



## November 2013

A Newsletter for the Iowa Chapter of ASHRAE

#### ASHRAE Iowa Chapter www.ashraeiowa.org

- Board of Governors -Adam Gudenkauf Mitch McColloch Dan Ponxs Dan Zaug

> - Officers -President Tim Conrad

President Elect Justin Barrett

Treasurer Matt Gumm

Secretary Andrew Pospisal

- Committee Chairs -Attendance/Reception Fred Miller

> Auditing Susan Oltrogge

CTTC Xaiohui (Joe) Zhou Britt Vincent

> e-Committee Jason Kems

Education Kit Cartwright

GGAC David Poetting

Historian Matt Jesson

Honors & Awards Kelly Crow

Membership Patrick Peterson

YEA Val Hageman

Refrigeration Christopher Deal

Research Promotion Vince Sanders Luke Miller

Student Activities Holly Elbert Mike Wolfe

> TEGA Emir Kadic

# THIS MONTH AT ASHRAE DDC Seminars and Resource Promotion

#### Date:

Tuesday, November 12<sup>th</sup>

#### Morning Session:

8:00AM-1:00PM: Advanced VAV Control Sequences (includes lunch) – Sponsored by Iowa Energy Center

Cost: \$90 (50% discount for ASHRAE lowa members)

Registration: Closed

#### Afternoon Session:

1:00-5:00PM: Optimizing Chilled Water Plant Controls – Sponsored by ASHRAE Iowa

Cost: \$90 (50% discount for ASHRAE lowa members)

Registration: click here

Chapter Meeting: 5:00-6:00PM: Social Hour – sponsored by Mechanical Sales, Inc.

> 6:00-7:00PM: Dinner/Chapter Meeting

7:00PM: Tour of Iowa Events Center

#### Sessions/Meeting/Dinner:

Iowa Events Center Hy-Vee Hall, Rm 101 730 Third Street Des Moines, IA click for map

#### Tour:

Tour of Iowa Events Center mechanical systems including: ice chiller plant, boiler plant, building control system, and misc. systems

Dinner Cost: Free to ASHRAE Iowa Chapter members \$20 for Guests

#### RSVP:

Registration for dinner is now closed



Come join us in downtown Des Moines at the Iowa Events Center – Hy-Vee Hall on Tuesday, November 12<sup>th</sup> for a full day of activities.

Steven Taylor, P.E., F ASHRAE, will be presenting two seminars during the day: Advanced VAV Control Sequences in the morning and Optimizing Chilled Water Plants in the afternoon.

In the evening we'll conduct our monthly chapter meeting and then take a tour of the lowa Events Center mechanical systems. Don't miss out!

#### PAST PRESIDENTS

Matt Jesson	2012-2013
Kelly Crow	2011-2012
Holly Elbert	2010-2011
Roger Lesher	2009-2010
Kit Cartwright	2008-2009
Jerrod Sieverding	2007-2008
Jason Kems	2006-2007
Chuck Heldenbrand	2005-2006
Jeff Gross	2004-2005
Ron Engelhardt	2003-2004
Dan Zaug	2002-2003
Susan Oltrogge	2001-2002
Christopher Nelson	2000-2001
Donald Swanson	1999-2000
Edward Truslow	1998-1999
James Hall	1997-1998
Robbin Vannoy	1996-1997
Mark Conway	1995-1996
Paul Melton	1994-1995
Gregory Maxwell	1993-1994
Jeffery Hammer	1992-1993
Jack Culp	1991-1992
James Lee Clint Leonard	1990-1991 1989-1990
Charles Pedersen	1988-1989
Gary Reynolds	1987-1988
Dennis Hogan	1986-1987
Eugene Zefron	1985-1986
Donald Hagge	1984-1985
Robert Rist	1983-1984
Joseph Proctor	1982-1983
Mark Allen	1981-1982
Curtis Klaassen	1980-1981
Gerald Anderson	1979-1980
C.W. Miller	1978-1979
Richard South	1977-1978
Verne Stewart	1976-1977
Curtis Hammer	1975-1976
Ralph Schilling	1974-1975
Donald Bonicamp	1973-1974
Kent Mosher	1972-1973
Thomas Van Hon	1971-1972
Robert McBride William Whitman	1970-1971 1969-1970
Einar Dahl	1968-1970
Eugene O'Neil	1967-1968
James Green	1966-1967
Neil Hanson	1965-1966
Bob Flanagan	1964-1965
Lyndon Kelley	1963-1964
Elwood Giberson	1962-1963
Vern Polly	1961-1962
John Bain	1960-1961
Crom Campbell	1959-1960
R.T. Howard	1958-1959
W.A Schworm	1957-1958
D.E. Schroeder	1956-1957
G.J. Kraai	1955-1956
W.E. Nanes	1954-1955
J.F. Sandfort	1953-1954
R.H. Schnell	1952-1953
C.H. McGuiness	1951-1952
R.S. Stover D.E. Wells	1950-1951 1949-1950
D.C. Murphy	1948-1949
C.A. Wheeler	1947-1948
E.O. Olson	1946-1947
B.E. Landes	1945-1946
W.W. Stuart	1944-1945
C.W. Helstrom	1943-1944
P.E. Triggs	1942-1943
Perry LaRue	1941-1942
R.A. Norman	1940-1941
Tracy Johnson	1939-1940
W.R. White	1938-1939

# **President's Corner**



The leaves are falling and winter is approaching quickly. This means less time outside enjoying the weather and more time indoors thinking of ASHRAE!

I hope you had the opportunity to attend the October meeting in Ames, IA. It was a great time with a focus on student membership. The event started with a round table discussion at Olde Main with several Iowa State University engineering students in attendance. The panel of industry professionals consisted of most areas represented by ASHRAE - consulting, research, sales, contracting, controls, and testing/balancing. The round table discussion was followed by a dinner, scholarship awards presentation, and tour. Special thanks to the Student Activities committee for increasing scholarship application responses. They presented to engineering classes and attended career fairs to spread the word that we were offering three \$1,000 awards. We received 17 applicants this year compared to

only 3 last year which is beyond impressive. The next event will take place on Tuesday, November 12 at the lowa Events Center and is held in conjunction with the Iowa Energy Center. Our focus for this year's programs is to provide many different avenues for professional engineers to obtain affordable professional development hours (PDHs). In addition, we want to reach out to other professional organizations to hold joint meetings and share resources to gain better attendance. The daylong session presented by Steve Taylor offers up to 8 PDHs. The total cost works out to be \$90 for ASHRAE members and \$180 for non-members. This is a small drop in the bucket when compared to the cost of attending most other technical sessions offering PDHs. Lastly, mark Monday, December 16th on your calendars for the joint meeting with SMCI and CSI. As in recent years, it will be a lunch meeting at the Holiday Inn Mercy Campus. Eli Howard from SMACNA will talk about IAQ regarding ductwork protection and sealing during construction. Stay tuned for the remaining programs in future newsletters. Hope to see you all at the upcoming Iowa Chapter events!

Tim Conrad Iowa Chapter President 2013-2014

## UPCOMING CHAPTER MEETINGS

#### November 12<sup>th</sup>

Morning and afternoon technical sessions on DDC controls

Location: Iowa Events Center Des Moines, IA

December 16<sup>th</sup> Topic: Past Presidents / History (joint w/ CSI and SMCI)

Location: Downtown Holiday Inn Des Moines, IA

## **ASHRAE Iowa October Meeting**



At the October meeting we were able to present a total of four scholarships to wellqualified recipients. Congratulations to Beth Lynch for winning a \$3000 National ASHRAE scholarship and congratulations to the following students for each winning a \$1000 scholarship from the ASHRAE Iowa chapter: Jace Christensen, Andrew Gall, and Brandon Schnier.

We had a total of 17 scholarship applications this year thanks to hard work by the Student Activities Committee co-chairs, Holly Elbert and Mike Wolfe.

A number of attendee's also made the trip on campus for a very informative tour of the new ISU Agricultural and Biosystems Engineering Phase 2 building which is scheduled to be complete new summer.

Visit the following link to see more pictures from October's meeting: October Meeting Pics

## **December Meeting**



# Past Presidents / History joint lunch meeting with CSI and SMCI

Schedule:

11:15AM: Registration
11:30AM: Buffet
12:15PM: ASHRAE and/or CSI business
12:25PM: Presentation by SMACNA's Director of Technical Resources, Eli Howard, on IAQ during construction – protection and sealing.

**Location:** Holiday Inn – Downtown, top floor

## **Meet Your BOG Officers**



**Back Row** (Left to Right) Chris Deal, Refrigeration Dan Ponxs, BOG Jason Kems, e-Committee Luke Miller, RP David Poetting, GGAC Vince Sanders, RP Justin Barrett, President-Elect

Front Row (Left to Right) Dan Zaug, BOG Tim Conrad, President Kelly Crow, Honors/Awards Matt Gumm, Treasurer Matt Jesson, Historian Britt Vincent, CTTC Xiaohui (Joe) Zhou Patrick Peterson, BOG

# ASHRAE Technology Award (TEGA)

The ASHRAE Iowa chapter would like to congratulate Scott Bowman of KJWW Engineering for being selected as a Second Place winner of an ASHRAE Technology Award in the Commercial Buildings – New Category for his submission of the Iowa Utilities Board/Office of Consumer Advocate Office Building project in Des Moines.

The ASHRAE Technology Awards program recognizes outstanding achievement in the design and operation of energy-efficient buildings. The project will be featured in the March 2014 issue of the ASHRAE Journal.

## IECC-2012 or ASHRAE 90.1-2010; Which is Right for Your Project?

On October 24th, the Iowa Energy Center sponsored a free webinar titled "IECC-2012 or ASHRAE 90.1-2010; Which is Right for Your Project?" by Jeff Boldt, PE, LEED AP, HBDP, Director of Engineering at KJWW.

The recorded session is now available at: https://connect.extension.iastate.edu/p2cpvfl1k1a/

The presentation can be downloaded here: <u>Download Presentation</u>

# Iowa Public Buildings Benchmarking Program



## PUBLIC BUILDINGS BENCHMARKING PROGRAM

#### help public buildings save energy and money

Buildings consume approximately 40 percent of total energy use in the U.S. Energy efficiency is an easy way to save dollars, but how does one decide where to make those efficiency improvements? Through strategic planning, building managers can use public funds more effectively to make buildings more energy efficient.

Benchmarking is a tool to identify potential energy savings by comparing the current buildings' energy use to an energy code compliant building. This valuable tool increases awareness and helps building managers obtain information about the status and trend of Iowa's building energy use compared to their building(s). By making energy performance measureable and visible, organizations can take actions to improve the efficiency of buildings by identifying where the buildings' weaknesses lie and allocating dollars to those projects.

# Benchmarking is the first step in a three-step process to use energy efficiency to save money for public buildings.

REVIEW



TRACK ENERGY USAGE

Participation in the Iowa Public Building Benchmarking Program for qualified public facilities is available at no cost for up to 800 selected buildings. Assistance for data entry and management is provided through the Iowa Energy Center, freeing up time and money to focus on achieving and measuring results. If managers need assistance in identifying ways to make facility improvements based on the results seen, the Iowa Building Benchmarking Partnership can help gain easy access to local energy assistance programs offered. Enrollment period for public buildings will end December 1, 2013

IMPLEMENT

PROJECTS FOR SAVINGS

To participate, please visit: https://ia.b3benchmarking.com

For more information contact: Jeff Beneke jeff.beneke@uni.edu | 319.273.3850

## Iowa Building Benchmarking Partnership

The Partnership is a collaboration between the Iowa Economic Development Authority, the Iowa Energy Center, Center for Energy & Environmental Education and The Weidt Group. Together, this expertise helps Iowa public building managers track energy usage, review potential savings and implement projects that will result in significant savings in a short payback period.









## ASHRAE's Attic & Antiques



Have you ever encountered pieces of HVAC history while working on remodel projects? Are you fascinated by the origins of modern HVAC equipment? If so, help us to launch our new section, ASHRAE's Attic & Antiques. We're trying to populate our newsletter and website with fascinating old photos and historical anecdotes, preferably with a local bent. Send your photos and stories to Matt Jesson at <u>mattj@hvactab.com</u>

## The HVAC&R Industry

#### Energy Efficiency Is World's Most Important 'Fuel'

PARIS—Energy efficiency is the world's most important "fuel," according to a new report from the International Energy Agency (IEA). Investments in energy efficiency provide such large savings that the energy saved completely surpasses the energy generated by most forms of generation. "The scale of recent investment in energy efficiency worldwide makes it as significant in its contribution to energy demand as investment in renewable energy or fossil fuel generation," states the *Energy Efficiency Market Report*. IEA calculates that between 2005 and 2010, that energy-efficiency measures in 11 of IEA's member countries, including the United States, saved the energy equivalent of \$420 billion worth of oil. IEA said that were it not for the implemented energy-efficiency measures, consumers would be using and paying for two-thirds more energy than is the case.

#### Read more

#### 'Reverse Microwave' Chills Beverages in Seconds

LONDON—A UK company has developed what it calls "a low-energy, rapid cooling device for prepacked beverages for commercial use and a user-friendly fast-chill, on-demand product for the domestic market." The V-Tex "reverse microwave" uses a "start-stop rotational sequence" to create a Rankine vortex, which essentially keeps a drink in its original state while quickly bringing down the temperature. The manufacturer, Enviro-Cool, says the device requires nearly 80% less energy than standard drink chillers. It also frees up standard refrigerator space, since most beverages can be stored at room temperature elsewhere until right before serving. Consumer trials are scheduled to start this week at a supermarket in the Netherlands. The company has not given specific release dates for the commercial and domestic versions of V-Tex.

Read more

# 2013-2014 Meeting Dates

MONTH	GENERAL MEETING			
	Торіс	Date		
July	-	-		
August	· ·	-		
September	Fall Frolic Golf Outing – Legacy Golf Club	5		
October	Student Night / Membership Promotion	16		
November	Research Promotion	12		
December	Past Presidents / History (joint w/ CSI and SMCI)	16 (Lunch)		
January	Membership Promotion	TBD		
February	Resource Promotion	TBD		
March	Refrigeration	TBD		
April	ASHRAE Webcast	17		
May	Spring Fling Golf Outing	TBD		

Winter Meeting	2014 Winter Conference – New York, NY	Jan 18-22
CRC	Region VI CRC – Iowa City, IA	May 1-3
Summer Meeting	2014 Annual Conference – Seattle, WA	Jun/Jul 28-2

## November 2013 Research Promotion Update:

We are inching towards our goal of \$16,000. Thank you to everyone for your continued support! Through the month of November personal contributions donated to our RP Chapter will receive an ASHRAE RP Koozie. Think of it as a continual reminder of your loyal support through the course of the year. Please <u>donate</u> today, we have a limited inventory.



	ASH	IRAE Iowa Resea	rch Investors 2013-20	014
Individual Investors HR = Honor Roll participants \$100 min		10.0% OF GOAL	\$14,400.00 -TO GO!	Company Investors HR = Honor Roll participants \$150 min
Mr. Mark W Allen	(HR)			A. J. Allen Mechanical Contractors Inc. (HR)
Mr. Justin J Barrett, PE	(HR)	\$14,000		
Mr. Timothy J Conrad	(HR)	\$13,500		
Mr. Mark G Conway	(HR)	\$13,000		
Mr. Matt Gumm, PE	(HR)	\$12,500		
Mr. Rodney Heston	(HR)	\$12,000		
Mr. Jeff Lindell	(HR)	\$11,500		
Mr. Fred Miller	(HR)	\$11,000		
Mr. Luke Miller	(HR)			
Mr. Andrew L. Pospisal	(HR)	\$10,500		
Mr. Vince Sanders	(HR)	\$10,000		
Mr. Daniel V Zaug	(HR)	\$9,500		
Dr. Xiaohui (Joe) Zhou, PhD, PE	(HR)	\$9,000		
		\$8,500		
		\$8,000		
		\$7,500		
		\$7,000		
		\$6,500		
		\$6,000		
		\$5,500		
		\$5,000		
		\$4,500		
		\$4,000		
		\$3,500		
		\$3,000		
		\$2,500		
		\$2,000	\$1.600-00	
		\$1,500		
		\$1,000		
		\$500		
		\$0		

Your contribution puts us closer to achieving our goal. Please send what you can today!

COMPLETE THE INFORMATION BELOW AND RETURN IT WITH YOUR INVESTMENT

Please accept my research in	vestment in the	amount of \$	_CK#
NAME		PHONE	
COMPANY		FAX	-
ADDRESS			
CITY	STATE	ZIP	

PLEASE CHECK ONLY ONE:	() Personal Contribution	() Company Contribution
------------------------	--------------------------	-------------------------

Charge my gift to: ( ) VISA ( ) MC ( ) AE Credit Card #:\_\_\_\_\_ Exp. Date:\_\_\_\_\_

Signature:\_\_

ASHRAE is a 501(c)(3) organization. Contributions are deductible as allowed by law. A receipt will be sent to the address listed above.

Send to: ASHRAE RESEARCH PROMOTION C/O Vince Sanders P.O. Box 3686 Urbandale, IA 50323 PHONE: 515-554-2589 rp@ashraeiowa.org

## Thank you for your donation!



Plumbing · Heating · Air Conditioning · Refrigeration · Boilers · Controls Planned Preventative Maintenance

320 S.E. 6th Street Des Moines, IA 50309 Phone: (515) 697-3500 Fax: (515) 697-3501 E-mail: aja@ajallen.com

# CI3 – Control Installations of Iowa, Inc.



MMS, Inc.





MidAmerican Energy Company

Precision Test & Balance



## 2013-2014 Newsletter Sponsors

Sponsoring our monthly newsletter is a great way to advertise your business and support your Iowa ASHRAE Chapter. Renewing and new sponsors need to send in payment immediately for inclusion in next month's (and all subsequent) newsletter. Make check payable to: ASHRAE Iowa. Cost is \$125. Send to:

Matt Gumm Setpoint Mechanical Solutions 1450 69<sup>th</sup> Place, Suite 56 Ankeny, IA 50021

APV

heatfab

HEUS

Andrew Pospisal is collecting cards for all of the sponsors. If you've paid and don't see your card here or would like to revise the card shown, send a card-sized PNG or JPEG file to: <a href="mailto:apospisal@mail.ashrae.org">apospisal@mail.ashrae.org</a>