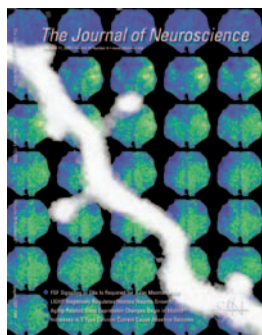


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Cover legend: Two-photon image of a GFP-labeled layer 5 dendrite superimposed onto a montage showing whole-brain cortical responses to forelimb stimulation after stroke. For more information, see the article by Brown et al. in this issue (pages 1719–1734).

i This Week in The Journal

Journal Club

- 1597 **Top-Down Influences of Spatial Attention in Visual Cortex**
Seth E. Bouvier

Brief Communications

- 1608 **Disruption of Fibroblast Growth Factor Receptor Signaling in Nonmyelinating Schwann Cells Causes Sensory Axonal Neuropathy and Impairment of Thermal Pain Sensitivity**
Miki Furusho, Jeffrey L. Dupree, Melissa Bryant, and Rashmi Bansal
- 1855 **Altered Sensitivity to Rewarding and Aversive Drugs in Mice with Inducible Disruption of cAMP Response Element-Binding Protein Function within the Nucleus Accumbens**
Jennifer A. DiNieri, Christina L. Nemeth, Aram Parsegian, Tiffany Carle, Vsevolod V. Gurevich, Eugenia Gurevich, Rachael L. Neve, Eric J. Nestler, and William A. Carlezon Jr

Articles

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- 1626 **Probing Protein Packing Surrounding the Residues in and Flanking the Nicotinic Acetylcholine Receptor M2M3 Loop**
Roger Ernest Wiltfong and Michaela Jansen
- 1743 **Astrocytic Plasticity and Patterned Oxytocin Neuronal Activity: Dynamic Interactions**
Yu-Feng Wang and Glenn I. Hatton
- 1755 **Changes in Expression and Function of Extrasynaptic GABA_A Receptors in the Rat Hippocampus during Pregnancy and after Delivery**
Enrico Sanna, Maria Cristina Mostallino, Luca Murru, Mario Carta, Giuseppe Talani, Stefano Zucca, Maria Luisa Mura, Elisabetta Maciocco, and Giovanni Biggio
- 1773 **Pharmacological Inhibition of mTORC1 Suppresses Anatomical, Cellular, and Behavioral Abnormalities in Neural-Specific *Pten* Knock-Out Mice**
Jing Zhou, Jacqueline Blundell, Shiori Ogawa, Chang-Hyuk Kwon, Wei Zhang, Christopher Sinton, Craig M. Powell, and Luis F. Parada

DEVELOPMENT/PLASTICITY/REPAIR

- 1599 **Developmental Regulation of Sensory Neurite Growth by the Tumor Necrosis Factor Superfamily Member LIGHT**
Núria Gavalda, Humberto Gutierrez, and Alun M. Davies
- 1636 **Sensitization of Cutaneous Nociceptors after Nerve Transection and Regeneration: Possible Role of Target-Derived Neurotrophic Factor Signaling**
Michael P. Jankowski, Jeffrey J. Lawson, Sabrina L. McIlwraith, Kristofer K. Rau, Collene E. Anderson, Kathryn M. Albers, and H. Richard Koerber

- 1719 ***In Vivo* Voltage-Sensitive Dye Imaging in Adult Mice Reveals That Somatosensory Maps Lost to Stroke Are Replaced over Weeks by New Structural and Functional Circuits with Prolonged Modes of Activation within Both the Peri-Infarct Zone and Distant Sites**
Craig E. Brown, Khatereh Aminoltejari, Heidi Erb, Ian R. Winship, and Timothy H. Murphy
- 1826 **Prolactin Prevents Chronic Stress-Induced Decrease of Adult Hippocampal Neurogenesis and Promotes Neuronal Fate**
Luz Torner, Sandra Karg, Annegret Blume, Mahesh Kandasamy, Hans-Georg Kuhn, Jürgen Winkler, Ludwig Aigner, and Inga D. Neumann
- 1874 ***Pten* Deletion in Adult Neural Stem/Progenitor Cells Enhances Constitutive Neurogenesis**
Caroline Gregorian, Jonathan Nakashima, Janel Le Belle, John Ohab, Rachel Kim, Annie Liu, Kate Barzan Smith, Matthias Groszer, A. Denise Garcia, Michael V. Sofroniew, S. Thomas Carmichael, Harley I. Kornblum, Xin Liu, and Hong Wu
- 1904 **Endoamin Diversity in the *Drosophila* Dscam and Its Roles in Neuronal Morphogenesis**
Hung-Hsiang Yu, Jacob S. Yang, Jian Wang, Yaling Huang, and Tzumin Lee

BEHAVIORAL/SYSTEMS/COGNITIVE

- 1648 **Neural Activity Associated with the Passive Prediction of Ambiguity and Risk for Aversive Events**
Dominik R. Bach, Ben Seymour, and Raymond J. Dolan
- 1670 **Population Encoding by Circadian Clock Neurons Organizes Circadian Behavior**
Christopher M. Ciarleglio, Karen L. Gamble, John C. Axley, Benjamin R. Strauss, Jeremiah Y. Cohen, Christopher S. Colwell, and Douglas G. McMahon
- 1688 **Adaptive Estimation of Three-Dimensional Structure in the Human Brain**
Tim J. Preston, Zoe Kourtzi, and Andrew E. Welchman
- 1699 **Dynamic and Task-Dependent Encoding of Speech and Voice by Phase Reorganization of Cortical Oscillations**
Milene Bonte, Giancarlo Valente, and Elia Formisano
- 1707 **Oxidative Neuroenergetics in Event-Related Paradigms**
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- 1735 **Synaptic Overflow of Dopamine in the Nucleus Accumbens Arises from Neuronal Activity in the Ventral Tegmental Area**
Leslie A. Sombers, Manna Beyene, Regina M. Carelli, and R. Mark Wightman
- 1766 **Neural Correlates of Overcoming Interference from Instructed and Implemented Stimulus-Response Associations**
Marcel Brass, Dorit Wenke, Stephanie Spengler, and Florian Waszak
- 1784 **Effects of Sustained Spatial Attention in the Human Lateral Geniculate Nucleus and Superior Colliculus**
Keith A. Schneider and Sabine Kastner
- 1805 **Hippocampal and Cognitive Aging across the Lifespan: A Bioenergetic Shift Precedes and Increased Cholesterol Trafficking Parallels Memory Impairment**
Inga Kadish, Olivier Thibault, Eric M. Blalock, Kuey-C. Chen, John C. Gant, Nada M. Porter, and Phillip W. Landfield
- 1817 **Following One's Heart: Cardiac Rhythms Gate Central Initiation of Sympathetic Reflexes**
Marcus A. Gray, Karin Rylander, Neil A. Harrison, B. Gunnar Wallin, and Hugo D. Critchley

- 1834 **Slow Conductances Could Underlie Intrinsic Phase-Maintaining Properties of Isolated Lobster (*Panulirus interruptus*) Pyloric Neurons**
Scott L. Hooper, Einat Buchman, Adam L. Weaver, Jeffrey B. Thuma, and Kevin H. Hobbs
- 1846 **Induction of Toll-Like Receptor 9 Signaling as a Method for Ameliorating Alzheimer's Disease-Related Pathology**
Henrieta Scholtzova, Richard J. Kascsak, Kristyn A. Bates, Allal Boutajangout, Daniel J. Kerr, Harry C. Meeker, Pankaj D. Mehta, Daryl S. Spinner, and Thomas Wisniewski
- 1897 **Viral Vector-Mediated Overexpression of Estrogen Receptor- α in Striatum Enhances the Estradiol-Induced Motor Activity in Female Rats and Estradiol-Modulated GABA Release**
Kristin N. Schultz, Silke A. von Esenwein, Ming Hu, Amy L. Bennett, Robert T. Kennedy, Sergei Musatov, C. Dominique Toran-Allerand, Michael G. Kaplitt, Larry J. Young, and Jill B. Becker
- 1915 **Stability of Output Effects from Motor Cortex to Forelimb Muscles in Primates**
Darcy M. Griffin, Heather M. Hudson, Abderraouf Belhaj-Saïf, and Paul D. Cheney
- 1928 **Hand Orientation during Reach-to-Grasp Movements Modulates Neuronal Activity in the Medial Posterior Parietal Area V6A**
Patrizia Fattori, Rossella Breveglieri, Nicoletta Marzocchi, Daniela Filippini, Annalisa Bosco, and Claudio Galletti
- 1937 **Role of p11 in Cellular and Behavioral Effects of 5-HT₄ Receptor Stimulation**
Jennifer L. Warner-Schmidt, Marc Flajolet, Abigail Maller, Emily Y. Chen, Hongshi Qi, Per Svenningsson, and Paul Greengard

NEUROBIOLOGY OF DISEASE

- 1615 **Genetic Enhancement of Thalamocortical Network Activity by Elevating α 1G-Mediated Low-Voltage-Activated Calcium Current Induces Pure Absence Epilepsy**
Wayne L. Ernst, Yi Zhang, Jong W. Yoo, Sara J. Ernst, and Jeffrey L. Noebels
- 1657 **Involvement of TRPC Channels in CCL2-Mediated Neuroprotection against Tat Toxicity**
Honghong Yao, Fuwang Peng, Navneet Dhillon, Shannon Callen, Sirosh Bokhari, Lisa Stehno-Bittel, S. Omar Ahmad, John Q. Wang, and Shilpa Buch
- 1677 **Interaction of Cellular and Network Mechanisms in Spatiotemporal Pattern Formation in Neuronal Networks**
Andrew Bogaard, Jack Parent, Michal Zochowski, and Victoria Booth
- 1796 **Effects of the Noradrenergic System in Rat White Matter Exposed to Oxygen-Glucose Deprivation *In Vitro***
Maria A. Nikolaeva, Sandra Richard, Abdeslam Mouihate, and Peter K. Stys
- 1860 **Cortical Hubs Revealed by Intrinsic Functional Connectivity: Mapping, Assessment of Stability, and Relation to Alzheimer's Disease**
Randy L. Buckner, Jorge Sepulcre, Tanveer Talukdar, Fenna M. Krienen, Hesheng Liu, Trey Hedden, Jessica R. Andrews-Hanna, Reisa A. Sperling, and Keith A. Johnson
- 1887 **Neuroimaging and Physiological Evidence for Involvement of Glutamatergic Transmission in Regulation of the Striatal Dopaminergic System**
Masaki Tokunaga, Nicholas Seneca, Ryong-Moon Shin, Jun Maeda, Shigeru Obayashi, Takashi Okauchi, Yuji Nagai, Ming-Rong Zhang, Ryuji Nakao, Hiroshi Ito, Robert B. Innis, Christer Halldin, Kazutoshi Suzuki, Makoto Higuchi, and Tetsuya Suhara

Correction: In the article “Thermotaxis is a Robust Mechanism for Thermoregulation in *Caenorhabditis elegans* Nematodes” by Daniel Ramot, Bronwyn L. MacInnis, Hau-Chen Lee, and Miriam B. Goodman, which appeared on pages 12546–12557 of the November 19, 2008 issue, there was an error in Equation 8. The correct equation is as follows:

$$\Delta z_i = \frac{-(\partial T_i / \partial t) \Delta t}{\partial T_i / \partial z}$$

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