Cover legend: The pond snail *Lymnaea stagnalis* can learn taste aversion and consolidate this learning into long-term memory called conditioned taste aversion (CTA). Some molluscan insulin-related peptides (MIPs) are up-regulated in snails exhibiting CTA, and when MIPs are applied to the isolated CNS, a long-term change in synaptic efficacy of the synaptic connection between a key interneuron for CTA and a buccal motor neuron occurs. This synaptic enhancement may be the neural correlate of behavioral CTA. For more information, see the article by Murakami et al. (pages 371–383).
DEVELOPMENT/PLASTICITY/REPAIR

234 Effects of Digesting Chondroitin Sulfate Proteoglycans on Plasticity in Cat Primary Visual Cortex
Vasily Vorobyov, Jessica C.F. Kwok, James W. Fawcett, and Frank Sengpiel

244 FoxP2 Regulates Neurogenesis during Embryonic Cortical Development
David Tsui, John P. Vessey, Hideaki Tomita, David R. Kaplan, and Freda D. Miller

259 Rax Is a Selector Gene for Mediobasal Hypothalamic Cell Types
Fuqu Lu, Deepon Kar, Nicole Gruenig, Zi Wei Zhang, Nicole Cousins, Helen M. Rodgers, Eric C. Swindell, Milan Jamrich, Carol Schuurmans, Peter H. Mathers, and Deborah M. Kurreasch

273 Mechanosensitive TRPC1 Channels Promote Calpain Proteolysis of Talin to Regulate Spinal Axon Outgrowth
Patrick C. Kerstein, Bridget T. Jacques-Fricke, Juliana Rengifo, Brian J. Mogen, Justin C. Williams, Philip A. Gottlieb, Fredrick Sachs, and Timothy M. Gomez

305 Src Inhibits Midline Axon Crossing Independent of Frazzled/Deleted in Colorectal Carcinoma (DCC) Receptor Tyrosine Phosphorylation
Michael P. O’Donnell and Greg J. Bashaw

371 Involvement of Insulin-Like Peptide in Long-Term Synaptic Plasticity and Long-Term Memory of the Pond Snail Lymnaea stagnalis
Jun Murakami, Ryuichi Okada, Hisayo Sadamoto, Suguru Kobayashi, Koichi Mita, Yuki Sakamoto, Miki Yamagishi, Dai Hatakeyama, Emi Otsuka, Akiko Okuta, Hiroshi Sunada, Satoshi Takigami, Manabu Sakakibara, Yutaka Fujito, Masahiko Awaji, Shunsuke Moriyama, Ken Lukowiak, and Etsuro Ito

SYSTEMS/CIRCUITS

4 Chromatic Processing in the Anterior Optic Tubercle of the Honey Bee Brain
Theo Mota, Wulfla Gronenberg, Martin Giurfa, and Jean-Christophe Sandoz

17 No Consistent Relationship between Gamma Power and Peak Frequency in Macaque Primary Visual Cortex
Xiaoxuan Jia, Dajun Xing, and Adam Kohn

26 Periadolescent Exposure to the NMDA Receptor Antagonist MK-801 Impairs the Functional Maturation of Local GABAergic Circuits in the Adult Prefrontal Cortex
Daniel R. Thomases, Daryn K. Cass, and Kuei Y. Tseng

35 Transsynaptic Tracing with Vesicular Stomatitis Virus Reveals Novel Retinal Circuitry
Kevin T. Beier, Bart G. Borghuis, Rana N. El-Danaf, Andrew D. Huberman, Jonathan B. Demb, and Constance L. Cepko

52 Signals for Previous Goal Choice Persist in the Dorsomedial, but Not Dorsolateral Striatum of Rats
Hoseok Kim, Daeyeol Lee, and Min Whan Jung

79 Testing the Sorption Hypothesis in Olfaction: A Limited Role for Sniff Strength in Shaping Primary Odor Representations During Behavior
Tristan Cenier, John P. McGann, Yusuke Tsuno, Justus V. Verhagen, and Matt Wachowiak

93 Functional Differentiation of a Population of Electrically Coupled Heterogeneous Elements in a Microcircuit
Kosei Sasaki, Elizabeth C. Cropper, Klaudiusz R. Weiss, and Jian Jing

106 Different Orientation Tuning of Near- and Far-Surround Suppression in Macaque Primary Visual Cortex Mirrors Their Tuning in Human Perception
S. Shushruth, Lauri Nurminen, Maryam Bijanzadeh, Jennifer M. Ichida, Simo Vanni, and Alessandra Angelucci
120 Alert Response to Motion Onset in the Retina
Eric Y. Chen, Olivier Marre, Clark Fisher, Greg Schwartz, Joshua Levy, Rava Azeredo da Silveira, and Michael J. Berry II

133 Short-Term Plasticity Explains Irregular Persistent Activity in Working Memory Tasks
David Hansel and German Mato

214 Optogenetic Inhibition of Dorsal Medial Prefrontal Cortex Attenuates Stress-Induced Reinstatement of Palatable Food Seeking in Female Rats
Donna J. Calu, Alex B. Kawa, Nathan J. Marchant, Brittany M. Navarre, Mark J. Henderson, Billy Chen, Hau-Jie Yau, Jennifer M. Bossert, Geoffrey Schoenbaum, Karl Deisseroth, Brandon K. Harvey, Bruce T. Hope, and Yavin Shaham

227 Individual Differences in White Matter Diffusion Affect Sleep Oscillations
Giovanni Piantoni, Simon-Shlomo Poil, Klaus Linkenkaer-Hansen, Ilse M. Verweij, Jennifer R. Ramautar, Eus J. W. Van Someren, and Ysbrand D. Van Der Werf

BEHAVIORAL/COGNITIVE

72 Perceiving Threat In the Face of Safety: Excitation and Inhibition of Conditioned Fear in Human Visual Cortex
Vladimir Miskovic and Andreas Keil

156 Why Mental Arithmetic Counts: Brain Activation during Single Digit Arithmetic Predicts High School Math Scores
Gavin R. Price, Michèle M. M. Mazzocco, and Daniel Ansari

164 Neuroestrogens Rapidly Regulate Sexual Motivation But Not Performance
Aurore L. Seredynski, Jacques Balthazart, Virginie J. Christophe, Gregory F. Ball, and Charlotte A. Cornil

286 DRD4 Genotype Predicts Longevity in Mouse and Human

344 Impulsivity and Self-Control during Intertemporal Decision Making Linked to the Neural Dynamics of Reward Value Representation
Koji Jimura, Maria S. Chushak, and Todd S. Braver

NEUROBIOLOGY OF DISEASE

315 Phentypotyping the Function of TRPV1-Expressing Sensory Neurons by Targeted Axonal Silencing
Christian Brenneis, Katrin Kistner, Michelino Puopolo, David Segal, David Roberson, Marco Sisignano, Sandra Labocha, Nerea Ferreirós, Amanda Strominger, Enrique J. Cobos, Nader Ghasemlou, Gerd Geisslinger, Peter W. Reeh, Bruce P. Bean, and Clifford J. Woolf
Specific Inhibition of p25/Cdk5 Activity by the Cdk5 Inhibitory Peptide Reduces Neurodegeneration In Vivo


The Pro-Neurotrophin Receptor Sortilin Is a Major Neuronal Apolipoprotein E Receptor for Catabolism of Amyloid-β Peptide in the Brain

Anne-Sophie Carlo, Camilla Gustafsen, Guido Mastrobuoni, Morten S. Nielsen, Tilman Burgert, Daniela Hartl, Michael Rohe, Anders Nykjaer, Joachim Herz, Joerg Heeren, Stefan Kempa, Claus Munck Petersen, and Thomas E. Willnow

Correction: The article “Synaptic Basis for Developmental Plasticity in a Birdsong Nucleus” by Richard Mooney appeared on pages 2464–2477 of the July 1, 1992 issue. A correction for that article appears on page 384.

Persons interested in becoming members of the Society for Neuroscience should contact the Membership Department, Society for Neuroscience, 1121 14th St., NW, Suite 1010, Washington, DC 20005, phone 202-962-4000.

Instructions for Authors are available at http://www.jneurosci.org/misc/itoa.shtml. Authors should refer to these Instructions online for recent changes that are made periodically.

Brief Communications Instructions for Authors are available via Internet (http://www.jneurosci.org/misc/ifla_bc.shtml).

Submissions should be submitted online using the following url: http://jneurosci.msubmit.net. Please contact the Central Office, via phone, fax, or e-mail with any questions. Our contact information is as follows: phone, 202-962-4000; fax, 202-962-4945; e-mail, jn@sfn.org.