News of the Institute

Election Results: Anderson and DesRoches Elected to Board of Directors

William A. Anderson, recently retired Associate Executive Director of the Division on Earth and Life Studies at the National Research Council, Washington, D.C., and Reginald DesRoches, Professor and Associate Chair of the Department of Civil and Environmental Engineering at the Georgia Institute of Technology in Atlanta, were elected the newest members of the Board of Directors in the 2009 election. To see their biographies and vision statements, visit http://www.eeri.org/site/content/view/33/61/.

Anderson and DesRoches will be formally welcomed to their new posts at the Board Meeting in Salt Lake City on February 11. They will each serve three years as directors, replacing Jonathan Bray and Laurie Johnson, whose terms are expiring. EERI extends sincere thanks to them for their years of outstanding service and dedication to the Institute.

It is not too early to start thinking about next year’s election of a President-Elect and Directors. The Nominating Committee welcomes suggestions from the membership, including self-nominations. Nominees for director must have been active (or honorary) members of EERI for at least five years, and must not have been nominated to the Board in the last two years. To submit a name for consideration, send a brief note giving the name and qualifications of the potential candidate to the Nominating Committee in care of the EERI office. All submissions are confidential.

Tubbesing to Retire at Year’s End — EERI Seeks Executive Director

EERI Executive Director Susan Tubbesing will be retiring at the end of 2009, after nearly 22 years of service to the Institute. The EERI Board spent a full day in retreat in December discussing the coming transition to new leadership and its implications for the future direction of EERI. It conferred with former Board members and a cross section of younger active members. In creating the job description below, the Board carefully considered the qualities and experience it seeks and the areas on which it wants an Executive Director to focus.
EERI Executive Director
continued from page 1

Job Description: The Executive Director manages the Institute’s staff and is the chief advisor to the Board of Directors on all matters pertaining to the Institute. Typical responsibilities include ensuring that Board’s directives and decisions are implemented; cooperating with and acting as EERI’s liaison with other organizations, government departments and agencies, legislative bodies, and the public; and directing the technical and administrative support services provided to the Board. The Executive Director oversees services for the Institute’s more than 2,300 members, several committees, programs and projects, regular and special publications, annual meetings, and periodic conferences.

The Executive Director has overall responsibility for the direction and supervision of all Institute employees and services including, but not limited to, formulating and recommending policies, establishing and accomplishing goals, ensuring timely and high-quality services, preparing budgets and grant proposals, and ensuring that the Institute’s financial and actuarial systems are sound.

Qualifications: Candidates should have at least a Bachelor’s Degree; demonstrated supervisory experience; familiarity with association management and operations; fundraising, donor relations and membership development; and a repertoire of training, education, and experience that demonstrates that the candidate has the abilities to be an effective Executive Director. It would be desirable also for the candidate to have knowledge and experience in the field of natural and other hazards, and a demonstrated ability to collaborate effectively with multidisciplinary professionals.

Competitive salary and benefits are to be negotiated.

Application deadline: March 15, 2009
Please visit EERI’s website http://www.eeri.org/edsearch for a complete job description and instructions. Send your letter of interest and a resume with supporting qualifications to searchcommittee@eeri.org or to EERI, 499 14th Street, Suite 320, Oakland, CA 94612-1934, ATTN: Thalia Anagnos, Chair, Search Committee. Your application will be kept in confidence.

News of the Institute

Housner Remembers EERI in His Will

EERI has been informed that the Institute’s founding father, George Housner, who served as EERI’s first Vice President and second President (see page 1 of the December 2008 Newsletter), has named EERI in his will and directed his trustee to “distribute the sum of $250,000 to the Earthquake Engineering Research Institute (EERI) to be used at the discretion of the Board of Directors of EERI on projects determined by said Board of Directors to be worthwhile and in furtherance of the mission of EERI.”

The EERI Board will consider this generous bequest at its February 11 meeting prior to the Annual Meeting in Salt Lake City, Utah. EERI President Farzad Naeim will report on this discussion during the Annual Business Meeting on February 13.

EERI Endowment Donors

EERI would like to thank the donors to the Endowment Fund shown below and acknowledge their recent contributions. EERI’s endowment supports those innovative projects that ensure the Institute’s continuing leadership in the earthquake engineering professions.

$5,000
David A. Friedman & Paulette J. Meyer
Laurence Kornfield
Faiz I. Makdisi
Stephen L. Perlof
William J. Petak
Mark R. Pierepikarz
William (Woody) U. Savage
Barry Welliver
Donald L. Wells
Loring A. Wylie Jr.

$2,000
Digitexx Data Systems, Inc.

$500
Robert E. Bachman
Forrest T. Braun
John R. Filson
Douglas J. Nyman
Michael Valley

$200-$499
Vitelmo V. Bertero
California Earthquake Safety Foundation
Arrietta Chakos
Patrick Corser
Saif M. Hussain
James O. Jirsa
James M. Kelly

$100-$199
Donald G. Anderson
Ted M. Christensen
Charles Eadie
Ronald T. Eguchi
Phillip L. Gould
Ayhan Irfanoglu
Darell J. Lawver
Geoffrey R. Martin
Michael Valley
Avigdor V. Rutenberg
Keri Ryan
Robert V. Whitman
Sharon L. Wood

Other Amounts
Robert Y. Chew
J. David Frost
Kathryn L. Hanson
Gregory L. Hempen
Keith Knudsen
Michael E. Kreger
Neven Matasovic
Keith F. Mobley
Yoshiaki Nakano
Enver Odar
Donald Parker
Gustavo Parra-Montesinos
Victor M. Pavon
John O. Robb
Judith Steele
Solveig Thorvaldsdottir
Alexander M. Uzdin
Stan Zagajeski

2
EERI is pleased to announce that three organizations recently became Bronze Subscribing Members.

The San Francisco, California, office of Arup is part of a global firm of designers, engineers, planners, and business consultants providing a diverse range of professional services to clients around the world. Their fully integrated approach brings a full complement of skills and knowledge to bear on any given design problem. With 10,000 staff working in more than 90 offices in 37 countries and more than 10,000 projects running concurrently, Arup exerts a significant influence on the built environment and is the creative force behind many of the world’s most innovative and sustainable designs.

Arup has three main global business areas — buildings, infrastructure, and consulting. Its multidisciplinary approach means that any given project may involve people from any or all of the sectors or regions in which they operate. Their fundamental aim is to bring together the best professionals in the world to meet their clients’ needs. For more information, visit http://www.arup.com.

The Applied Technology Council (ATC) is a nonprofit corporation established in 1973 through the efforts of the Structural Engineers Association of California (SEAOC). ATC’s mission is to develop and promote state-of-the-art, user-friendly engineering resources and applications for use in mitigating the effects of natural and other hazards on the built environment. ATC also identifies and encourages needed research and develops consensus opinions on structural engineering issues in a nonproprietary format. ATC’s Board of Directors consists of representatives appointed by the American Society of Civil Engineers, the National Council of Structural Engineers Associations, SEAOC, the Western Council of Structural Engineers Associations, and four at-large representatives. Project work is conducted by a wide range of highly qualified consulting professionals from academia, research, and professional practice who would not be available from any single organization.

Funding for ATC projects is obtained from government agencies and from tax-deductible contributions. With headquarters in Redwood City, California, ATC also has offices in Arlington, Virginia, and Rehoboth Beach, Delaware. For more information, visit http://www.atcouncil.org/.

For more than 50 years, Jacobs Associates Engineers and Consultants has provided civil engineering consulting services with specialties in design and construction management for underground projects, with an emphasis on tunnels. Incorporated in San Francisco in 1956 and now having seven offices in the United States and one in Australia, Jacobs Associates maintains world-renowned expertise in the design of both temporary and permanent excavation support systems. The firm provides soil and rock slope stability analyses and extensive services for large-diameter tunnels, including tunnel inspection and rehabilitation.

Some of their projects include the San Francisco Bay Area Rapid Transit (BART) subway system, the Melbourne Underground Rail Loop in Australia, the Washington, D.C., Metropolitan Area Transit Authority subway system, and the MetroWest Water Supply Tunnel in Boston. For more information, visit http://www.jacobssf.com.

A $3.4 million grant from the National Institute of Standards and Technology (NIST) to develop monitoring and inspection systems for the nation’s aging highway bridges has been awarded to an engineering team comprised of EERI Subscribing Member Wiss, Janney, Elstner Associates (WJE), The University of Texas at Austin, and National Instruments. The grant will allow for the development of two wireless network systems that together address a critical issue for bridge safety: the monitoring of cracks or defects and corrosion in key structural components. Matching funds will bring the five-year research project’s budget total to approximately $6.8 million.

Twenty-five percent of the nation’s 600,000 highway bridges were rated as structurally deficient or functionally obsolete in 2007, according to the Federal Highway Administration. About one-third of all bridges are fifty years old or older. National Instruments and university engineers will design one network of sensors to monitor fracture-critical bridges continuously — those susceptible to collapse from the failure of a single critical component — over a ten-year service life. A second network will be designed to detect early signs of corrosion in reinforced concrete bridge decks. WJE, with more than fifty years of experience in instrumentation and monitoring structures, will implement the systems and field test their reliability once the hardware for the wireless networks has been developed.

The NIST award comes from its new Technology Innovation Program (TIP), created to support innovative research in areas of critical national need where the government has a clear interest because of the magnitude of the problems and their importance to society.
News of the Institute

EERI Professionals Visit Student Chapters

EERI sponsors the Friedman Family Visiting Professional Program to match visiting professionals with host universities for one or two days to exchange information on current topics related to earthquake engineering and risk reduction. These occasions bring together the academic and professional sides of earthquake engineering, providing students with unique glimpses at what their futures may hold. For more information, including a list of visiting professionals, visit www.eeri.org, click on “Projects,” then “Friedman Visiting Pros.” All visiting professionals must be EERI members. The visits, such as those described below from the last couple of years, offer opportunities for both formal presentations and informal discussions of research activities and engineering practice with faculty and students.

Eisner at UNAM

In May 2007, the Universidad Autónoma de México (UNAM) hosted Richard Eisner of the Fritz Institute as a visiting professional. The EERI Student Chapter at UNAM used the opportunity to develop a two-day Colloquium on Natural Hazards Management in which Eisner spoke on community preparedness. The event included seven other speakers covering multidisciplinary presentations on seismic engineering, soil mechanics, geography, social consciousness, and economic problems. The colloquium was free and open to the public. The student chapter was pleased to be able to discuss Mexico’s problems with all the speakers, with an average of 50 participants at every lecture.

Walters at Georgia Tech

Mason Walters of Forell/Elsesser Engineers was a visiting professional at Georgia Tech. Walters at Georgia Tech participated at every lecture. The chapter was pleased to be able to discuss Mexico’s problems with all the speakers, with an average of 50 people attending each lecture. The discussions of research activities and engineering practice with faculty and students.

Eisner at UNAM

In May 2007, the Universidad Autónoma de México (UNAM) hosted Richard Eisner of the Fritz Institute as a visiting professional. The EERI Student Chapter at UNAM used the opportunity to develop a two-day Colloquium on Natural Hazards Management in which Eisner spoke on community preparedness. The event included seven other speakers covering multidisciplinary presentations on seismic engineering, soil mechanics, geography, social consciousness, and economic problems. The colloquium was free and open to the public. The student chapter was pleased to be able to discuss Mexico’s problems with all the speakers, with an average of 50 participants at every lecture.

Walters at Georgia Tech

Mason Walters of Forell/Elsesser Engineers was a visiting professional at the Civil Engineering Department of the Georgia Institute of Technology in October 2007. Walters made a presentation to Reginald DesRoches’ undergraduate concrete class on “Seismic Emphases for Building Design,” providing insight on lateral system selection, seismic connection detailing, retrofit strategies, and innovations such as hybrid moment frame and sustainable design. Walters met individually with some of the faculty of the structures group, toured the Structural Engineering Laboratory, and was introduced to the research projects in the structural applications of smart materials and large-scale experiments on innovative steel and composite structures.

After lunch with EERI graduate student members, Walters gave an afternoon seminar on “Seismic Isolation Case Studies” hosted by the chapter, attended by about 40 faculty and graduate students. He emphasized that the combination of local site response and building type is key in selecting a seismic isolation technique. Dinner at a local Thai restaurant with a couple of the EERI student officers and a faculty member afforded an opportunity to evaluate the visit.

Hooper at U of Minnesota

John Hooper of Magnusson Klemencic Associates (MKA) in Seattle, Washington, was a visiting professional at the University of Minnesota in December 2007. On the first day, he spoke to faculty and students on a topic he has presented elsewhere: “The Seismic Design of Tall Buildings and Other Structures with Unique Architecture.” Hooper toured the Multi-Axial Subassembly Testing (MAST) facility, one of the large-scale NEES labs, with EERI member Professor Catherine French. He was also given a tour of the Structures Lab in the Civil Engineering Building. On the second day, Hooper gave a seminar for structures graduate students on “Practical Design and Construction of Steel Plate Shear Walls.” During an informal roundtable discussion at lunchtime, Hooper spoke to students and faculty about a number of projects that required experimental verification of the structural assemblages to satisfy peer reviewers. Hooper’s final talk covered the design of the new University of Minnesota 50,000-seat stadium, due to be completed in the fall of 2009.

Kammerer at U of Michigan and U of Texas

In January 2008, the University of Michigan hosted visiting professional Annie Kammerer, a geophysicist and geotechnical engineer in the Office of Research at the U.S. Nuclear Regulatory Commission. She gave a seminar on “The Basics and Benefits of Integrated Interdisciplinary Approaches in Earthquake Engineering,” in which she discussed how the earthquake-related disciplines function, interact, and help to build disaster-resistant communities. Examples of how an interdisciplinary approach — in which EERI has played a key role — has led to advances include the acceptance of the performance-based engineering framework, the incorporation of...
long-term societal impacts in mitigation planning, and the acceptance of probabilistic risk assessment techniques as a useful decision-making tool for a wide variety of stakeholders.

In March 2008, Kammerer was a visiting professional at the University of Texas. After beginning her presentation with an overview of the NRC and the new regulations that have been developed for new reactors, Kammerer discussed key research projects, such as new probabilistic seismic and tsunami hazard assessment tools and sources, the incorporation of incoherency into soil-structure interaction analyses, and the full integration of site response analyses into PSHA.

**Freeman at U of Texas**

In February 2008, Sigmund A. Freeman of Wiss, Janney, Elstner Associates was a visiting professional at the University of Texas at Austin. After visiting with several UT engineering faculty, Freeman gave a seminar on “Effects of Earthquake Loading on Buildings,” in which he discussed the relationship of earthquake building code criteria to structural dynamics and the development of performance-based structural engineering. He introduced the acceleration-displacement response spectrum format now in worldwide use for displaying capacity spectrum and response spectrum plots. An energized discussion followed the seminar at a reception. Freeman then learned about the latest research being conducted during a tour of the Fergusson Structural Engineering Laboratory.

**N. Gould at U of Wyoming**

In April 2008, the University of Wyoming EERI Student Chapter invited Nathan Gould of ABS Consulting as a visiting professional to speak on “Performance-Based Seismic Design.” The well-attended presentation covered case studies, how PBD relates to the design requirements of the International Building Code, the difference between deterministic and probabilistic design, and how PBD has been used in the retrofit of existing structures in seismic regions. After lunch with students and faculty, Gould toured the university’s structural engineering research facilities.

**Lizundia at UC San Diego**

In April 2008, the University of California San Diego hosted Bret Lizundia of Rutherford & Chekene as a visiting professional. His first presentation, geared for graduate students, was entitled “An Overview of FEMA 547: Techniques for the Seismic Rehabilitation of Existing Buildings.” Rutherford & Chekene’s extensive experience with the retrofit of existing buildings includes such notable structures as the San Francisco Ferry Building and Frank Lloyd Wright’s Hanna House at Stanford University.

Later in the day, Lizundia’s talk on “How to be a Happy and Successful Structural Engineer” was aimed at an undergraduate audience.

**Mayes at U at Buffalo, SUNY**

Ronald L. Mayes of Simpson, Gumpertz & Heger was a visiting professional at the University at Buffalo EERI Student Chapter in April 2008. Mayes toured the Structural Engineering and Earthquake Simulation Laboratory (SEESL) and gave a lecture about a project at 185 Berry Street in San Francisco that represents an innovative application of seismic isolation to an existing three-story reinforced concrete moment frame building; two new stories were added to the building, and isolation bearings were installed between the existing structure and the addition. After lunch with faculty and students, Mayes had an informal meeting with graduate students.
Learning from Earthquakes

**Papua Earthquakes of January 3, 2009**

*Contributed by Martha Merriam, a geologist at Caltrans, and Danny Hilman Natawidjaja, a geologist at the Indonesian Institute of Sciences.*

On January 3, 2009 (Indonesian time), an M7.6 earthquake in the predawn hours and an M7.4 earthquake three hours later (almost certainly triggered by the first event) shook the remote east Indonesian province of West Papua. The region nearest the epicenter is sparsely populated and attracts tourists thanks to its diving sites, wildlife, and spectacular scenery. The capital city of Manokwari is the nearest major city (population 161,000) and is located about 145 km and 85 km from the first and second large shocks, respectively. Epicentral depths were 17 km and 23 km for the M7.6 and the M7.4 earthquakes, respectively.

A tsunami warning was issued and cancelled an hour later. Liquefaction was observed on beaches and in river banks. According to EERI member Teddy Boen, these events and their aftershocks resulted in little damage to buildings and infrastructure. The Badan Geologi (Geological Agency) reported that in Manokwari, about 250 houses were lightly to heavily damaged with one collapse. Two people were killed and 74 injured. Numbers may have been two or three times larger throughout the entire province.

Spontaneous evacuations from homes occurred because of fears of tsunamis and additional large shocks. Upwards of 17,000 evacuees filled tent cities. Fear coupled with illness within these camps and rainy weather has impeded the displaced population’s return home.

The 2009 events were both associated with subduction of the Pacific plate beneath the Australian plate. Relative plate motion in this area is 12 cm/yr; the convergence rate on these two plates is probably a few cm per year on a plane dipping about 30 degrees south beneath the north shore of West Papua. The Sorong fault, a major onshore transform fault that could have a slip rate as high as 10 cm/yr, has not had a large event for at least 100 years and may have been stress-loaded during this recent activity. Therefore there is concern that these recent events may lead to another large earthquake on the Sorong fault, which is located much closer to the cities of Manokwari and Sorong.

**M6.1 Cinchona, Costa Rica, Earthquake of January 8, 2009**

*Contributed by Guillermo Santana, LANAMME, University of Costa Rica.*

The M6.1 Costa Rica earthquake of January 8, 2009, was caused by a strike-slip fault segment that is perpendicular to the much greater deformation belt that crosses Costa Rica roughly west to east, connecting to the subduction zone in the Pacific to the west and continuing east to northern Columbia. The belt constitutes the north boundary of a microplate that stretches south to the Nazca and Cocos plates. Recent activity in the portion of the microplate includes the 990-99 earthquake sequence that concluded with the M7.6 Limon, Costa Rica earthquake. The earthquake epicenter was located in an area that borders the northern limit of the Central Valley (major city San Jose, 2 million inhabitants, approximately 30 km NNW) just east of the Poas Volcano, at a depth of 5 km, according to the USGS. The town of Cinchona (300 inhabitants), nearest to the epicenter, was completely destroyed. More accelerograms will be forthcoming from the university’s network, which has over 10 stations located in and around the city of San Jose.

Damage is widespread in the epicentral region. This area consists of a mountainous terrain with rain...
Costa Rica Earthquake
continued from previous page

forests and waterfalls. The area had experienced sustained economic growth due especially to the tourist industry. The next economic activity in importance is agriculture: dairy and strawberry farms. To date, the National Emergency Commission (www.cne.go.cr) reports 33 people dead, 7 missing, 2,326 displaced individuals, 9 seriously injured, 267 single-family dwellings damaged, 251 destroyed, and losses estimated at US$00 million in an area that covers 80 km².

Major failures are both critical lifelines. The first is the hydroelectric power station located within 10 km of the epicenter (Figure 2). This station consists of a system of several reservoirs that together generated approximately 100 MW and was operated by the state-run power company. The plant was taken out of operation by the earthquake and constitutes a loss of about 10% of the national energy production capacity. It was overtaken by a mudflow that reached a height of over two meters in several locations. All equipment in the powerhouse has been rendered inoperable.

The second critical lifeline is Route 126, which crosses the epicentral region from north to south through most of the seriously affected rain forests. The refurbished 160+ year-old road, which does not comply with modern highway design standards, connects San José to the Caribbean coast at the mouth of the San Juan River, which serves as the international border between Costa Rica and Nicaragua. Another highway through another corridor further east, opened in 1980, is currently used for that purpose. The damaged bridges are narrow one- or two-lane bridges with simply supported spans of 20 meters or less and average daily traffic counts of less than 1,000. Five days after the earthquake, at least three of the small bridges had been replaced with prefabricated truss structures (Bailey bridges). Several segments of the highway collapsed due to terrain failure. Altogether, more than 3 km of highway have disappeared.

There is much to be learned from this earthquake in the areas of landslides, highway failure, environmental impact, power lifelines, power plant generation response, and vulnerability of single-family dwellings.

News of the Profession

IAEE Guidelines

Three of the authors of Guidelines for Earthquake-Resistant Non-Engineered Construction, published in 1986 by the International Association for Earthquake Engineering, are bringing together a group in IAEE, including original authors who are willing to participate and new contributors who are willing to join the effort, to revise the Guidelines. Since there are no funds allocated for this purpose, the revision will be mainly done by e-mail. Some group members may meet at some point during an international or national meeting. The goal is to finish the revision by 2010. If you are interested in participating, contact one of the three initiating authors: Anand S. Arya (India) at anandsarya@gmail.com, Teddy Boen (Indonesia) at tedboen@cbn.net.id, or Yuji Ishiyama (Japan) at to-yuji@nifty.com. The participation of young professionals, researchers, and academics is encouraged.
Learning from Earthquakes

Earthquake Swarms in Yellowstone

Beginning on December 26, 2008, a swarm of over 900 earthquakes occurred within the large (34 miles wide by 45 miles long) Yellowstone Caldera. The largest (M3.9) occurred in a remotely populated area of the park, which is closed for the winter. A second smaller earthquake swarm began on January 9, 2009, with a maximum magnitude of 3.2. The map shown to the right indicates the first swarm started in Yellowstone Lake and migrated towards the north shore. Earthquake swarms occur nearly every year at Yellowstone Park, although the last time a swarm was this energetic was in 1985.

Increased seismic activity in the Yellowstone area is of concern because some of the largest volcanic eruptions on Earth have come out of the Yellowstone Caldera. The most recent was about 640,000 years ago and spewed ash over much of what is now the United States. There have been a number of volcanic eruptions since then with large lava flows.

The Yellowstone hotspot is an area where basaltic magma rises from the mantle into the Earth’s crust. Partially molten rock exists at least four miles beneath the surface, releasing heat that fuels the geysers and other thermal features in the park. Earthquakes in the area occur due to normal faulting (such as the 1959 Hebgen earthquake), the movement of magma, and hydrothermal fluid activity.

The Yellowstone Volcano Observatory (YVO) was created, in part, to provide warnings of potential volcanic activity at Yellowstone. So far, no other geological activity has been observed accompanying this earthquake swarm. Notices from the YVO are available at: http://volcanoes.usgs.gov/yvo/.

Announcements

CSMIP RFQ

The Strong Motion Instrumentation Program of the California Geological Survey in the Department of Conservation plans to fund two data interpretation projects for the analysis and interpretation of the strong-motion data sets recorded from recent earthquakes. These projects are intended to increase the understanding of strong ground shaking and the response of structures, and to increase the use of strong-motion data in improving seismic code provisions, seismic design practices, and post-earthquake response. To receive a copy of the Request for Qualifications (RFQ), e-mail Priscilla.Dixon@conservation.ca.gov. The RFQ includes a description of the data interpretation topics, the required response contents, and the contract conditions. Responses must be received no later than 5:00 p.m., March 3, 2009. If you have any questions regarding technical aspects of the data interpretation topics call Dr. Moh Huang, Data Interpretation Project Manager, at 916/322-9304. For questions regarding requirements or other requested information, contact Priscilla Dixon at 916/322-3105.

Applications are being accepted for the Advanced Masters in Structural Analysis of Monuments and Historical Construction, sponsored by the European Commission within the framework of the Erasmus Mundus Programme. This English-language course is organized by a consortium of leading European universities and research institutions: the University of Minho (coordinating institution, Portugal), the Technical University of Catalonia (Spain), the Czech Technical University in Prague, the University of Padua (Italy) and the Institute of Theoretical and Applied Mechanics of the Czech Academy of Sciences.

A significant number of scholarships, ranging from €4,000 to €21,000, are available to students of any nationality. The application deadline is May 31. For more information on the program and the online application procedure, visit http://www.msc-sahc.org/.
**Publication**

**Adeli Book and Honor**

EERI member Hojjat Adeli is co-author with X. Jiang of a new book, *Intelligent Networks, Wavelets, and Chaos Theory for Intelligent Transportation Systems and Smart Structures*, published by Taylor & Francis. This text introduces novel technologies, methods, and detailed computational algorithms for the creation of smart structures and intelligent freeways. Cutting across the disciplines of structural and transportation engineering, it provides a unique treatise for solving complex and intractable problems encountered in the emerging fields of smart structures and intelligent transportation. It can be ordered online for $159.95 from [www.tandfbuiltenvironment.com](http://www.tandfbuiltenvironment.com).

Adeli was recently elected a Fellow of the American Association for the Advancement of Science for his contributions to computational infrastructure engineering and for worldwide leadership in computational science and engineering.

Adeli received his Ph.D. from Stanford University in 1976. He is currently Abba G. Lichtenstein Professor of Civil Engineering at Ohio State University. He is a Distinguished Member of ASCE, founder and editor of *Computer-Aided Civil and Infrastructure Engineering* and *Integrated Computer-Aided Engineering*.

**Translation**

Hojjat Adeli

---

**News of the Membership**

**IIT Award for Prakash**

EERI member Shamsher Prakash, Professor Emeritus at the University of Missouri, Rolla (now the Missouri University of Science and Technology), received the Distinguished Alumnus Award from the Indian Institute of Technology, Roorkee, in December 2008. He was cited for his internationally recognized work in the area of soil dynamics, including pioneering work on liquefaction of fine-grained soils, seismic design of piles, and seismic analysis of rigid retaining walls. He has revolutionized the use of geotechnical engineering case histories in professional practice and education, and chaired six international conferences on case histories in geotechnical engineering 1984-2008. He also authored the first comprehensive text on soil dynamics in 1981.

In 2003, Dr. Prakash was awarded an Honorary Doctorate by the Technical University of Civil Engineering, Bucharest, Romania. In 2004, he was recognized as Distinguished Alumnus by the Department of Civil Engineering at the University of Illinois, Urbana. He was awarded Life Membership in ASCE. Professor Prakash was named Honorary Editor of the *International Journal of Case Histories in Geotechnical Engineering* in 2004, Honorary Member of the Indian Society of Earthquake Technology in 2003, and the Indian Geotechnical Society in 2006.

**Translation**

Shamsher Prakash

---

**Call for Abstracts**

**NEES Annual Meeting**

The George E. Brown, Jr. Network for Earthquake Engineering Simulation (NEES) 7th Annual Meeting will be held June 22-25, 2009, in Honolulu, Hawaii. It is a joint meeting with the National Science Foundation (NSF) Civil, Mechanical and Manufacturing Innovation (CMMI) Research and Innovation Conference, with parallel sessions scheduled. The NEES Consortium seeks presentations of original research, experimental and computational innovations, and information technology and education, outreach, and training (EOT) advances, and diverse issues related to earthquake engineering practice.

Abstracts are due by February 1 and may be submitted at [www.nees.org/7am/](http://www.nees.org/7am/) in the following sessions: emerging frontiers in earthquake engineering and multihazard, experimentation, seismic performance of nonductile buildings, lifelines and critical infrastructure, hydrodynamic effects of tsunamis and hurricanes, connecting the world through hybrid simulation, publishing and sharing earthquake engineering data, and the broad impact of EOT.

This meeting will provide an excellent opportunity for the NEES community to interact with researchers from other sectors of the NSF CMMI Division and showcase the impact of NEES on seismic mitigation. Researchers, practitioners, and policy-makers will discuss NEES research — past, present, and future — with a special focus on broadening and expanding its scope and impact. For more information, visit [www.cmmigranteecconference.org](http://www.cmmigranteecconference.org).
Call for Abstracts

SEAOC Convention

Abstracts are requested for papers to be presented at the 2009 Structural Engineers Association of California Convention, to be held September 23-26, 2009, in San Diego, California. Submissions are encouraged on recent projects, best design practices, new seismic systems and components, next generation codes, advanced analysis techniques, high performance materials, sustainable design and results of recent experimental testing. Abstracts (250 words maximum) are due by February 23, and should be sent via e-mail to the Technical Program Committee Chair Michael Braund at mbraund@degenkolb.com. Authors will receive guidelines regarding paper format after acceptance of abstract, by April 3, 2009.

ANCER Workshop

A call for papers has been issued for the 2009 Workshop of the Asian-Pacific Network of Centers for Earthquake Engineering Research (ANCER), to be held August 13-14, 2009, hosted by the Mid-America Earthquake Center at the University of Illinois. The main objective of this series is to provide a medium for integration of various approaches to studying and managing earthquake risk, with an emphasis on low and medium seismicity regions. The focus will be the encouragement of young researchers to present their own work and have an opportunity to receive feedback from international experts in a collegial environment. The workshop theme is learning from recent earthquakes, especially related to field reconnaissance and back-analysis of strong-motion, structures and geotechnical aspects. Abstracts not exceeding 400 words should be e-mailed to vlna@illinois.edu by March 23, 2009. For more information, visit http://illinois.edu/goto/ANCER.

Call for Papers

Health Monitoring of Structures

A special issue devoted to Health Monitoring of Structures is planned for the international journal, Computer-Aided Civil and Infrastructure Engineering (CACAIE) to be published in 2009. Manuscripts are due by April 1, 2009. Papers on all modes of health monitoring of structures are welcome. Of primary interest are original research papers describing novel computational algorithms, models, and methodologies. Papers describing computer programs or software systems are not suitable.

CACAIE is a scholarly journal that provides a unique forum for publication of original articles on novel computer-aided techniques and innovative applications of computers. For more information, visit http://www.eeri.org/site/content/category/1/122/247/.

Announcements

Canadian Masonry Symposium

Registration is open for the 11th Canadian Masonry Symposium, to be held May 31 to June 3, 2009, at the Marriott Bloor Yorkville Hotel in Toronto, Ontario, Canada, hosted by the Department of Civil Engineering at McMaster University. Canadian masonry symposia have been major international venues for the exchange of information on masonry science, engineering, architecture, construction, manufacturing, evaluation, and repair.

In addition to the technical sessions, the symposium will include educational workshops on the design of engineered masonry. Engineers, architects, contractors, manufacturers, planners, building officials, and researchers will all benefit from this opportunity to share their experiences and hear about new ideas.

Early registration ends on April 15, after which the fee for full registration will increase from CDN650 to CDN750. For more information, visit http://www.canadianmasonry-symposium.org/.

Nominations Sought for Prakash Award

The Shamsher Prakash Foundation is soliciting nominations for the 2009 SP Research Award, which is given to a young (less than 40 years old) engineer, scientist, or researcher from anywhere in the world. Candidates should be specialists in geotechnical engineering or geotechnical earthquake engineering, have had significant independent contributions to the field, and show promise of future excellence. The award includes a cash prize of $1,100.

Nominations are due on or before May 31, 2009. All nominations will be reviewed by a judging committee of international experts from Canada, Japan, the United Kingdom, and the United States. The award will be announced by September 30, 2009. For more information, visit http://www.yoga10.org.

NEES Program Solicitation

The program solicitation for the George E. Brown, Jr. Network for Earthquake Engineering Simulation (NEES) Research is now online at http://www.nsf.gov/publications/pub_summ.jsp?ods_key=nsf09524. The full proposal deadline is March 27, 2009. The estimated number of awards is 8 to 14, including a combination of core research, simulation development, and payload awards. This solicitation especially seeks ground-breaking, transformative basic research requiring the use of NEES equipment sites.
CALENDAR

Items that have appeared previously are severely abbreviated. The issue containing the first appearance, or the most informative, is indicated at the entry’s end. Items listed for the first time are shown in bold.

2009

**FEBRUARY**


20. 1st in Khan Lecture Series, Bethlehem, PA. Info: [www.lehigh.edu/frkseries](http://www.lehigh.edu/frkseries) (12/08)

**MARCH**

10. Soil Liquefaction During Earthquakes Seminar, Pasadena, CA. See page 12. (2/09)

12. Soil Liquefaction During Earthquakes Seminar, St. Louis, MO. See page 12. (2/09)


20. 2nd in Khan Lecture Series, Bethlehem, PA. Info: [www.lehigh.edu/frkseries](http://www.lehigh.edu/frkseries) (12/08)

20. PEER/Caltrans Seismic Research Seminar, Sacramento, CA. Info: [http://peer.berkeley.edu/events/transportation_seminar.html](http://peer.berkeley.edu/events/transportation_seminar.html) (1/09)

**APRIL**

8-10. Annual Meeting of the Seismological Society of America, Monterey, CA. Info: [http://www.seismosoc.org/meetings/meetings.html](http://www.seismosoc.org/meetings/meetings.html) (7/08)

17. 3rd in Khan Lecture Series, Bethlehem, PA. Info: [www.lehigh.edu/frkseries](http://www.lehigh.edu/frkseries) (12/08)

**MAY**


**JUNE**


21-24. 19th World Conference on Disaster Management (WCDM), Toronto, Canada. Info: [www.wcdm.org/](http://www.wcdm.org/) (10/08)


22-25. NEES Annual Meeting, Honolulu, HI. See page 9. (2/09)


**AUGUST**


**SEPTEMBER**


**OCTOBER**


**NOVEMBER**


**DECEMBER**


2010

**MAY**

24-29. 5th Int’l Conf. on Recent Advances in Geotech. EQ Eng. & Soil Dynamics and Symposium in Honor of I. M. Idriss, San Diego, CA. Info: [5geoeqconf2010.mst.edu](http://5geoeqconf2010.mst.edu) (4/08, 1/09)

**JULY**


25-29. 9th U.S. Nat’l & 0th Canadian Conf. on EQ Eng.: Reaching Beyond Borders, Westin Harbour Castle Hotel, Toronto, Canada. Info: [2010eqconf.org](http://2010eqconf.org) (2/08, 7/08, 1/09)

**AUGUST**

30-Sept. 3. 14th European Conf. on EQ Eng. (14ECEE), Skopje-Ohrid, Macedonia. Info: [www.eaee.boun.edu.tr/eae.htm](http://www.eaee.boun.edu.tr/eae.htm) (12/08)
News of the Institute

Liquefaction Technical Seminar and E-Book

A day-long seminar will be given in four cities by I. M. Idriss and R. W. Boulanger, authors of the recently published EERI monograph sent to all members in 2008, Soil Liquefaction During Earthquakes. The monograph and seminar provide a synthesis — in one accessible resource for students, practicing engineers, and other professionals — of progress in the study of soil liquefaction since 1982. The following areas will be covered: fundamentals of liquefaction behavior; methods for predicting the triggering of liquefaction during earthquakes; methods for predicting the consequences of liquefaction, such as slope instability or ground deformations; mitigation of liquefaction hazards; and cyclic softening of clays and plastic silts.

The seminar will be held March 10 in Pasadena, California; March 12 in St. Louis, Missouri; March 17, in San Francisco, California, and March 19 in Seattle, Washington. The seminar fee is $225 for regular EERI members, $325 for nonmembers, and $113 for student, young professional, and retired EERI members. To register online, visit www.eeri.org.

E-Book Available

EERI is pleased to announce that Soil Liquefaction During Earthquakes is now available as an E-Book from EERI’s online store at $25.00 for members and $40 for nonmembers. This popular publication is part of the EERI Monograph Series and is available in hard copy at $45 to members, $60 to nonmembers and $40 for bulk orders (10 or more). Visit the online store today to purchase this E-Book and other recent EERI publications: http://www.eeri.org/cds_publications/catalog/.

Subscribing Members News

Kinemetrics’ New Product

EERI Subscribing Member Kinemetrics and Quanterra have introduced a new product, the Q330S, a portable, ultra-low power, broad-band data acquisition system. The new product applies Quanterra’s analog design leadership to Kinemetrics’ experience with the 4,000 Q330 units produced during the last five years. The Q330 has become a worldwide standard for seismic broad-band data acquisition systems. The Q330S was introduced to the seismic community at the European Seismic Commission meeting in Greece in September. The Q330S is an excellent choice for autonomous portable recording applications as well as permanent real-time seismic, infrasound, hydro-acoustic, structure, and volcano monitoring networks. Cost-effective and quality-consistent, the Q330S is simple to install and maintain, and comes with Internet-savvy communications and security and robustness for field applications. For more information, visit http://www.kinemetrics.com/aspen.html.