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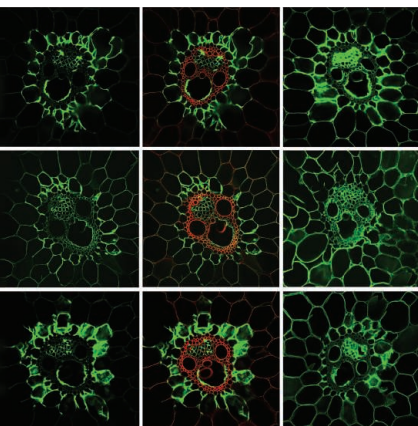
COVER

The lower hemisphere of a fast-spinning Earth shown 2 hours after a giant impact. Colors denote the silicate mantles and iron cores of Earth and the impactor. The debris evolves into a Moon-forming disk composed primarily of material from Earth's mantle, explaining the isotopic similarity between Earth and the Moon. In this model, the fast-spinning Earth is slowed by an orbital resonance between the Moon and the Sun. See pages 1040, 1047, and 1052.

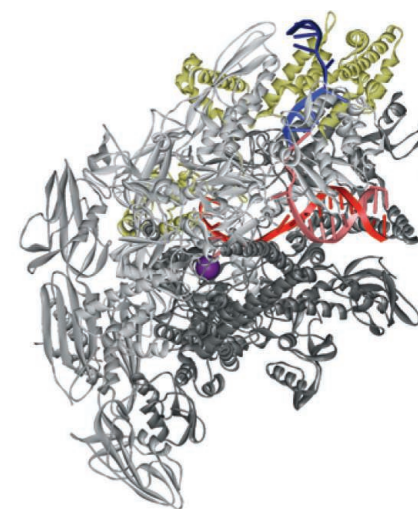
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X. Hou et al.

10.1126/science.1228757

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A. Moeller et al.

10.1126/science.1227270

The Structure of Native Influenza Virion Ribonucleoproteins

R. Arranz et al.

10.1126/science.1228172

Visualizing the Influenza Genome

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10.1126/science.1231588

The Spatial and Temporal Origin of Chandelier Cells in Mouse Neocortex

H. Taniguchi et al.

10.1126/science.1227622

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R. S. McWilliams et al.

10.1126/science.1229450

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RESEARCH ARTICLE: Attractor Landscape Analysis Reveals Feedback Loops in the p53 Network that Control the Cellular Response to DNA Damage

M. Choi et al.

State-space analysis of the p53 network identifies a therapeutic strategy for treating cancer.

RESEARCH ARTICLE: Sumoylation Silences Heterodimeric TASK Potassium Channels Containing K2P1 Subunits in Cerebellar Granule Neurons

L. D. Plant et al.

Potassium channels that respond to the anesthetic halothane are electrically silent when sumoylated.

RESEARCH ARTICLE: GPRC5B Activates Obesity-Associated Inflammatory Signaling in Adipocytes

Y. Kim et al.

Mice lacking an orphan G protein-coupled receptor show reduced inflammatory signaling and obesity.

PERSPECTIVE: Sequential Conformational Rearrangements Dictate the Dynamics of Class C GPCR Activation

J. R. Lane and M. Canals

Fluorescence probes reveal the roles of domain rearrangement and dimerization in GPCR activation.

PODCAST

R. J. Lefkowitz and A. M. VanHook

ST NETWATCH: The Nobel Prize in Chemistry 2012

The Nobel Prize Committee honors work on the structure and function of G protein-coupled receptors.

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RESEARCH ARTICLE: Optogenetic and Potassium Channel Gene Therapy in a Rodent Model of Focal Neocortical Epilepsy

R. C. Wykes et al.

Light-activated gene therapy suppresses seizures in a rodent model of epilepsy.

RESEARCH ARTICLE: Mesenchymal Stem Cells Regulate Blood-Brain Barrier Integrity Through TIMP3 Release After Traumatic Brain Injury

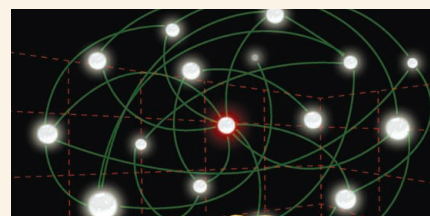
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RESEARCH ARTICLE: Modulation of Vigilance in the Primary Hypersomnias by Endogenous Enhancement of GABA_A Receptors

D. A. Rye et al.

A cerebrospinal fluid component in excessively sleepy people mimics the actions of sedatives.



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