

Department of Civil & Environmental Engineering Newsletter

Maseeh College of Engineering and Computer Science

Message from the Chair



The new engineering building is progressing on schedule with a projected move-in date of December 2005. We are busy planning the transition to new office and laboratory space. This past fall we initiated two new courses in the Department: the Freshman Inquiry Design course taught by Carol Hasenberg and the

CEE Materials course taught by Dr. Peter Duscika. As shown below, the students enjoyed Carol's course and put her in the driver seat.



It's Carol in a 1955 Chevy! (freshman design course project)

We are also pleased to announce four new members of our CEE Advisory Council: **David Crawford** (Crawford Engineering), **Ela Whelan** (URS), **Jared Lewis** (Degenkolb Engineers), and **Al Barkouli** (David Evans & Associates). The Department is preparing for next fall's ABET accreditation visit. This includes creating a process of continuous improvement and documentation. We are also looking at a new off-site location for our concrete and structural testing laboratory, as well as pursuing two new faculty hires that would be joint with Geology and Environmental Sciences and Resources. See the progress of the Engineering building through the [live Web cam](#) on our home page.

Faculty Focus



Dr. Chik Erzurumlu, Dean Emeritus of the Maseeh College of Engineering and Computer Science and Professor Emeritus of Civil Engineering, continues to be active at PSU and in national professional circles. He currently serves on the Engineering Accreditation Commission of ABET representing

ASCE, and the ASCE Committee on Academic Prerequisites for Professional Practice (CAP³)/Accreditation. He is the immediate past Chair of Professional Engineers in Education, a Practice Division of

NSPE. Recently, as part of an \$8 million gift to the College by one of his former students, Dr. Fariborz Maseeh, Erzurumlu was recognized for his outstanding contributions as the founding Dean of the College. This lasting recognition is in the form of an endowment naming the Deanship of the College as the Erzurumlu Dean.

Faculty/Staff News

- ✚ **Dr. Peter Dusicka** coordinated a steel bridge design seminar sponsored by the National Steel Bridge Alliance in October. The workshop included nationally invited speakers and attracted over 100 local engineers from public agencies, consultancies, and fabricator firms. The seminar provided the latest in the economic design of steel bridges. Oregon has committed \$1.3 billion for the replacement and repair of 365 bridges on state highways.
- ✚ Last fall the **BBC network** was filming in Oregon and Washington for a science documentary on Cascadia earthquakes. They visited PSU to film a segment about earthquakes in the Pacific Northwest. Several PSU faculty and staff were involved. **Andrew Drexler**, **Peter Dusicka**, and **Wendelin Mueller** opened the Seismic Testing and Applied Research (STAR) Laboratory for demonstrations of the effect of a subduction zone earthquake, a probable cause of a "big one" for this region. The STAR Lab demonstration was in cooperation with the Oregon State Department of Geology and Mineral Industries (DOGAMI).

Student News

2004 Chinook Award - Metro Regional Parks and Greenspaces recently presented the "2004 Chinook Award" to PSU Civil and Environmental Engineering students **Wade Ansell**, **Mike Beyer**, **Salina Bird**, **Jeremy Brester**, **Jeff Chen**, **Michelle DeGano**, **River Hwang**, **Tina Lundell**, **Mike Lundervold**, **Danae McQuinn**, **Andrey Nikolayev**, **Jeremy Parrish**, **Kaha'a Rezantes**, **Erik Wahrgren**, **Robert Wahrgren**, **Dan Ward** and **Thareth Yin** and their advisor **Dr. Robert Bertini**.

This award was presented by Metro Council President David Bragdon for outstanding volunteer group contributions to Metro Regional Parks and Greenspaces, and was based on a project which prepared preliminary engineering feasibility drawings and cost estimates for the Sullivan's Gulch Trail which would parallel I-84. The work was conducted as part of the service learning component of CE 454, Urban Transportation Systems, was used by PSU Urban and Regional Planning students during spring 2004 as part of a workshop project. The combined results have helped Metro seek federal transportation funds to further plan and design the regional trail project. Congratulations to all the students involved in this project!

ASCE Student Chapter News

- The ASCE Student Chapter is preparing for the annual Northwest Regional Conference, which will be held at Montana Tech during the weekend of April 7 – 10.
- The Chapter will be hosting the truss design portion of the annual MCECS design competitions for K-12 students. The event is part of National Engineering week in February.
- The ASCE Chapter is holding a Career Fair with OSU on February 28th at PSU. Check their calendar of events at www.asce.pdx.edu for all activities.

Research Grants Fall 2004

Faculty	Title	Sponsor	Amount
C. Monsere	Crash Reporting	ODOT	\$15,000
R. Bertini	Transp Visiting Scholars	ODOT	\$3,000
B. Fish	Tech Advice	Metro	\$5,000
T. Smith	Digital Soil Nails	FHWA	\$76,500
C. Monsere	Speed Limits	ODOT	\$41,971
R. Doneker	Environmental Impact Assess	USBR	\$99,020

Alumni Profile

New Advisory Council member and PSU alumnus Ela Whelan is a great example of how Civil Engineering offers a variety of career paths. Graduating in 1984 with a general Civil Engineering degree, Ela started work in the wastewater field for a consulting engineering firm known as Kramer, Chin and Mayo Engineers. She was involved in the design of pipelines, pump stations and the development of masterplans. She notes that the advantage of a relatively small office included the opportunity to learn a number of tasks including construction management. The firm, which has since shortened its name to KCM and merged with TetraTech, allowed her to provide services that started with planning (known as masterplans), which turned into design projects that led to construction. She worked for KCM until 1991 at which time her work had changed to drainage and water quality projects.



In 1991 Clackamas County needed someone to start their surface water program to address the Clean Water Act regulations. Ela worked for Clackamas County until July 2004. In these thirteen years she developed the water quality program for the County, created two districts to provide funding, implemented a program to meet National Pollutant Discharge Elimination System (NPDES) permit requirements, and implemented a second program to address water quality problems specific to the Tualatin River. Her current work is for URS Corporation, an environmental consulting firm in Portland. She works mainly with drainage and water quality projects including permitting projects for municipal and industrial clients and basin planning or masterplans for municipalities in Washington and Oregon.

Ela is currently transitioning to work in mediation/conflict resolution. Taking advantage of her municipal and environmental background, she works on public policy and environmental mediation projects. In 1994, she completed a Civil Engineering Master's degree at PSU working on a clarifier research project with Dr. Wells. We welcome Ela to our Advisory Council!

New Building Tours



Tours of the new Maseeh College of Engineering and Computer Science building – Advisory Council, students and faculty.

Donors

Donors to CEE for July 2004 through January 2005 include: David Evans and Associates, Inc., Richard and Daralee Johnson, Noreen and Kenneth Robbins, Kevin and Rima Schock, Gary Sick, Anthony and Anna Stratis, and Scott and Leah Wells. Thank you for your support!

How to Donate to CEE

A check payable to "PSU Foundation-CEE" can be mailed to: Portland State University Foundation, P.O. Box 243, Portland, OR 97207-0243. Please specify that your donation is for the Department of Civil & Environmental Engineering; this ensures that your entire donation will be directly available for our Department to use to support the ASCE Student Chapter, upgrade student labs and equipment, etc.