NEWS FLASH

The Civil and Environmental Engineering Department has won UNC Charlotte's 2013-2014 Provost's Teaching Excellence Award!

ALUMNI NOTES

The Civil and Environmental Engineering Department is always interested in keeping in contact with our alumni. We would love to stay updated on your professional advancements, achievements and other milestone life events. You can send such information to us, remembering to include your full name, the year you graduated, degree obtained, mailing and e-mail addresses, telephone number, current occupation, and position title. Also, a high-resolution photo is appreciated. Please e-mail all of your information to cee-comm@uncc.edu or send it via "snail mail" to:

The William States Lee College of Engineering Civil and Environmental Engineering EPIC Bldg 9201 University City Blvd Charlotte, NC 28223-0001



THANKS FOR

STAYING

CONNECTED!

Civil and Environmental Engineering 9201 University City Blvd Charlotte NC 28223





CIVIL AND ENVIRONMENTAL ENGINEERING



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LETTER FROM THE DEPARTMENT CHAIR

These are incredible times for the Department of Civil and Environmental Engineering at UNC Charlotte. We're now two years into our new 200,000-square-foot building, which features facilities and equipment that are unique to the country, and in some cases (our advanced cyclic shear device) all of North America.

Our department is approaching its 50th anniversary (2015) and continues to leapfrog ahead in every conceivable metric. In the past three years alone, our department has moved up five spots in the U.S. News and World Report rankings to 76, one of the largest changes of any CEE department nationwide.

During the past year we've hired three new faculty members, bringing our total number of internationally known experts to 21. These faculty guide our 400 undergraduates, and 100 MS/PhD students. CEE faculty and students travel the globe, as exemplified by professor Shen-En Chen's structural health monitoring work in the Philippines and our Engineers Without Borders student chapter building bridges in Peru. I encourage you to read more in this issue.

As always, we are grateful for the financial support from our alumni and friends, which helps us provide experiences and facilities that are second to none.

Warm regards,

Dr. John L. Daniels, P.E. Professor and Chair

Civil and Environmental Engineering



Dr. John Daniels. P.E.

THESE ARE

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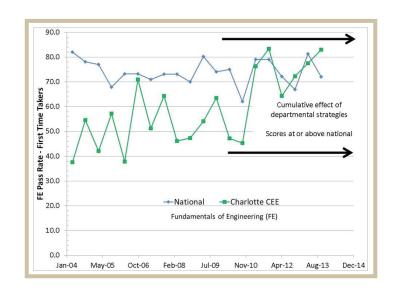
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ENGINEERING...





CIVIL AND ENVIRONMENTAL ENGINEERING WELCOMES THREE NEW FACULTY MEMBERS



WEI (DAVID) FAN

Associate Professor Ph.D. in Civil Engineering, The University of Texas at Austin

Research Interests:

Transportation network modeling and optimization, dynamic traffic assignment, network design/reliability, bottleneck identification/analysis, and pavement rehabilitation and maintenance optimization.



OLYA KEEN

Assistant Professor Ph.D. in Environmental Engineering, University of Colorado-Boulder

Research Interests:

Emerging contaminants (detection, fate, treatment, environmental and human health effects), wastewater treatment and water reuse, ultraviolet light-based treatment processes, and analytical chemistry.



MILIND KHIRE

Professor

Ph.D. in Geo-environmental Engineering, University of Wisconsin-Madison

Research Interests:

Field-scale hydrology, bioreactor landfills, contaminated groundwater treatment, green roofs, and geothermal systems.

CHI EPSILON GIVES PROSPECTIVE STUDENTS A TASTE OF UNC CHARLOTTE

"Explore" is UNC Charlotte's open house held four times a year in the James H. Barnhardt Student Activity Center. Chi Epsilon, the Civil Engineering honor society, makes the commitment to have representation at every "Explore" session to answer prospective students' questions, help with tours, and work behind the scenes to make everything happen.

"Explore" welcomes high school students, transfer students, and non-traditional students alike to UNC Charlotte. The event includes an academic fair where students can meet face-to-face with faculty and staff from all UNC Charlotte departments and colleges, and tours of the university.

Chi-Epsilon representatives typically speak to about 40 students at each "Explore" session. Their goal is to educate potential students about civil and environmental engineering, and what it's like to study at UNC Charlotte.

"We give them a sense of what civil engineering is all about," said Bill Boivin, the president of Chi Epsilon. "I like to tell them that civil engineering is the backbone of everything. It is the infrastructure upon which the country is built."

In addition to the information sessions, Chi Epsilon members give tours of CEE's home in EPIC. "It's great to get to show off the new 200,000-square-foot EPIC building," Boivin said. "The students and parents are always very impressed."



The EPIC building, home to the Department of Civil and Environmental Engineering.

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Ben Mohler. Director of Development

704-687-7213/ben.mohler@uncc.edu

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Return to:

THANK YOU FOR READING
THIS ISSUE OF THE CEE
NEWSLETTER. LET US
KNOW IF YOU HAVE ANY
SUGGESTIONS.

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DR. CHEN TAKES FORENSIC RESEARCH INTERNATIONAL

Dr. Shen-En Chen, a professor here at CEE, is making a long-anticipated trip to India this summer. Dr. Chen has been to India several times before, and is now returning as a Fulbright Scholar to teach and perform research at the National Institution of Technology Tiruchirappalli (NITT) for a full semester.

In 2007, NITT professor Dr. C. Natarajan spent a month at UNC Charlotte. During that time, he and Dr. Chen built a good working relationship, which continued even after Dr. Natarajan's departure. In 2010, they jointly organized the very first Indo-U.S Forensic Engineering workshop in India, which was funded by the National Science Foundation. Several CEE faculty members participated, including Dr. David Young, Dr. Brett Tempest and Dr. Rajaram Janardhanam.

Forensic engineering is not heavily practiced in other nations and Dr. Chen is delighted to have an opportunity to help the profession grow. "Forensic engineering is practiced all over the world," he said, "but the concept is fairly new. India does not have forensic engineering licensure. The American Society of Civil Engineers is trying to advance the profession internationally."

On this summer's trip, Dr. Chen will be in India for an extended period of time and he hopes to see more of the area. "I haven't even seen the Taj Mahal yet," he said. "I haven't really seen much of the beautiful country."

At a future date, Dr. Chen will also be doing forensic research in the Philippines. When Typhoon Yolanda hit the Philippines on Nov. 8, 2012, it was one of the strongest typhoons ever recorded. According to Dr. Chen, the hurricane had

sustained winds of 195 mph for up to one minute. Most buildings are designed to only withstand such wind speeds for three seconds. Dr. Chen and his team will do forensic investigations of structures built according to the Philippines equivalent of ASCE standards. They will also be studying structural damage from wind and storm surge impacts.

Dr. Chen will be uploading all of the media taken during the trip to a website specially designed by the Lee College of Engineering's MOSAIC computing group. The website will serve as a data collector, so that individuals not physically in the Philippines can still virtually assist with the forensic investigation. "This will be a great way to remotely facilitate teamwork from

engineering professionals all around the world," Dr. Chen said. "Civil engineers always works better in teams."



Dr. Chen and colleagues in Madurai, India.

DR. CHEN AND HIS
TEAM WILL DO FORENSIC
INVESTIGATION OF
STRUCTURES BUILT
ACCORDING TO THE
PHILIPPINES EQUIVALENT
OF ASCE STANDARDS.



Dr. Chen, right, with forensic research colleague Dr. S. Senthamilkumar of Periyar Maniammai University.

"THE FINAL OUTCOME EXCEEDED ALL OF OUR EXPECTATIONS."



The concrete canoe under construction.

ASCE CAROLINAS CONFERENCE

Forty-Niner green was everywhere at the American Society of Civil Engineers 2014 Carolinas Conference, as the Lee College of Engineering's ASCE student chapter fielded teams in every event at the March 6th competition at the Citadel.

"We participated in every single event," said Dr. Janos Gergely, the team's faculty advisor. "That's something we always try to do. It's tough to have students who are interested and available for every competition. So, we're always proud to have on record that we show up for every single event; rain or shine."

The three-day event was packed with civil-engineering-based competitions, and the UNC Charlotte ASCE chapter was up to the challenge. The 49ers placed first in the Balsa Wood Bridge, Transportation and T-shirt competitions; second in the Canoe Paper, Concrete Frisbee and Freshmore Challenge competitions; and third in the Quiz bowl, Overall Concrete Canoe, and Women's Race. Overall the UNC Charlotte team came in third place out of ten schools.

"The final outcome exceeded all of our expectations," said student Riska Zahrro. "Everyone performed phenomenally and worked their hardest. We'll definitely take this as a learning experience so we can make improvements and do better next year."



The team's total collection of trophies.



The 2014 UNC Charlotte ASCE team.