2 Hepatocarcinoma Cells

*Rajib K. Paul, Anuradha Ramamoorthy, Jade Scheers, Robert P. Wersto, Lawrence Toll, Lucita Jimenez, Michel Bernard, and Irving W. Wainer*

Δ9,11 Modification of Glucocorticoids Dissociates Nuclear Factor-κB Inhibitory Efficacy from Glucocorticoid Response Element-Associated Side Effects

*Andreas R. Baudy, Erica K. M. Reeves, Jesse M. Damsker, Christopher Heier, Lindsay M. Garvin, Blythe C. Dillingham, John McCall, Sree Rayavarapu, Zayi Wang, Jack H. Vandermeulen, Arpana Sali, Vanessa Jahnke, Stephanie Duguez, Debra DuBois, Mary C. Rose, Kanemboyna Nagaraju, and Eric P. Hoffman*
The Anti-Inflammatory Fungal Compound (S)-Curvularin Reduces Proinflammatory Gene Expression in an In Vivo Model of Rheumatoid Arthritis

Nadine Schmidt, Julia Art, Ingrid Forsch, Anke Werner, Gerhard Erkel, Mathias Jung, Sven Horke, Hartmut Kleinert, and Andrea Pautz

A Potent and Selective Metabotropic Glutamate Receptor 4 Positive Allosteric Modulator Improves Movement in Rodent Models of Parkinson’s Disease

Emmanuel Le Poul, Christelle Boléa, Françoise Girard, Sonia Poli, Delphine Charvin, Brice Campo, Julien Bortoli, Abdhelak Bassif, Bin Luo, Amy Jo Koser, Lisa M. Hodge, Karen M. Smith, Anthony G. DiLella, Nigel Liverton, Fred Hess, Susan E. Browne, and Ian J. Reynolds

Sepantronium Bromide (YM155) Enhances Response of Human B-Cell Non-Hodgkin Lymphoma to Rituximab

Aya Kita, Keisuke Mitsuoka, Naoki Kaneko, Masahiro Nakata, Kentaro Yamanaka, Makoto Jitsuoka, Susuke Miyoshi, Akihiro Noda, Masamichi Mor, Takahito Nakahara, and Masao Sasamata

Chronic Treatment with a Broad-Spectrum Metalloproteinase Inhibitor, Doxycycline, Prevents the Development of Spontaneous Aortic Lesions in a Mouse Model of Vascular Ehlers-Danlos Syndrome

Hyun-Jin Tae, Shannon Marshall, Jing Zhang, Mingyi Wang, Wilfried Briest, and Mark I. Talan

Diabetes-Induced Renal Injury in Rats Is Attenuated by Suramin

Midhun C. Korrapati, Brooke E. Shaner, Benjamin A. Neely, Joseph L. Alge, John M. Arthur, and Rick G. Schnellmann

Activation of Neurokinin-1 Receptors Increases the Excitability of Guinea Pig Dorsal Root Ganglion Cells

Xiulin Zhang, Claudio Pietra, Emanuela Lovati, and William C. de Groat

Involvement of Serine Protease and Proteinase-Activated Receptor 2 in Dermatophyte-Associated Itch in Mice

Tsugunobu Andoh, Yusuake Takayama, Takako Yamakoshi, Jung-Bum Lee, Ayako Sano, Tadamichi Shimizu, and Yasushi Kuraishi

Inhibiting Glycogen Synthase Kinase-3 Decreases 12-O-Tetradecanoylphorbol-13-Acetate-Induced Interferon-γ-Mediated Skin Inflammation

Chia-Yuan Hsieh, Chia-Ling Chen, Cheng-Chieh Tsai, Wei-Ching Huang, Po-Chun Tseng, Yee-Shin Lin, Shun-Hua Chen, Tae-Wah Wong, Pui-Ching Choi, and Chiu-Feng Lin

Proteasome Inhibition Reduces Proliferation, Collagen Expression, and Inflammatory Cytokine Production in Nasal Mucosa and Polyp Fibroblasts

Laura Pujols, Laura Fernández-Bertolín, Mireya Fuentes-Prado, Isam Alobid, Jordi Roca-Ferrer, Neus Agell, Joaquín Mullol, and César Picado

P-Glycoprotein Is a Major Determinant of Norbuprenorphine Brain Exposure and Antinociception

Sarah M. Brown, Scott D. Campbell, Amanda Crafford, Karen J. Regina, Michael J. Holtzman, and Evan D. Kharasch

In Vitro Evaluation of Major In Vivo Drug Metabolic Pathways Using Primary Human Hepatocytes and HepaRG Cells in Suspension and a Dynamic Three-Dimensional Bioreactor System

Malin Darnell, Maria Ulvestad, Ewa Ellis, Lars Weidolf, and Tommy B. Andersson

Evaluation of Organic Anion-Transporting Polypeptide 1B1 and CYP3A4 Activities in Primary Human Hepatocytes and HepaRG Cells Cultured in a Dynamic Three-Dimensional Bioreactor System

Maria Ulvestad, Malin Darnell, Espen Molden, Ewa Ellis, Anders Åsberg, and Tommy B. Andersson

Antagonism of Supraspinal Histamine H3 Receptors Modulates Spinal Neuronal Activity in Neuropathic Rats

Steve McGaraughty, Katharine L. Chu, Marlon D. Cowart, and Jorge D. Brioni
Effect of Fasudil, a Selective Inhibitor of Rho Kinase Activity, in the Secondary Injury Associated with the Experimental Model of Spinal Cord Trauma

Daniela Impellizzeri, Emanuela Mazzon, Irene Paterniti, Emanuela Esposito, and Salvatore Cuzzocrea

Pharmacological Properties and Procognitive Effects of ABT-288, a Potent and Selective Histamine H$_3$ Receptor Antagonist


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

About the cover: Modeling of spermine and ifenprodil binding to GluN1R and GluN2BR monomers. See the article by Tomitori et al. on page 82 of this issue.