

The Department of Civil, Environmental and Architectural Engineering
At the
University of Kansas
Presents
The Science and Practice of Civil, Environmental and Architectural
Engineering

Spring 2008

This series will be presented in the auditorium at Burns & McDonnell, 9400 Ward Parkway, Kansas City, MO. Presentations will be on Mondays from 4 – 6 p.m.

Eleven topics will be taught by the faculty of the Department of Civil, Environmental and Architectural Engineering and the Department of Engineering Management at the University of Kansas and will cover current issues in practice. Two hours PDH credit will be given for each session.

February 18 Chick Keller **Effective Leaders, Effective Managers, and Effective Leadership Styles**

The presentation will cover the roles and characteristics of effective leaders and managers. Different types of leaders, such as charismatic, pragmatic, and Tom Collin's "Good to Great Leader" will be discussed. Additional two successful leaders, Jack Welch, the long time president of General Electric, and Bobby Knight, perhaps American's greatest basketball coach will be profiled.

February 25 Brian Rock **Introduction to Sound**

This PDS will present the fundamentals of acoustics, how sound is perceived by humans, and how noises are measured and compared. If your previous physics and engineering courses didn't include basic 'noise and vibration control', this seminar is for you! Be sure to bring your ears with you.

March 3 Tom Bowlin **Math Modeling for Your Toolkit**

- Acquaint participants with the field of mathematical modeling, specifically as connecting with practical engineering and other technical applications
- Outline a standard process for mathematical modeling
- Engage participants in a detailed mathematical modeling demonstration, applying the discussed standard process and utilizing the built-in capabilities of Microsoft Excel
- Offer suggested follow-up resources, including guidance on related professional associations and publications

March 10 Bob Parsons **Design of MSE Walls with Lateral Loads**

This session will consist of a summary of the design procedures for mechanically stabilized earth (MSE) walls, followed by recommendations for using deep foundations within the MSE wall mass to resist lateral loads, such as wind loads.

MARCH 17TH – NO CLASS

March 24 Caroline Bennett **Load and Resistance Factor Design of Steel Plate Girders**

Design of steel plate girders using LRFD will be discussed, with a primary focus on bridge applications using the AASHTO 2007 LRFD Bridge Design Specifications. Limit states in flexure, shear, and fatigue will be covered.

March 31

Dennis Lane

The Biofueled Vehicle Craze; or Why Vegetables Are Probably Good for You

A discussion of the various biofuel options will be presented with an emphasis on their feasibility for the mass market. This will include environmental considerations, economic realities and political twists.

April 7

Ted Peltier

Sustainable Stormwater Treatment and Management

Stormwater runoff can contain a variety of pollutant compounds in quantities that can degrade the quality of receiving waters. As a result, regulation of stormwater runoff for water quality reasons is becoming increasingly common. This talk will present an overview of stormwater quality issues and regulations, and discuss low-impact approaches to improving stormwater quality before discharge.

April 14

Tom Mulinazzi

Professional Ethics

You will be challenged more with ethical issues than technical issues during your professional career. How will you react to these ethical issues; how should you react to these issues? Ethical situations cover a very gray area and engineers usually think in a black and white world. Let's discuss how you would handle different ethical based events.

April 21

Dave Parr

Laboratory Studies for KDOT

Laboratory studies of the Atchison bridge scour, culvert bend losses, and general bridge modeling will be discussed.

April 28

Yong Bai

Conducting Business Overseas: Strategies for US A/E/C Firms

Engineering and construction business overseas provides great opportunities to US A/E/C firms. To be profitable, US firms must adopt the right business strategies. This presentation will introduce engineering and construction practices overseas, entry modes for entering the overseas market, and case studies in the Chinese market.

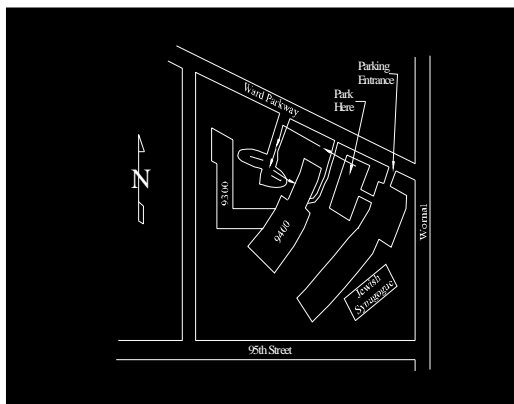
May 5

Adolfo Matamoros

Evaluation of Reinforced Concrete Buildings Using the ASCE/SEI 41-06 Standard

The recently published ASCE/AEI standard is intended for the evaluation and seismic rehabilitation of existing buildings. The standard was developed based on performance-based engineering methods and provides guidance about how to simulate the response of structures up to collapse. The presentation will focus on the main methods to simulate the response of R/C structures, and particularly on criteria for modeling the behavior of structural components. The presentation will include recent changes included in the addendum to ASCE-41.

Session tickets, which are transferable, are \$50 for each session of the 11 session series. There are a limited number of tickets. To obtain a ticket, contact Carol Jo Sloan, Department of Civil, Environmental & Architectural Engineering, 2150 Learned Hall, University of Kansas, Lawrence KS 66045. Telephone (785) 864-3766. Email: cjsloan@ku.edu



Each participant of each session will have their ticket stamped confirming attendance, the topic discussed, and verifying the 2.0 PDH credit.

Please park in the Jewish Synagogue parking lot. Use the north lot, which is closest to the 9400 Building and then take the sidewalk to the front Burns & McDonnell entrance. ***This is the same parking lot we used last year. Parking in the Burns & McDonnell lot is strictly prohibited.***