



“Sustainability in Building Design, Construction and Operation”

Location: Terrace Room, Bucknell University

Date and Time:

Wednesday, July 18

8am - 4:30pm

Fee: \$15 (includes lunch)

Speakers/ Organizers:

Bucknell University SBDC and Professors
Dr. Maurice Aburdene, Electrical Engineering
Dr. Stephen Buonopane, Civil and Environmental Engineering
Dr. Thomas Rich, Mechanical Engineering
Dr. Peter Stryker, Mechanical Engineering

Who should attend:

Architects, Engineers, Builders,
Technology Vendors
Anyone with an interest in the topic of Sustainability
Anyone involved in Pennsylvania's Modular Housing Industry

Description:

With the growing world problems associated with increasing energy demand, the concept of sustainability in the design, construction and operation of buildings has taken on significant proportions. Penn State Professor David Gissen's book, *Big and Green*, states that about 50% of current carbon emissions into the atmosphere can be traced to the construction and operation of buildings. Professor Volker Hartkopf from Carnegie-Mellon stated in a recent presentation on campus that about the same percentage applies to the national energy demand for buildings. That indicates that building design, construction and operation offers a great potential for long-term improvement in efficient energy use and the environment. The main functional areas outlined in *Big and Green* include air, water, light, heating, building materials, vegetation, and the location/orientation of structures.

This seminar and workshop will explore current principles and practices for sustainability in building design, construction and operation. It will include presentations from invited speakers on topics related to sustainability, information from vendors of building technologies useful in sustainable building design, construction and operation, an open forum soliciting ideas for an experimental "test-bed" at Bucknell for evaluation of sustainable building technologies and practices, and possibly a tour of a local "green" building. This program will facilitate discussion among potential providers, implementers and users of sustainable buildings in Pennsylvania. An outcome of this summer institute will be a proposal for external support to build the test-bed for sustainable building concepts, which can be used for teaching, research and dissemination of information to interested parties on the developing field of sustainability in building design, construction and operation.

Sustainability in Building Design, Construction and Operation

Registration

Name(s) _____ Amount Enclosed (\$15 each)\$ _____

Company Name _____

Address: _____

City, State, Zip _____

Email _____

**Please remit check payable to Bucknell University SBDC
112 Dana Engineering
Lewisburg, PA 17837**

**(570)577-1249 (v)
(570) 577-1768 (fax)
www.bucknell.edu/sbdc**



**A Bucknell University Summer Institute on
Sustainability in Building Design, Construction and Operation**

Date: Wednesday, July 18, 2007

Location: Terrace Room, Elaine Langone Center, Bucknell University

Schedule of Events:

- 7:30 a.m. Continental Breakfast, Vendor Exhibits
- 8:00 a.m. Welcome and Comments: Dean James Orbison
- 8:15 a.m. *Defining Sustainable Practices*, Dorothy Gerring,
Registered Architect, Associate Professor, Pennsylvania College of Technology
- 9:00 a.m. *Making the Best Use of Energy Modeling in Designing High Performance
Green Buildings*, Andy Lau, Associate Director, Center for Sustainability,
Penn State University
- 9:45 a.m. Break
- 10:00 a.m. *Integrating LEED Principals into the Non-integrated Design Process*,
Ted Strosser, AIA, LEED AP, R.A. Lack Architecture & Design, Inc.
- 10:45 a.m. *An Introduction to Renewable Energy Systems, and Improving Thermal
Integrity of Buildings*, Pam Denlinger, Solair Energy, Inc.
- 11:30 a.m. *MorningStar – The Solar Decathlon*, Student Presentation, Penn State University
- 12:15 p.m. Lunch
- 1:15 p.m. Panel Discussion: *Issues and Perspectives on Sustainability*
Don Stringfellow (PP&L), Stacy Richards (SEDA-COG),
Shaun Pardi (Envinity, Inc.), Steve Stamos (Bucknell)
Pending: Rich Tornetta (Luminosity), Herb Wilcox (Bucknell Alum)
- 2:15 p.m. Open Forum on *Ideas for an experimental "test-bed" at Bucknell
for evaluation of sustainable building technologies and practices*
- 4:00 p.m. Reception/Mixer, Vendor Exhibits
- 5:00 p.m. Close of Day