

# Biological Psychiatry

A Journal of Psychiatric Neuroscience and Therapeutics

Volume 76, Number 10, November 15, 2014

## ABUSE OF COCAINE AND OPIATES

### IN THIS ISSUE – NOVEMBER 15TH

---

**759** A brief summary of the articles appearing in this issue of *Biological Psychiatry*.

### COMMENTARIES

---

**760** How Does Stress-Induced Activation of the Kappa Opioid System Increase Addiction Risk?

*Charles Chavkin and Jonathan M. Ehrich*

» See companion article on page 785

**763** Reductions of p11 and 5-HT1B Receptor Availability in Limbic Brain Regions in Cocaine Dependence

*Per Svenningsson*

» See companion articles on pages 794 and 816

**765** More Cocaine—More Glutamate—More Addiction

*Cassandra D. Gipson and Peter W. Kalivas*

» See companion article on page 810

### ARCHIVAL REPORTS

---

**767** Loss of Morphine Reward and Dependence in Mice Lacking G Protein–Coupled Receptor Kinase 5

*Laura Glück, Anastasia Loktev, Lionel Moulédous, Catherine Mollereau, Ping-Yee Law, and Stefan Schulz*

**775** *Neurod1* Modulates Opioid Antinociceptive Tolerance via Two Distinct Mechanisms

*Wen Li, Songwei He, Yuye Zhou, Yuan Li, Jianbang Hao, Xingru Zhou, Feng Wang, Yang Zhang, Zhenhua Huang, Zhiyuan Li, Horace H. Loh, Ping-Yee Law, and Hui Zheng*

**785** Poststress Block of Kappa Opioid Receptors Rescues Long-Term Potentiation of Inhibitory Synapses and Prevents Reinstatement of Cocaine Seeking

*Abigail M. Polter, Rachel A. Bishop, Lisa A. Briand, Nicholas M. Graziane, R. Christopher Pierce, and Julie A. Kauer*  
» See commentary on page 760

**794** Cell-Type Specific Expression of p11 Controls Cocaine Reward

*Margarita Arango-Lievano, Justin T. Schwarz, Mary Vernov, Matthew B. Wilkinson, Kathryn Bradbury, Akira Feliz, Roberta Marongiu, Yaroslav Gelfand, Jennifer Warner-Schmidt, Eric J. Nestler, Paul Greengard, Scott J. Russo, and Michael G. Kaplitt*  
» See commentary on page 763

**802 Preference for Distinct Functional Conformations of the Dopamine Transporter Alters the Relationship between Subjective Effects of Cocaine and Stimulation of Mesolimbic Dopamine**

*Stephen J. Kohut, Takato Hiranita, Soo-Kyung Hong, Aaron L. Ebbs, Valeria Tronci, Jennifer Green, Linda Garcés-Ramírez, Lauren E. Chun, Maddalena Mereu, Amy H. Newman, Jonathan L. Katz, and Gianluigi Tanda*

**810 A Shift in the Role of Glutamatergic Signaling in the Nucleus Accumbens Core With the Development of an Addicted Phenotype**

*Susan E. Doyle, Carolina Ramôa, Garrett Garber, Joshua Newman, Zeeshan Toor, and Wendy J. Lynch*

» See commentary on page 765

**816 Reductions in Brain 5-HT<sub>1B</sub> Receptor Availability in Primarily Cocaine-Dependent Humans**

*David Matuskey, Zubin Bhagwagar, Beata Planeta, Brian Pittman, Jean-Dominique Gallezot, Jason Chen, Jane Wanyiri, Soheila Najafzadeh, Jim Ropchan, Paul Geha, Yiyun Huang, Marc N. Potenza, Alexander Neumeister, Richard E. Carson, and Robert T. Malison*

» See commentary on page 763

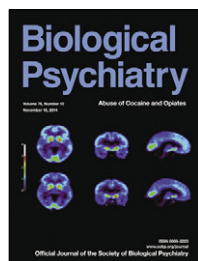
**823 Selective Overexpression of Dopamine D3 Receptors in the Striatum Disrupts Motivation but not Cognition**

*Eleanor H. Simpson, Vanessa Winiger, Dominik K. Biezonski, Iram Haq, Eric R. Kandel, and Christoph Kellendonk*

**ERRATUM**

---

**832 Erratum to: Deep Repetitive Transcranial Magnetic Stimulation for Smoking Cessation: Is Going Deeper Better?**



On the cover are averaged whole brain parametric positron emission tomography images for healthy control subjects (top row) and cocaine-dependent subjects (bottom row) from Matuskey *et al.* (in this issue; pages 816-822; see Figure S2). The scale bar denotes [<sup>11</sup>C]P943 regional binding potential. The authors found reductions in brain 5-HT<sub>1B</sub> receptor availability in the anterior cingulate, hypothalamus, and frontal cortex in individuals with cocaine dependence, compared with controls.