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New Science and Technology Journals

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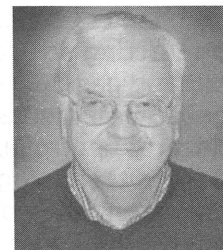
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ACM Transactions on Multimedia Computing, Communications and Applications (ACM TOMCCAP). 1551-6857. ACM. v.1, 2005. 4/year. <http://www.acm.org/tomccap/>

ACM Transactions on Multimedia Computing, Communications and Applications (TOMCCAP) is a multidisciplinary, archival, scholarly journal in the general field of multimedia and applications. Multimedia is now a mature area, having evolved over approximately 20 years. The term "media" traditionally referred to entities such as audio, video, text, images, graphics, animation. New media will be added in the future, including virtual reality, holography, haptics, eSmell, eTaste, eThought. The term "multimedia" has now been accepted to mean documents composed of at least two correlated media. The correlation could be temporal, spatial or semantic. Applications now appear in many fields such as entertainment, publishing, advertising, banking, insurance, e-commerce, travel, medical, defense, training, geographical information systems, weather and many others. Articles will focus on multimedia computing (I/O devices, OS, storage systems, streaming media middleware, continuous media representations, media coding, media processing, etc.), multimedia communications (real-time protocols, end-to-end streaming media, resource allocation, multicast protocols, etc.), and multimedia applications (databases, distributed collaboration, video conferencing, 3D virtual environments, etc.).

Chemistry World. 1473-7604. Royal Society of Chemistry. v.1, 2004. 12/year. \$900.00 (free to members). <http://www.rsc.org/chemistryworld/index.htm>

Chemical science never has been more central to society. *Chemistry World* reflects the new challenges from materials to medicines, nanotechnology to sustainable development, and genetic crop modification to climate research. The journal includes more features on applied chemistry, company profiles, overviews of chemistry in global regions, and interviews with leading individuals in the

community. The April 2005 issue includes articles on the beauty of chemistry and "innovative places for innovation". Each issue also includes a crossword puzzle.

Ecological Informatics. 1574-9541. Elsevier. v.1, 2005. 4/year. http://www.elsevier.com/wps/find/journaldescription.cws_home/705192/description#description

Ecological Informatics is a new international journal devoted to peer-reviewed articles on all aspects of ecoinformatics, computational ecology and systems ecology, and special issues on topics of current interest. The scope of the journal includes principles of information processing from genomes to ecosystems, computational approaches to ecological scales and complexity, computational approaches to ecosystems analysis, synthesis, simulation and forecasting, ecological pattern analysis at nano- to macroscales, management of ecological data. The nature of the journal is interdisciplinary, publishing papers on information processing in ecosystems, ecological data management as well as computation, and the crossover between biology/ecology and computer/information sciences. This new journal is essential reading for ecologists doing research on computational ecology, biologically-inspired computation, quantitative ecology, ecological complexity, ecosystem modeling, inductive modeling, knowledge discovery, artificial neural networks, evolutionary algorithms, cellular automata, fuzzy logic, adaptive agents, individual-based modeling, qualitative reasoning, data warehousing, artificial intelligence, artificial life, artificial chemistry as well as support vector machines.

International Journal of Geomechanics. 1532-3641. ASCE. v.1, 2001. 4/year. \$312.00. <http://scitation.aip.org/gmo/>

The *International Journal of Geomechanics* focuses on geomechanics, covering interdisciplinary topics such as soil and rock

mechanics; statics and dynamics of interacting structures and foundations; fluid, oil, and gas flow through porous media; geoenvironmental engineering; natural hazards; petroleum engineering; offshore and marine technology; infrastructure and pavement engineering; geological engineering; geothermal energy; and ice mechanics. Specific topics the journal might cover are numerical and analytical methods; constitutive modeling; localization, fracture and instabilities; neural networks, expert systems, optimization, reliability, and computer-aided engineering; laboratory and field testing; geohazards (earthquakes, landslides, subsidence, etc.); soil and rock-structure interaction; ground improvement and geosynthetics; pavement and infrastructure geomechanics; petroleum geomechanics; lunar and planetary geomechanics; seepage, consolidation, transport, and coupled problems; geotechnical structures (walls, slopes, dams, footings, piles, tunnels, mines, boreholes, and offshore structures); practical applications including design analysis, case studies, back analysis, and laboratory and field validations; construction processes; and education.

JDMS: The Journal of Defense Modeling and Simulation: Applications, Methodology, Technology. Society for Modeling and Simulation International. 4/year. <http://www.scs.org/pubs/jdms/jdms.html>

JDMS: The Journal of Defense Modeling and Simulation: Applications, Methodology, Technology is a quarterly refereed archival journal devoted to advancing the practice, science, and art of modeling and simulation as it relates to the military and defense. The primary focus of the journal is to document, in a rigorous manner, technical lessons derived from practical experience. The journal will also publish work related to the advancement of defense systems modeling and simulation technology, methodology, and theory. The journal will cover all areas of the military/defense mission, maintaining a focus on the practical side of systems simulation rather than pure theoretical applications.

Journal of ASTM International (JAI). 1546-962X. ASTM. v.1, 2004. 10/year. \$695.00. http://journalsip.astm.org/JOURNALS/JAI/jai_home.html

The *JAI* is a multidisciplinary forum to serve the international scientific and engineering community through the timely publication of the results of original research and critical review articles in the physical and life sciences and engineering technologies. It is the new source for papers from ASTM's symposia program, which prior to *JAI* were published in ASTM's Special Technical Publications (STPs). These peer-reviewed papers cover diverse topics relevant to the science and research that establish the foundation for standards development within ASTM International. Topics covered include all aspects of materials performance and characterization, civil engineering and building materials, petroleum and chemical engineering, nuclear science and technology, and environmental science and technology.

Journal of Statistical Mechanics: Theory and Experiment (JSTAT). 1742-5468. Institute of Physics. v.1, 2004. 12/year. <http://www.iop.org/EJ/journal/JSTAT>

Journal of Statistical Mechanics: Theory and Experiment (JSTAT) is a multidisciplinary, peer-reviewed international journal which brings together cutting-edge research in all aspects of statistical physics particularly emphasizing experimental work that impacts on fundamental aspects of the subject. *JSTAT* offers web-only submission and aims for rapid publication. The editor's first decision (which is also the last in the case of acceptance), is reached on average in 4 weeks for letters and 6 weeks for papers. There are no page charges to authors. Being an online journal, *JSTAT* offers authors the possibility to publish large data sets, tables and figures, as well as movies and other color multimedia attachments.

Journal of Website Promotion. 1553-3611. Haworth Press. v.1, 2005. 2/year. \$250.00. <http://www.haworthpress.com/web/JWP/>

Effective site promotion is a vital step in conducting e-business. The *Journal of Website Promotion* provides up-to-date research and practical ideas to help develop and implement sites as well as valuable tips on creating a

user-friendly atmosphere, and developing content that is relevant to the target market. The journal contains both academic articles and brief updates, helpful case studies and analysis, and reviews of books and websites. This publication shows how to make the best use of news groups, forums, e-catalogs and e-books, banner/exchange advertising and co-branded relationships. Topics covered include promoting sites to search engines, analyzing the online audience, engaging and retaining customers, global web positioning, public relations strategies of effective websites, clarifying and setting promotion objectives, target market user profiling, and the ethics of spam-free speech and money issues.

Make: technology on your time. O'Reilly Media Inc. v.1, 2005. 4/year. \$34.95. <http://www.makezine.com/>

Make is the first magazine devoted to digital projects, hardware hacks, and D.I.Y. inspiration. Recent articles include: Amazing things that ordinary people are making in their garages and backyards, including the Niles Monorail, steam locomotives, serious Legos, a thermo-electric keg wrap, Meccano computing machinery, and more. Bunnie Huang prototypes two kinetic glowsticks: instead of creating a single arc of light, glowsticking dancers can now create their own two-dimensional fantasias. To take pictures from a kite, you need three things: a kite, a camera, and a special rig that attaches the camera to the kite line and activates the shutter button on the camera. Neil Gershenfeld, teacher of MIT's course "How to Make (Almost) Anything" gives us a tour of the Boston fab lab, one of a growing network of field labs all over the world. Also included is an easy-to-use application to manage routine and time-consuming weblog chores.

Physical Biology. 1478-3975. Institute of Physics. v.1, 2005. <http://www.iop.org/EJ/journal/physbio>

Physical Biology is a peer-reviewed journal fostering the integration of biology with the traditionally more quantitative fields of physics, chemistry, computer science and other mathematics-based disciplines. Its primary aim is to further the understanding of biological systems at all levels of complexity, ranging from the role of structure and dynamics of a single molecule to cellular

networks and organisms. Topics covered include molecular interactions and protein folding, ion-channel structure and function and ion regulation, biological networks and neural systems, modeling aspects of molecular and cell biology, cell-cell signaling and interaction, single molecule studies and nanobiotechnology, and novel tools and methods in physical biology.

Smart Structures and Systems. 1738-1584. Techno-Press Ltd. v.1, 2005. 4/year. \$396.00. http://technopress.kaist.ac.kr/journal_sss.jsp

Smart Structures and Systems: an International Journal of Mechatronics, Sensors, Monitoring, Control, Diagnosis, and Management provides a publication channel for researchers in the general area of smart structures and systems. Areas of coverage include sensors and actuators (materials/devices/informatics/networking), structural health monitoring and control, diagnosis/prognosis, life cycle engineering (planning/design/maintenance/renewal), and related areas. The global editorial board is headed by Professor B. F. Spencer, Jr., Dept. of Civil & Environmental Engineering, University of Illinois at Urbana-Champaign for the American edition. Forthcoming articles include: Sensor modeling and failure-level fusion by Bayesian networks (Ferrari and Vaghi), Smart foam for active vibration and noise control (Akl and Baz), and Modal identification and modal updating of a reinforced concrete bridge (El-Borgi, Choura, Ventura, and Baccouch). ❖

