Northern Nevada Chapter 126

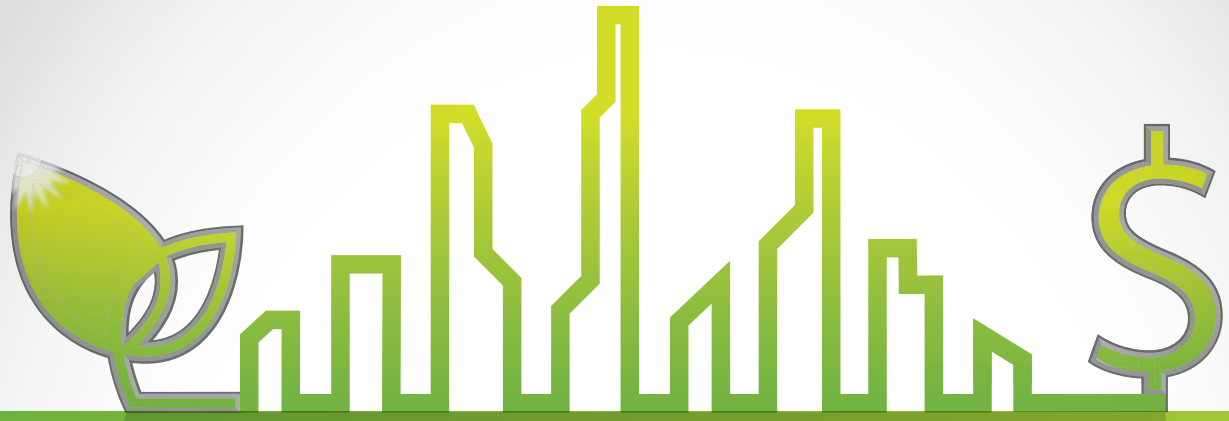
The Northern Nevada Chapter of ASHRAE is pleased to announce that we will be hosting a webcast at UNR for the ASHRAE presentation of "Making Net Zero Net Positive."

Lunch will be provided at noon.

Information of the webcast is attached.

Date: Thursday, April 21, 2016
Start Time: 10:00 AM – 1:00 PM (Room will be available at 9:30)
University of Nevada, Reno
Joe Crowley Student Union
Conference room #324

FREE
ASHRAE Webcast
2016



Making Net Zero Net Positive:

Solving the Efficiency & Cost Paradox

April 21, 2016 | 1:00–4:00 p.m. EDT

Brought to you by the ASHRAE Chapter Technology Transfer Committee.

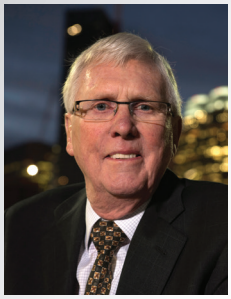
This webcast will feature industry experts who will define the importance of, and why we should strive for, net zero in the built environment. Viewers will be able to identify behaviors that create more effective ownership, design and construction teams, and will recognize the value of a collaborative process in building design and the impact on costs. With a strong emphasis on real-world applications, the program will also discuss the primary technical and financial challenges in achieving net zero buildings, and where this design approach can best be applied.

Attend this FREE webcast program and you may be awarded 3 Professional Development Hours (PDHs), 3 AIA Learning Units (LUs), or 3 GBCI Continuing Education Hours (CEs).

www.ashrae.org/webcast

ASHRAE®

ABOUT OUR SPEAKERS



T. David Underwood, P.Eng., Fellow ASHRAE, Life Member, CPMP

ASHRAE President | Oakville, Ontario, Canada

As ASHRAE's president, Underwood chairs the Society's Board of Directors and Executive Committee. His presidential theme is "Making Connections." Underwood was awarded a Bachelor of Science in Civil Engineering from the University of Manitoba. Immediately upon graduation, he entered the HVAC&R industry and was employed by a major products manufacturer for approximately 10 years. In 1975, Underwood founded Isotherm Engineering Ltd., an HVAC&R design-build enterprise, which continues to be operational.

Marc Brune, P.E.

Senior Associate and Mechanical Engineer | PAE | Portland, OR

Marc is a senior associate and mechanical engineer with PAE, a national leader in sustainable design. Marc's focus is on integrated design and leveraging architectural, mechanical, electrical and plumbing systems to work together to achieve sustainable and cost effective buildings. Marc has led the development of mechanical design, energy modeling, and comfort modeling for several buildings that have achieved or are pursuing net zero energy goals. Marc has more than 14 years of experience and holds a Master's degree in Mechanical Engineering from the University of Washington and a Bachelor's degree from the University of Portland.

Philip Macey, AIA

National Director of Collaborative Delivery | JE Dunn Construction | Denver, CO

Phil Macey is dedicated to the collaborative and expert delivery of high value and cost controlled facilities that will help shape the 21st century. An architect for over twenty five years, Phil brings specialized expertise in the design and construction of complex facilities for a wide range of commercial, research and manufacture clients. Phil has led teams in the creation of challenging projects, from net zero energy facilities to corporate headquarters and clean rooms to research labs. Phil joined JE Dunn Construction as the National Director of Collaborative Delivery, leveraging the power of collaboration in concert with BIM, prefabrication, Lean, and Last Planner System to bring owners and design teams high performance facilities on conventional budgets.

Paul Torcellini, Ph.D., P.E.

Principal Engineer for Commercial Building Research | National Renewable Energy Laboratory | Golden, CO

Paul Torcellini is a Principal Engineer for Commercial Buildings Research at the National Renewable Energy Laboratory (NREL), a DOE national laboratory. He is also on the faculty at Eastern Connecticut State University teaching sustainable energy courses. Paul was an instrumental part in creating the process to achieve the Zero Energy Building status for NREL's Research Support Facility and working on definitions for Zero Energy Buildings. Paul has been at NREL for 21 years and is a registered Professional Engineer holding a PhD from Purdue University. He has authored or co-authored more than 50 papers and articles related to energy efficiency and zero-energy commercial buildings. He has been key in the development of the Advanced Energy Design Guide series from ASHRAE and has chaired the project committees for two of the guides.

What Will I Learn?

After attending this webcast, participants will be able to:

- Define the importance of, and why we should strive for, net zero in the built environment.
- Identify behaviors that create more effective ownership, design and construction teams.
- Discuss the primary technical and financial challenges in achieving net zero buildings.
- Explain where a net zero design approach can best be applied.
- Recognize the value of a collaborative process in building design and the impact on costs.

How Do I Register?

You must register for the webcast. Online registration for the Webcast begins **March 21, 2016** on our website at **www.ashrae.org/webcast**. There is no fee for registration. The registration form requests that you confirm your email address. Your email address will be required to login to the live webcast. The link to access the webcast page will be emailed to participants when they complete registration.

How can I participate?

- Host a webcast group viewing for your colleagues
- View the webcast at a site
- Register to view the webcast on your PC
- Create a Chapter event around the viewing
- Plan an after-hours event utilizing the Webcast On Demand
- Design a networking event with a local Student Branch

Can I earn PDHs?

YES! Three (3) Professional Development Hours (PDHs), Three (3) American Institute of Architects Learning Units (LUs), or Three (3) GBCI Continuing Education Hours (CEs) may be awarded to viewers who complete the Participant Reaction Form by May 6, 2016. Visit **www.ashrae.org/webcast** for more information.

Unable to Attend?

If you are unable to participate in the live webcast, it will be available On Demand for two weeks following the broadcast. Registration is necessary to view the On Demand program.

Test Your Equipment

When you complete registration, you will be given a link to test your system. This test will alert you immediately if your computer system is not properly set to see and hear the webcast.

How the Webcast Works

A webcast is the streaming of audio and video to an audience over the Internet. The live webcast will originate from Encompass Digital Media in Atlanta, GA. The link to access the webcast page will be emailed to participants when they complete registration.

Group Logistics/Planning Checklist

One to Two Months in Advance

- ☐ Secure a viewing location. Know and coordinate your technical support staff's names and contact information.
- ☐ Promote the webcast program. Target a wide audience. Use the media kit available at **www.ashrae.org/webcast**.
- ☐ Register online starting **March 21, 2016** at **www.ashrae.org/webcast** and save the link provided with your email confirmation to access the webcast.
- ☐ Reserve and test your equipment.
- ☐ Initiate and maintain an accurate participant headcount. Use a signup sheet or email RSVP. Site coordinators are responsible for maintaining an accurate attendee headcount.
- ☐ Encourage participants to arrive at least 20 minutes prior to the webcast.

Two Weeks Prior to the Webcast

- ☐ Test your equipment and confirm technical arrangements.
- ☐ Confirm headcount.

One Day before the Webcast

- ☐ Test your equipment.
- ☐ Inspect your viewing location.
- ☐ Check seating capacity and, if possible, reserve extra chairs.
- ☐ Expect participant questions and, if possible, provide 3"x 5" note cards.
- ☐ Talk to prospective participants to identify questions for the speakers.
- ☐ Make arrangements for coats and other personal items to be safely stored (closets, coat racks, coat hooks, etc.).

At Least One Hour Prior to the Webcast

- Arrive at the site.
- Check with the technical support staff to ensure that equipment is operational.
- Notify your technical coordinator if problems occur with audio or video transmission, and if necessary, contact technical assistance. Resolve any communication or technical problems that may arise at your site.
- Welcome attendees and help them feel comfortable with the set-up ("housekeeping notes") and field any last-minute questions. (Note: You may wish to include your own educational programming information as part of the schedule of events.)
- Remind viewers to be in their seats 10 minutes before the program begins.
- Plan to complete all activities before the webcast is scheduled to start. The link to access the webcast page will be emailed to you when you complete registration. Site Coordinators should log on with their email address approximately ten (10) minutes prior to the start of the webcast.
- Check your program agenda so you are aware about 5 minutes ahead of time when the Question and Answer segments will begin. You should move to the side/front of the room so that the audience can see you.

During The Webcast

- Have a technical support manager on site.
- Be prepared for troubleshooting and problem solving.
- Facilitate interaction.
- Submit your questions to the webcast presenters using the interface on your screen.
- Download the program presentation slides. The link to download the slides will be accessible in the webcast viewing auditorium on **April 21st**.

Following the Webcast

- Direct participants to complete the Participant Reaction Form online at **www.ashrae.org/webcast**.

Technical Personnel

Please ensure that someone who knows how to operate the equipment is available before and during the webcast. The technician should be onsite by 11:00 a.m. EDT the day of the webcast to set up and test the equipment. Please use this time to resolve any technical problems that may arise.

The technician should—

- Recommend the type of equipment to be used.
- Set up any needed audio or video lines from the PC to the video projector and audio system. Make sure that the audio can be heard in all areas of the room.
- Be prepared to access the link to the webcast approximately ten (10) minutes prior to the start of the webcast.
- Set up a house microphone for in-room speeches and announcements at your site before, during, and after the webcast (optional).
- Ensure that the room is dark enough for the attendees to easily see the video image on the screen.

For More Information about the Webcast:

Visit **www.ashrae.org/webcast** for information and complete details about the program, continuing education credits, speakers, and registration.

If you have additional questions, contact us at: 678/539-1200, or ashrae-webcast@ashrae.org.

How can I become an ASHRAE member?

We encourage you to join ASHRAE, a leader in sustainability and the source for the latest technology in HVAC&R. To learn about ASHRAE membership, visit **www.ashrae.org/membership.**