April Meeting
Tuesday, April 14, 2015
Main Meeting:
Realizing High Performance with Building Commissioning
1.0 PDH
Tech Session:
Energy Code Training at National Grid
YEA & Student Night
Joint meeting with BSA

Please see page 3 for more information.

Meeting Manager:
Dan Diorio
dan.diorio@bc.edu

Where:
Embassy Suites, Waltham

Meal:
Iceberg Wedge Salad
Beef Tenderloin w/ Mashed Potatoes
Red Velvet Cake

Time:
5:30—6:00   Social/Registration
6:00—6:45   Dinner
6:45 — 8:00   Main Program

Cost:
ASHRAE Boston Members:   $40
Non-Members/Walk-Ins:   $50
ASHRAE Student Members: Free

Please register online whether you are pre-paying with credit card or PayPal or paying with cash or check at the meeting at www.ashraeboston.org. RSVP by 12:00 PM on Thursday, April 9th.

Please note during registration if you plan to attend the Tech Session.

Please notify Erin Popa if you would like at vegetarian meal.

Credit cards are no longer accepted at the meetings.

Contact Erin Popa if you would like a vegetarian meal.

If you have any questions, you may contact Erin Popa, Attendance Chair, at ashraebostonattendedance@outlook.com.

Thank You
PRESIDENT’S MESSAGE

By: Dan Diorio

All of a sudden it’s April and my term as President is well into its latter stages. This year has flown by! There will be more on that later.

Firstly, I’d like to thank AEE for hosting the March meeting and inviting the Boston Chapter of ASHRAE. The topic presented a nice change of gears for ASHRAE members. As I mentioned in my remarks prior to the main program, the benefits of joint meetings are endless and the Boston Chapter always looks forward to networking opportunities with our peer organizations.

By now, you all have received the Boston Chapter Member Survey. We have already received several dozen responses, which is extremely pleasing. For those that have responded already, we truly appreciate you taking the time to do so in such a timely fashion. The Boston Chapter is looking forward to reviewing every single response that comes in. This survey will provide vital information needed to ensure that our programs, events and services continue to make your membership worthwhile.

After a set amount of time, when the responses seem to be dwindling, we will share all of the results with the Chapter. In the meantime, I thought I would address a couple of interesting comments that have come in to date.

We have received a couple of comments relative to the nature of our joint and co-sponsored meetings. For those that are not aware, our typical joint meetings, each year, are with AEE and ASPE. We alternate, on a yearly basis, the organization that will ‘host’ the event. This year, AEE and ASPE were the respective hosts of those joint meetings. Next year, ASHRAE Boston will host both, choose the topics and choose the speakers. However, we attempt to use the joint meetings to present topics that span the trades in order to provide attendees with a variety of technical information over the course of the ASHRAE year. When possible, we submit presentations for PDH credit approval.

There have been many good suggested meeting/presentation topics. As we start populating our schedule for the upcoming year, under Stacie Suh as Chapter President, we will look for opportunities to present on topics such as; net-zero buildings, residential systems, kitchen ventilation and alternative energy sources.

Thanks again for all of the feedback and the responses to the survey! Make sure to encourage your ASHRAE member friends to participate.

Please email me anytime at dan.diorio@bc.edu. I am always open and available for your suggestions and comments. See you all at the April meeting.

EDITOR’S NOTE

By: Stephanie Lafontaine

Materials for the May newsletter are due by April 17, 2015. Please submit employment/want ads in .pdf, .doc or .jpg format. A company logo may also be included. Please send me any ideas you would like to share or include in next month’s issue. Please see the website for additional information www.ashraeboston.org.

For more information, please call or e-mail me at: (857) 221-5942, northeastaire@gmail.com
April Meeting Information

Main Program – Realizing High Performance with Building Commissioning

Main Program Information – Building systems commissioning is a term familiar to design teams and building operators, but many wish to learn more about the process and its benefits. This presentation will describe the commissioning process, why it is necessary for high performance buildings, and discuss why commissioning is required for a sustainable built environment. Building functionality, energy impacts, and commissioning tasks for HVAC and Building Envelope will be reviewed. The difference between new and existing building commissioning will also be discussed.

Meet the Speakers – Mike Eardley, Brett Farbestein and Cory Gionet

Mike Eardley - Mike is Director of Commissioning at Cannon Design. In this role he develops and implements firm wide commissioning practices and oversees project execution on all commissioning projects. In addition to this work, his experience also includes HVAC design and performance verification of building systems. He is currently Vice President of the Building Commissioning Association’s Northeast Chapter, and is the past programs chair for ASHRAE Technical Committee 7.9 on Building Commissioning.

Brett Farbstein - Brett is a Commissioning Engineer at Cannon Design. He has performed full commissioning services for both MEP and Building Envelope systems, including design review, integrated system testing, and post occupancy review. His experience also includes energy audits, life cycle cost analysis, energy modeling, solar thermal, geothermal, and photovoltaic systems.

Cory Gionet - Cory’s commissioning experience involves a variety of building types including K12 and higher education institutions, healthcare facilities, data centers, and commercial buildings. His experience includes whole building commissioning as well as energy survey and analysis, and his ongoing commissioning work includes MEP, building automation, and life safety systems.
March Meeting Recap

By: Mark Leonard

The Boston ASHRAE Chapter had yet another good turnout for this month’s Chapter meeting at the Embassy Suites in Waltham, MA. Members and guests kicked off the evening by gathering in the lobby to socialize while others attended this month’s technical session. This month’s meeting was a joint meeting with the Association of Energy Engineers (AEE).

This month’s technical session topic focused on heat pipes for energy recovery and dehumidification presented by Mr. Drew Elsberry. Mr. Elsberry is the Regional Sales Manager at Heat Pipe Technology, Inc. with over 13 years of HVAC experience. His presentation focused on how heat pipes operate as a heat recovery system as well as how they are used for dehumidification. There are many heat recovery strategies on the market and Mr. Elsberry focused on the pros and cons of heat pipes compared to those other options, such as desiccant heat wheels. He also touched upon the materials and controls involved in specifying the piece of equipment.

Prior to dinner, AEE Boston Chapter President, Samuel Nutter, welcomed the ASHRAE and AEE attendees followed by the general chapter announcements. Samuel then invited ASHRAE Boston Chapter President, Dan Diorio, to the podium to address his announcements. Dan then welcomed Eric Edman and Darcy Carbone to the stand to address a special fundraiser for someone who meant so much to Boston ASHRAE. The late Nicholas Johnson fundraiser prizes were awarded, but more importantly we were able to raise funds to help Nicholas’ family. A very special thanks to all who helped support this cause.

As dinner concluded, the main presentation began with Mr. Nutter introducing Mr. Keith Miller who gave a presentation on “Smart Grid Case Study: The Smart Energy Solutions Program.” Mr. Miller is a Lead Project Manager with National Grid where he has worked on energy efficiency programs and most recently has led the lab testing for Home Energy Management (HEM). His presentation focused on the developing solution for customers to contribute to reducing energy usage during peak events in concentrated energy load locations. The solution is being tested via 15,000 distribution meters along with 4,500 homes using a Home Area Network device.

The March meeting concluded with the closing remarks of Mr. Samuel Nutter and Mr. Dan Diorio.
COME JOIN THE ASHRAE BOSTON CHAPTER FOR OUR 50TH ANNUAL GOLF OUTING

WHEN: MONDAY, JUNE 1, 2015
WHERE: COUNTRY CLUB OF HALIFAX
HALIFAX, MA

We are appealing to your continued generosity for monetary contributions for the purpose of purchasing gifts to be awarded as golf and door prizes. In order to give the Prize Committee ample time to purchase these gifts, we would appreciate receiving your donations by May 22, 2015.

A donation of fifty dollars would be most welcome and more would be greatly appreciated! All donations will be publicly acknowledged by being published in the NorthEastAire newsletter.

We also welcome Hole Sponsorship. If you are interested in participating, please return the completed form (found in the following newsletter pages) with your contribution.

Very truly yours,
ASHRAE Golf Outing Committee
Bill Garvey, Chairman

ASHRAE Golf Outing Committee
c/o Bill Garvey
66 Morton St
Hanson, MA 02341
Email: wgarvey@rdkengineers.com
Monday, June 1, 2015

Location: Country Club of Halifax
         Plymouth Street (Rte. 106)
         Halifax, MA

Time: 1:00pm – 6:30pm  Golf Outing
       6:30pm – 7:00pm  Social Half Hour
       7:00pm  Dinner, Golf Prizes & Raffle

This is a reminder to all Members & Guests that Annual Golf Outing is approaching fast. The RSVP deadline is May 22, 2015 and we have foursomes available.

If you aren’t interested in golfing but would like to come for the dinner, we are taking RSVP’s for Dinner only.

There are Hole Sponsorships & Hole Contest Sponsorships available, please see the website for details.

If anyone attending the outing needs directions please email Bill Garvey at wgarvey@rdkengineers.com

For additional outing information please visit http://www.ashraeboston.org

Meeting Fees
$150.00 – Members who RSVP (playing golf)
$35.00 – Members who RSVP (Dinner only)

Day of Outing - No RSVP, No Golf

Last Chance to RSVP for the golf outing is 12:00pm on Friday, May 22, 2015

Last Chance to RSVP for dinner only is 12:00pm on Friday, May 29, 2015

Please only RSVP to Bill Garvey at wgarvey@rdkengineers.com

Upon receiving RSVP, a confirmation email will be sent back to confirm your reservation. If you have not received a confirmation email, you will need to attempt the RSVP again.

Thank you
HOLE SPONSORSHIPS

($200 EACH)
HOLE SPONSORSHIPS WILL INCLUDE A SIGN ON A HOLE

CONTEST HOLES:
($500 EACH)

CONTEST HOLE SPONSORSHIPS:
1. LONGEST DRIVE
2. CLOSEST TO THE PIN
3. STRAIGHTEST DRIVE

HOLE SPONSORSHIP _______________________________________________________

CONTEST HOLE SPONSORSHIP ________________________________________________

INDIVIDUAL SPONSORSHIP ___________________________________________________

MAKE CHECKS PAYABLE TO A.S.H.R.A.E. BOSTON CHAPTER
Mail to: ASHARE Golf Outing
        C/o Bill Garvey
        66 Morton St.
        Hanson, MA 02341

NAME: __________________________________________________________________

ADDRESS: _______________________________________________________________
            ___________________________________________________

PHONE: ____________________________________

E-MAIL: __________________________________

7
EPA Approves New Climate-Friendly Refrigerants/Rule supports president’s Climate Action Plan by curbing emissions of potent greenhouse gases

WASHINGTON – As part of President Obama’s Climate Action Plan, the U.S. Environmental Protection Agency (EPA) is increasing the options for refrigerants used in various kinds of refrigeration and air conditioning equipment in the United States that offer better climate protection without harming the ozone layer. This final action addresses refrigerants under the Climate Action Plan that calls on EPA’s Significant New Alternatives Policy (SNAP) Program to identify and approve additional climate-friendly chemicals.

“Today’s rule is an example of how we can turn the challenge of climate change into an opportunity to innovate our way to a better future,” said EPA Administrator Gina McCarthy. “By working together, businesses and EPA are bringing new, climate-friendly refrigerants to market that better protect our health and the environment.”

Under the authority of the Clean Air Act, EPA’s SNAP Program evaluates substitute chemicals and technologies that are safe for the ozone layer. This final rule expands the list of SNAP-approved substitutes to include more low-global warming potential (GWP) alternatives that can replace both the ozone-depleting substances and high-GWP hydrofluorocarbons (HFCs). The approved substitutes have GWPs that range from 3 to 675 and can replace older compounds with GWPs between 1400 to 4000.

After receiving input from industry, environmental groups, and others, EPA is approving additional low-GWP hydrocarbon refrigerants, subject to use conditions, in the following refrigeration and air conditioning applications:

- Ethane in very low temperature refrigeration and in non-mechanical heat transfer;
- Isobutane in retail food refrigeration (stand-alone commercial refrigerators and freezers) and in vending machines;
- Propane in household refrigerators, freezers, or combination refrigerators and freezers, in vending machines, and in room air conditioning units;
- The hydrocarbon blend R-441A in retail food refrigeration (stand-alone commercial refrigerators and freezers), in vending machines and in room air conditioning units; and
- HFC-32 (difluoromethane) in room air conditioning units. HFC-32 has one-third the GWP of the conventional refrigerants currently being used in room air conditioning units.

These refrigerants are already in use in many of these applications in Europe and Asia.

In addition to adding these climate-friendly alternatives, EPA is also exempting all of these substances, except HFC-32, from the Clean Air Act venting prohibition, as current evidence suggests that their venting, release, or disposal does not pose a threat to the environment.

Nick Johnson Fundraiser Results

Announcing the winners of the raffle held on March 4, 2015 to benefit ASHRAE Boston Chapter Past President Nicholas A. Johnson. As many of you are aware, Nicholas passed away on February 20, 2015 after a hard fought battle against muscular dystrophy and spinal cancer. His smile and dedication to the HVAC community will be deeply missed. Rest in Peace Nick.

1st Prize: Darcy Carbone, Stebbins Duffy
2nd Prize: Nancy Jackson
3rd Prize: Jeff Scogland, RT Forbes
4th Prize: Dan Carington, BR+A
5th Prize: Nancy Jackson
**BOSTON CHAPTER - BEHIND THE SCENES**

*By: Mike Gilroy*

*Every month, prior to the Main Program, the Boston Chapter of ASHRAE’s Board of Governors meet to discuss Chapter business. This article, based on the Secretary Meeting Minutes, shall serve as an informative summary for members as to what is happening behind the scenes of the Boston Chapter. Please feel free to contact me with any questions or for additional information.*

Meeting Date: March 4, 2015

---

### Review of February Meeting Minutes

Each Board of Governors meeting begins with a review and eventual vote to approve the previous month’s meeting minutes. Any items that required follow-up are updated and closed or determined to be carried forward once again.

Meeting minutes from February were approved at the February BOG meeting.

---

### 2014/2015 Schedule

April’s energy code training session, held at National Grid in Waltham, MA will take place as scheduled. As a result, no technical session will be offered in April. The training session will highlight mechanical sections of the code and take place from 2pm to 5pm on the night of the April meeting. Night Shift Brewery, located in Everett, MA, has been approved by the BOG for an ASHRAE tour. The tour will take place in late April. Be on the lookout for additional information!

---

### Additional Miscellaneous Items Discussed

The following miscellaneous items were briefly discussed:

- **Meeting Registration Software** – Vertical Response has been approved for continued use by the Chapter.
- **Boston Chapter Member Survey** – The much anticipated survey will be sent to all chapter members in March.
- **Boston Chapter Hall of Fame** – Applications for the Boston ASHRAE Chapter Hall of Fame have been made available. The deadline, originally March 6th, has been extended for applications/nominations.
- **April ASHRAE Webcast** – Every April, ASHRAE provides a free webcast with accompanying PDHs to its members. This year’s webcast is titled “New Tomorrow for Today’s Buildings: Existing Building Commissioning.” More information will be circulated when it is available.

---

### Employment Ads

**ASHRAE Boston Chapter – Employment Ads**

The NorthEastAire is published monthly, September through June. It is posted on the Chapter website at [www.ashraeboston.org](http://www.ashraeboston.org). A link is sent each month to all members of the Chapter, currently over 1000.

- **Newsletter Rate**: $200 for 1/4 page, $400 for 1/2 page, $800 for full page
- **Website Rate**: $300 per calendar month
- **Format**: Word format, company logos in .jpg or .gif
- **Deadline for May Newsletter**: April 17, 2015

Any questions, please contact Stephanie Lafontaine, Newsletter Editor at 857-221-5942 or northeastaire@gmail.com
Grassroots Government Affairs

By: Steve Rosen

ASHRAE Government Affairs Update, 3/13/2015

Federal Activities

Energy Savings and Industrial Competitiveness Act Reintroduced in the Senate

Earlier this week, long-time leaders in energy efficiency, Senators Rob Portman (R-OH) and Jeanne Shaheen (D-NH) reintroduced their Energy Savings and Industrial Competitiveness Act (S.720). The bill, which is largely identical to the version that was most recently introduced last year, addresses several areas including:

- Building Energy Codes
- Workforce Training and Capacity Building
- Energy Efficiency and Helping to Improve Indoor Air Quality in School Buildings
- Encouraging the Alignment of Tenants and Building Owners Concerning Energy Efficiency
- Valuing Energy Efficiency in Mortgage Underwriting
- Industrial Energy Efficiency
- Federal Green Buildings

ASHRAE supports this bill, which is projected to save consumers $16.2 billion a year, significantly reduce CO2 and related emissions, and create more than 190,000 jobs.

“By establishing a national energy strategy, we can create jobs, save taxpayers billions, make manufacturers more competitive, and protect the environment,” said Senator Portman. “Our bill is the equivalent of taking 37 million homes off the grid, and I look forward to renewing our efforts to promote this commonsense legislation.”

“Energy efficiency is the cheapest and fastest way to address our energy challenges,” Senator Shaheen said. “Our bipartisan bill will create jobs, save consumers billions, and drastically reduce pollution in a smart, effective and affordable way – that’s why it enjoys broad bipartisan support. A vote to pass our legislation is long overdue and I hope the overwhelming support behind this bill will help carry it through the Senate.”

The bill is supported by over 250 businesses and nonprofit organizations. The bipartisan legislation is cosponsored by Senators Kelly Ayotte (R-NH), Michael Bennet (D-CO), Maria Cantwell (D-WA), Susan Collins (R-ME), Chris Coons (D-DE), Al Franken (D-MN), John Hoeven (R-ND), Joe Manchin (D-WV), Lisa Murkowski (R-AK), Mark Warner (D-VA), and Roger Wicker (R-MS).

The next step is for the Energy Savings and Industrial Competitiveness Act to be considered by the Senate Energy & Natural Resources Committee, and then brought to the Senate floor for a vote. Timing for these stages has not yet been determined, but is expected to begin sometime in April.

Representatives Blackburn and Schrader Reintroduce Energy Savings and Building Efficiency Act

The Senate’s approach to energy legislation is to have a small number of large, comprehensive bills, however the House is taking a different track, opting for a larger number of small bills. As evidence of this, on Wednesday Senators Rob Portman (R-OH) and Jeanne Shaheen (D-NH) reintroduced their comprehensive energy efficiency bill (see above), and last week Representatives Marsha Blackburn (R-TN) and Kurt Schrader (D-OR) reintroduced their Energy Savings and Building Efficiency Act (H.R.1273), which focuses only on building energy codes, workforce training, and building labeling.

H.R.1273 is identical to the version that was introduced last year, and, if significantly improved, has the potential to clarify the role of the U.S. Department of Energy in the development and state adoption of the model building energy codes.

Continued on next page..
ASHRAE continues to be engaged in productive discussions with Representatives Blackburn and Schrader, and a large number of stakeholders to develop a compromise bill that all can support.

Senators Reintroduce Bipartisan Legislation Promoting State Energy Efficiency and Weatherization Assistance

Senators Chris Coons (D-DE), Susan Collins (R-ME), Jack Reed (D-RI), and Jeanne Shaheen (D-NH) have reintroduced the Weatherization Enhancement and Local Energy Efficiency Investment and Accountability Act (S.703), which would improve, reauthorize, and extend for five years, the State Energy Program and Weatherization Assistance Program. Together, these programs have helped more than 7.4 million low-income families make their homes more energy efficient, and helped states strategically leverage federal dollars to promote energy efficiency.

“The Weatherization Assistance Program and State Energy Program have made it possible for millions of Americans to reap the benefits of a wide range of energy-efficient technologies and practices,” said Senator Coons. “Our bill will not only ensure that both landmark programs can continue to help make American homes safer, healthier, and more energy efficient, it also further enhances the Weatherization Assistance Program with a complementary, competitive grant program, and requires that the DOE establish strong, achievable standards for qualifying entities. This will ensure that even more families can benefit.”

“Weatherization provides grants to permanently lower home energy costs for low-income families, seniors, and individuals with disabilities,” Senator Collins said. “This is particularly important for a state like Maine with some of the oldest housing stock in the nation and a high dependence on home heating oil. The State Energy Program is also supporting important state energy efficiency and renewable energy projects. Programs such as these have a significant return on investment and help meet our national goals of saving energy, lowering costs, and energy independence.”

ASHRAE supports the State Energy Program, Weatherization Assistance Program, and this legislation.

Proposed Rule Issued by DOE for Test Procedures for Residential Furnaces and Boilers

The U.S. Department of Energy (DOE) is proposing to revise its test procedure for residential furnaces and boilers established under the Energy Policy and Conservation Act. This rulemaking will fulfill DOE's obligation to review its test procedures for covered products at least once every seven years. The proposed rule generally considers revisions based on the latest industry standards incorporated by reference, clarifications to the set-up and methodology, as well as new procedures for verification of the design requirements for certain categories of boilers and for estimating electrical consumption of furnaces and boilers. DOE is also announcing a public meeting to discuss and receive comments on issues presented in this test procedure rulemaking.

ASHRAE Standard 103 Methods of Testing for Annual Fuel Utilization Efficiency of Residential Central Furnaces and Boilers is discussed extensively in this notice of proposed rulemaking.

Comments are due on or before May 26, 2015.

DOE Releases Correction on Final Rule for Energy Conservation Standards for Certain Commercial Heating, Air Conditioning, and Water Heating Equipment

DOE has issued a correction on a final rule they issued on May 16, 2012 concerning energy conservation standards and test procedures for certain commercial heating, air conditioning, and water heating equipment. The final rule discusses ASHRAE standards extensively.

GGAC Regional and Chapter Activities

Survey on Energy Modeling Software

The Building Codes Assistance Project is conducting a survey of design professionals through April 30. This survey is seeking information on the current use of energy modeling software. It is primarily a multiple-choice survey and should take no longer than ten minutes to complete. Each participant can opt to enter into a raffle to receive one of five $50 Amazon gift cards. To access the survey, go to https://www.surveymonkey.com/s/WXZWTSY

Your Boston GGAC committee welcomes your suggestions! Please contact Christine Reinders (creinders@cannondesign.com), Stacie Suh (stacie@stebbinsduffy.com) or Steve Rosen (srosen@vanderweil.com).
This month’s topic: A quick review of the Building Energy Codes and why we have them.

**Why do we have Building Energy Codes?**

It can be said that the evolution of the Building Energy Codes are a direct result of the 1973 Oil Embargo. Not only was there a shortage of oil, but the quadrupled price of a barrel of oil really pinched the consumers’ pockets and caused a rippling effect in the national economy. It was clear something had to be done to help relieve the nation’s dependence on oil.

**Brief History of Building Energy Codes**


International Code Council (ICC) was formed in 1994 when the former regional code groups joined together to form a national council. The International Energy Conservation Code (IECC) was first published in 1998. The IECC is the national model standard for energy efficient construction recognized by federal law. The IECC references the use of the corresponding ASHRAE 90.1 version as an allowable path for compliance.

**Food for Thought**

I have read a report by the Rocky Mountain Institute that estimated that if we as a nation continued consuming energy at the rate at which we did in the 1970s we would have consumed 207.3 quadrillion Btu in 2007, instead thanks to the energy codes and the reduction in energy we were able to achieve, we consumed roughly 101.6 quadrillion Btu.

**Massachusetts’ Building Energy Code**

In Massachusetts, the current building energy code is IECC 2012 with minor amendments. The IECC 2012 references the option to follow ASHRAE 90.1-2010 as an applicable means of compliance. There are subtle differences in the way the two are written, but overall the goal is the same.

**Building Energy Code Training**

Now that we have discussed a brief history of the codes and why we have them, we are happy to announce that the Boston Chapter of ASHRAE has partnered with Conservation Services Group to offer a Mechanical Energy Code training April 14, 2015 at National Grid’s Waltham office. The training will be held from 2pm to 5pm. It will finish just in time to head to the April’s monthly meeting down the street! We will be issuing an email invite shortly. Any questions regarding the event please feel free to reach out to Siobhan Carr at siobhanc@mit.edu.

If you have any subjects you are looking for us to address reach out to any of our members or directly to Jim Armstrong at jarmstrong@siemens.com or Siobhan Carr at siobhanc@mit.edu.

### Presidential Award of Excellence

**Boston Chapter - 2014-2015**

<table>
<thead>
<tr>
<th>Chapter Members</th>
<th>Membership Promotion Points</th>
<th>Student Activities Points</th>
<th>Research Promotion Points</th>
<th>Historical Points</th>
<th>Chapter Organization Points</th>
<th>Chapter Technology Transfer Points</th>
<th>Grassroots Government Affairs Points</th>
<th>Chapter PAOE Point Totals</th>
</tr>
</thead>
<tbody>
<tr>
<td>1017</td>
<td>845</td>
<td>1025</td>
<td>530</td>
<td>200</td>
<td>1075</td>
<td>975</td>
<td>525</td>
<td>5175</td>
</tr>
</tbody>
</table>
STUDENT ACTIVITIES

By: Dan Diorio

The upcoming April meeting will be the final traditional monthly meeting of the 2014/2015 ASHRAE Boston season. The installation of the new Officers and Board Members will take place in May. We need to finish with strong student member attendance at these final meetings. Student Activities PAOE points are on the line.

The April meeting will be the second of our two ‘Student Nights’. Student attendance will be crucial as I will be saying a few things about Student Activities and recognizing the students in attendance. This will be your quick opportunity to stand up at your table and be seen. Typically, this leads to networking conversations with employers that night and in the months to come - that can never a bad thing! If possible, please let me know ahead of time if you are planning to attend. That way we will have the most accurate list of student attendees to call out.

The New Faces of Engineering program recognizes outstanding junior or senior (defined as third, fourth or fifth year) ASHRAE student members enrolled in a Bachelor of Science in Engineering program from an ABET Accredited school who are proving themselves to be leaders in the field of engineering. ASHRAE’s college New Face winner will receive a $1000 scholarship and be recognized in a full page ad in the ASHRAE Journal. The winner will also have their profile featured on the New Faces of Engineering: College Edition's Facebook page. For information and qualifications, visit the StudentZone page on the ASHRAE website (www.ashrae.org).

Please contact me at any time via email at dan.diorio@bc.edu or stop by and say hello at one of the monthly meetings.

MEMBERSHIP PROMOTION

By: Dan Carington

The 2014-2015 society year is coming to an end soon. As so, it is a good opportunity for members to update their profiles on the ASHRAE Society website at www.ashrae.org. Members can verify their personal information such as preferred mailing address, e-mail, contact info, etc., as well as pay yearly membership dues through the website. There are areas on the site for applying for membership grade advancement. If you have been working in the HVAC industry for several years and are designated as an Associate Member, you may be eligible for advancement to full Member grade. Send me an e-mail if you would like assistance in applying for advancement or if you have any questions. Please take a moment to make sure that your membership dues are up to date. Keep in mind ASHRAE Bylaws now require that members who are more than 6 months delinquent on their Society dues be cancelled. Please take a moment to ensure that your membership dues are up to date.

Members can now pay for up to three years of membership in one transaction and receive a 10% discount on the second and third years of payment. If you pay for two years of membership, you will get a $15 discount off the total payment. If you pay for three years of membership, you will get a $30 discount off the total payment. Please note that multi-year payments must be made via telephone or online when you renew your membership.

If you have any questions about your ASHRAE membership, renewing your membership or you are looking to become more involved with the Boston Chapter please feel free to contact me at dpc@brplusa.com. If you are interested in helping out with Membership Promotion Committee please let me know, we can always use additional help in all committees.
Our Chapter’s RP goal this year is $21,800. Currently we are ahead of where we were last year at this time, but still only about 36% of our goal. We need your assistance in reaching our goal, so please consider a donation to ASHRAE RP.

Remember that 100% of the money donated to RP goes to Research!

As a reminder, ASHRAE is qualified as 501(c)3 and all contributions are tax deductible. Any amount is appreciated; for donors who give $100 or more, you will be listed in the annual ASHRAE Honor Roll of Investors publication. You can donate online at www.ashrae.org/contribute, or contact myself.

Donate Now!

Please fill out the form in this newsletter and mail it to me – we look forward to your Honor Roll level donation of $100. You can go to the ASHRAE Boston website at www.ashraeboston.org. Click on the Donation Form under Research & Promotion. You can also donate online at www.ashrae.org/contribute.

Mailing Address: ASHRAE Boston Chapter  
C/o Teri Shannon  
PO Box 576  
W. Kennebunk, ME  04094

Please donate today help us reach our goal.

Donor Recognition

I would like to give a big thank you to the following members for making donations to RP in February:

Walsh Mechanical Contractors
WA O’Leary Co
Mr. Patrick Halm

Visit www.ashraeboston.org/upcoming-events/announcements.html for more information.

April Meeting
When:        April 14, 2015
Where:        Embassy Suites, Waltham

May Installation of Officers
When:        May 12, 2015
Where:        Bostonia Public House, Boston

June Golf Outing
When:        June 1, 2015
Where:        Halifax Country Club, Halifax

Sustainable Performance Institute
http://www.sustainable-performance.org/

AFE Chapter 74-Worcester Area-Central MA
http://chapters.afe.org/chaptersnew/index.cfm?chapterIndex=2

USGBC Massachusetts Chapter
www.usgbcma.org

IFMA Boston Chapter
www.ifmaboston.org/

AEE New England Chapter
www.aeenewengland.org/

IBPSA Boston Chapter
http://ibpsa-boston.com/
Industry Events

SAVE THE DATE
FOR OUR
Engineering Seminar

Here is your chance to network with the HVAC industry leaders while earning up to 8 PDH credits with APA, LLC's FREE Engineering Seminar

For more information and RSVP by March 31 with Alexandra Kupchaunis: akupchaunis@apav.com

Event Information

› Thursday April 16, 2015
› 7:30 AM - 6:00 PM
› Sheraton Commander
› 16 Garden St, Cambridge, MA
› Additional important information coming closer to time of the event

APA HVAC TECHNOLOGIES
Energy Managers, Building Owners, Facility Managers, End Users and Professionals...
Mark your Calendars!

The Association of Energy Engineers of New England presents its 5th Annual

ENERGY PRODUCTS & SERVICES SHOW
Wednesday, April 8th 2015
3 p.m. - 7 p.m.
Embassy Suites Hotel  550 Winter Street  Waltham, MA
Exit 27 B off Route 128 (I-95) Free Parking

This year’s Show will feature over 30 EXHIBITS from many of the region’s leading energy services companies and professionals, and 6 WORKSHOPS. This event will provide first-hand interaction with cutting-edge solutions that reduce operating costs covering a broad array of building types and systems.

ADMISSION: Includes entry to the Exhibit floor, multiple Workshops (all with qualified CEU credits), dinner buffet/appetizers and cash bar.

REGISTRATION: Register on the AEE website www.aeenewengland.org AEE Members and guests: $49. Register before April 3rd at the Early Bird Discount rate: Members $39, Non-members $44.

WORKSHOPS: No additional fee or pre-registration required. Workshop times will be posted by 03/26 on the AEE NE website www.aeenewengland.org. When registering, please indicate your preference of Workshops (Workshops will run two at a time).

- **Advanced Building Performance Diagnostics: Detecting Failure & Predicting Performance in Building Systems & Equipment**
  Presented by Sam Deptula, Project Manager, B2Q Associates, Inc.

- **Lighting Control Systems: What Professionals Need to Know**
  Presented by Ray Urban, Senior Associate, Goody Clancy

- **Low Ambient Heating and Cooling with Variable Refrigerant Flow (VRF)**
  Presented by Chris Ouellette, Area Manager, Mitsubishi Electric

- **How to Identify and Analyze Refrigeration Energy Saving Opportunities**
  Presented by Emre Schveighoffer, President, National Resource Management, Inc.

- **High-Efficiency Transformer Measurement and Verification**
  Presented by Chris Pimentel, Northeast Regional Manager, Powersmiths

- **Mass DOER’s “Building Asset Rating” Pilot**
  Presented by Rob Morrow, Project Executive, The WeiDT Group

FOR ADDITIONAL INFORMATION: Visit www.aeenewengland.org
or contact Joseph Hall, Meeting Manager at 774-278-4179 or jjhall72@verizon.net

We look forward to seeing you at the Show!
The 2015 Northeast Indoor Air Quality & Energy Conference attracts a diverse range of professionals from throughout the region and across the United States and Canada. Attendees come together to share new and proven concepts for achieving safe, healthy, and sustainable indoor environments. A variety of lectures, workshops, exhibits and poster sessions will offer important information and provide for discussions that will address professional development, scientific issues, trends, industry innovations and more. The event is also one of the IAQ industry’s premier networking opportunities and the ideal opportunity for companies who provide services and products to the industry to connect with their current and future customers. If you design, build, operate or maintain buildings, if you work in residential, educational, commercial or industrial environments, if you provide consulting and professional services, or if you manage policy or public health — this conference is for you.

Click here for conference fees and registration.

2015 IAQ & Energy Conference Highlights

Seminar Day – Wednesday, April 15, 2015 (Click here for Seminar Day Program Descriptions)

Cocktail Reception – Wednesday, April 15, 2015
4:00pm – 7:00pm
Door Prizes (Must be present at Reception to win!)
Silent Auction
Cocktail Reception and the exhibit area is OPEN to the public. No registration fee to attend the reception and visit the conference exhibits. Cash bar.

Keynote Address – April 16, 2016 (Click here for The 2015 Keynote Presentation)

Workshops – April 16, 2016 (Click here for Workshop Descriptions)

Click here to register for the 2015 Northeast Indoor Air Quality & Energy Conference
Society News

ASHRAE/IES Publish Updated Standard on Energy Efficiency in Existing Buildings

ATLANTA – A newly revised standard from ASHRAE and IES seeks to provide greater guidance and a more comprehensive approach to retrofit of existing buildings for increased energy efficiency.

Published this week, ANSI/ASHRAE/IES Standard 100-2015, *Energy Efficiency in Existing Buildings*, provides comprehensive and detailed descriptions of the processes and procedures for the retrofit of existing residential and commercial buildings in order to achieve greater measured energy efficiency. Appendices are included for life-cycle cost analysis procedures as well as identification of potential energy conservation measures.

“The total primary energy used in both residential and commercial building sectors is expected by the U.S. Energy Information Administration to rise each year for the next several decades in spite of aggressive efficiency improvements in new construction,” Rick Hermans, chair of the Standard 100 committee, said. “In order to reduce the overall impact of energy used by residential and commercial buildings, the existing building stock must become more efficient. This revision to Standard 100 provides the means to accomplish that goal.”


Standard 100 directly addresses a building’s energy-use efficiency in a quantitative manner and provides a means to improve that efficiency with an objective benchmark created with the assistance of the Energy Information Administration, the Federal Energy Management Program and Oak Ridge National Laboratory.

Recognizing that the actual occupancy of the building plays a key role in its performance, the standard establishes the need for development of an energy management plan and an operation and maintenance program. It also addresses the requirements for ongoing commissioning.

The standard takes advantage of the fact that any building that has been in operation for at least twelve months can quickly determine its performance relative to some benchmark, which is defined in the standard as an energy-use intensity target. This concept is the new paradigm for energy conscious design, construction and operation of buildings, according to Hermans.


The cost of ANSI/ASHRAE/IES Standard 100-2015, *Energy Efficiency in Existing Buildings*, is $72 ($61, ASHRAE members). To order, contact ASHRAE Customer Contact Center at 1-800-527-4723 (United States and Canada) or 404-636-8400 (worldwide), fax 678-539-2129, or visit www.ashrae.org/bookstore.

ASHRAE, founded in 1894, is a global society advancing human well-being through sustainable technology for the built environment. The Society and its more than 50,000 members worldwide focus on building systems, energy efficiency, indoor air quality, refrigeration and sustainability. Through research, standards writing, publishing, certification and continuing education, ASHRAE shapes tomorrow’s built environment today. More information can be found at www.ashrae.org/news.
Society News

ASHRAE Certification Programs

BEMP Practice Exam Now Available
ASHRAE has launched a practice exam for the Building Energy Modeling Professional (BEMP) certification. The practice exam is designed to be similar in content and difficulty to the actual certification exam. It is a low-cost, online tool for limited self-assessment with a score report overview of performance at the end of the exam. Practice exams are already in place for the BEAP, CPMP and HFDP certifications. Practice exams for the HBDP and OPMP certifications are under development and should be launched later this year.

Visit www.ashrae.org/BEMP to learn more about the BEMP practice exam.

Visit www.ashrae.org/certification to learn more about ASHRAE certifications.

New Publications from ASHRAE

ASHRAE, a leader in building information technology, develops publications that impact every facet of the environment, both indoors and out.

Data Center Design and Operation – ASHRAE Datacom Series CD 4th Ed.
This CD-ROM presents the full text of all eleven ASHRAE Datacom Series publications and Standard 127-2012 in fully searchable and printable PDF format. Authored by ASHRAE Technical Committee 9.9, the Datacom Series provides comprehensive treatment of data center cooling, energy efficiency, and related subjects.

$289 ($246 ASHRAE Member) / CD / 2014

ASHRAE Reference Offers Design Guidance on Healthcare HVAC Systems
The second edition of HVAC Design Manual for Hospitals and Clinics provides in-depth design recommendations based on best practices from consulting and hospital engineers, with a focus on presenting what’s different about healthcare HVAC systems.

$129 ($109 ASHRAE Member) / 312 pages / 2013

Visit www.ashrae.org/bookstore to learn more about these and other outstanding ASHRAE publications!
<table>
<thead>
<tr>
<th>Date</th>
<th>Main Meeting/ Tech Session</th>
<th>Speaker</th>
<th>PDH Credits</th>
<th>Meeting Manager</th>
<th>Location/ Special Night</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>September</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, September 16, 2014</td>
<td>Tour—Conte Forum AC Upgrades &amp; Expansion</td>
<td>Dan Diorio &amp; Dave Trumble</td>
<td>N/A</td>
<td>Dan Diorio</td>
<td>Boston College, Conte Forum, Chestnut Hill</td>
</tr>
<tr>
<td><strong>October</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, October 14, 2014</td>
<td>Retrofitting Mass Walls—Interior Retrofits vs. Exterior Retrofits</td>
<td>Joseph Lstiburek</td>
<td>TBD</td>
<td>Teri Shannon</td>
<td>Embassy Suites, Waltham</td>
</tr>
<tr>
<td><strong>November</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, November 11, 2014</td>
<td>IBPSA—Energy Modeling, Best Practices</td>
<td>TBD</td>
<td></td>
<td>Teri Shannon</td>
<td>HOF Induction, Student &amp; Membership Promotion Night</td>
</tr>
<tr>
<td><strong>December</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, December 9, 2014</td>
<td>Mechanical Couplings Science</td>
<td>TBD</td>
<td>TBD</td>
<td>Event Committee</td>
<td>Joint Meeting with ASPE</td>
</tr>
<tr>
<td><strong>January</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, January 13, 2015</td>
<td>ASHRAE Society President</td>
<td>Thomas Phoenix</td>
<td>TBD</td>
<td>Darcy Carbone</td>
<td>Embassy Suites, Waltham</td>
</tr>
<tr>
<td><strong>February</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, February 10, 2015</td>
<td>DOAS &amp; VRK Work-Arounds in eQuest</td>
<td>Eric Studer</td>
<td>TBD</td>
<td>Teri Shannon</td>
<td>Embassy Suites, Waltham</td>
</tr>
<tr>
<td><strong>March</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Wednesday, March 4, 2015</td>
<td>Heat Pipes for Energy Recovery &amp; Dehumidification</td>
<td>Drew Elsberry</td>
<td>1.0</td>
<td>Dan Diorio</td>
<td>Joint Meeting with AEE</td>
</tr>
<tr>
<td><strong>April</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, April 14, 2015</td>
<td>Energy Code Training</td>
<td>At National Grid, Waltham, 2:00-5:00 PM</td>
<td>1.0</td>
<td>Dan Diorio</td>
<td>Embassy Suites, Waltham</td>
</tr>
<tr>
<td><strong>May</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tuesday, May 12, 2015</td>
<td>Installation of Officers</td>
<td>N/A</td>
<td>N/A</td>
<td>Stacie Suh</td>
<td>Bostonia Public House, Boston</td>
</tr>
<tr>
<td><strong>June</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Monday, June 1, 2015</td>
<td>Golf Outing</td>
<td>N/A</td>
<td>N/A</td>
<td>Bill Garvey</td>
<td>Halifax Country Club, Halifax, MA</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Research Promotion</td>
</tr>
</tbody>
</table>
### 2014-2015

**BOSTON CHAPTER OFFICERS, BOARD OF GOVERNORS & CHAIRPERSONS**

#### OFFICERS

<table>
<thead>
<tr>
<th>Position</th>
<th>Name</th>
<th>Contact Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>President</td>
<td>Daniel Diorio, Boston College</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-552-8772</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:dan.diorio@bc.edu">dan.diorio@bc.edu</a></td>
<td></td>
</tr>
<tr>
<td>President-Elect</td>
<td>Stacie Suh, Stebbins Duffy, Inc.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>781-258-1002</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:Stacie@stebbinsduffy.com">Stacie@stebbinsduffy.com</a></td>
<td></td>
</tr>
<tr>
<td>Vice President</td>
<td>William Tang, BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-254-0016</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:wkt@brplusa.com">wkt@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td>Secretary</td>
<td>Mike Gilroy, BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-925-9255</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:mpg@brplusa.com">mpg@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td>Treasurer</td>
<td>William Garvey, RDK Engineers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>857-221-5965</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:wgarvey@rdkengineers.com">wgarvey@rdkengineers.com</a></td>
<td></td>
</tr>
</tbody>
</table>

#### BOARD OF GOVERNORS

<table>
<thead>
<tr>
<th>Year</th>
<th>Name</th>
<th>Contact Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>2014 - 2017</td>
<td>Dan Carington</td>
<td></td>
</tr>
<tr>
<td></td>
<td>BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-925-8236</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:dpc@brplusa.com">dpc@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td></td>
<td>William Garvey</td>
<td></td>
</tr>
<tr>
<td></td>
<td>RDK Engineers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>857-221-5965</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:wgarvey@rdkengineers.com">wgarvey@rdkengineers.com</a></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Mark Leonard</td>
<td></td>
</tr>
<tr>
<td></td>
<td>BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-925-8322</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:mcl@brplusa.com">mcl@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Teri Shannon</td>
<td></td>
</tr>
<tr>
<td></td>
<td>DAC Sales</td>
<td></td>
</tr>
<tr>
<td></td>
<td>207-985-0873</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:tshannon@dac-hvac.com">tshannon@dac-hvac.com</a></td>
<td></td>
</tr>
<tr>
<td>2013-2016</td>
<td>Siobhan Carr</td>
<td></td>
</tr>
<tr>
<td></td>
<td>MIT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-324-7268</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:siobhan@mit.edu">siobhan@mit.edu</a></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Mike Gilroy</td>
<td></td>
</tr>
<tr>
<td></td>
<td>BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-925-9255</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:mpg@brplusa.com">mpg@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Stephen Nicholas</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Air Industries</td>
<td></td>
</tr>
<tr>
<td></td>
<td>978-682-9993</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:snicholas@airinds.com">snicholas@airinds.com</a></td>
<td></td>
</tr>
</tbody>
</table>

#### COMMITTEES

<table>
<thead>
<tr>
<th>Category</th>
<th>Name</th>
<th>Contact Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>Grassroots Government Activities</td>
<td>Steven Rosen</td>
<td>Vanderwell Engineers</td>
</tr>
<tr>
<td></td>
<td>617-956-4218</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:srosen@vanderwell.com">srosen@vanderwell.com</a></td>
<td></td>
</tr>
<tr>
<td>Historian</td>
<td>Eric Edman</td>
<td>BR+A</td>
</tr>
<tr>
<td></td>
<td>617-925-8325</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:eme@brplusa.com">eme@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td>Honors &amp; Awards</td>
<td>Darcy Carbone, Stebbins Duffy, Inc.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-957-2567</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:dcarbone@stebbinsduffy.com">dcarbone@stebbinsduffy.com</a></td>
<td></td>
</tr>
<tr>
<td>Membership Promotion</td>
<td>Dan Carington, BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-925-8236</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:dpc@brplusa.com">dpc@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td>Nominating</td>
<td>Bob Persechini, RDK Engineers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-345-9885</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:rpersechini@rdkengineers.com">rpersechini@rdkengineers.com</a></td>
<td></td>
</tr>
<tr>
<td>Research Promotion</td>
<td>Teri Shannon, DAC Sales</td>
<td></td>
</tr>
<tr>
<td></td>
<td>207-985-0873</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:tshannon@dac-hvac.com">tshannon@dac-hvac.com</a></td>
<td></td>
</tr>
<tr>
<td>NorthEastAire</td>
<td>Stephanie Lafontaine</td>
<td></td>
</tr>
<tr>
<td></td>
<td>RDK Engineers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>857-221-5942</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:slafontaine@rdkengineers.com">slafontaine@rdkengineers.com</a></td>
<td></td>
</tr>
<tr>
<td>The New Product Show &amp; Energy Show 2016</td>
<td>Jeffrey Schultz</td>
<td></td>
</tr>
<tr>
<td></td>
<td>EYP Architecture &amp; Engineering</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-385-9894</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:jschultz@eypae.com">jschultz@eypae.com</a></td>
<td></td>
</tr>
<tr>
<td>Professional Development</td>
<td>Steve Bosland, EYP Architecture &amp; Engineering</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-305-9831</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:sbosland@eypae.com">sbosland@eypae.com</a></td>
<td></td>
</tr>
<tr>
<td>Publicity</td>
<td>Mark Leonard, BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-925-8322</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:mcl@brplusa.com">mcl@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td>Refrigeration</td>
<td>Steven Tafone, Suffolk Construction</td>
<td></td>
</tr>
<tr>
<td></td>
<td>978-774-1057</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:stafone@suffolkconstruction.com">stafone@suffolkconstruction.com</a></td>
<td></td>
</tr>
<tr>
<td>Student Activities</td>
<td>Daniel Diorio, Boston College</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-552-8772</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:dan.diorio@bc.edu">dan.diorio@bc.edu</a></td>
<td></td>
</tr>
<tr>
<td>Sustainability</td>
<td>Jim Armstrong, Siemens Industry, Inc.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>781-774-8360</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:jarmstrong@siemens.com">jarmstrong@siemens.com</a></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Siobhan Carr, MIT</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-324-7268</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:siobhan@mit.edu">siobhan@mit.edu</a></td>
<td></td>
</tr>
<tr>
<td>Website</td>
<td>Steven Rosen, Vanderwell Engineers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-956-4218</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:srosen@vanderwell.com">srosen@vanderwell.com</a></td>
<td></td>
</tr>
<tr>
<td>YEA</td>
<td>William Tang, BR+A</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-254-0016</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:wkt@brplusa.com">wkt@brplusa.com</a></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Justin Molé, Canon Design</td>
<td></td>
</tr>
<tr>
<td></td>
<td>617-517-6272</td>
<td></td>
</tr>
<tr>
<td></td>
<td><a href="mailto:jmole@cannondesign.com">jmole@cannondesign.com</a></td>
<td></td>
</tr>
</tbody>
</table>
REGION I EXECUTIVE COMMITTEE

Region Director and Regional Chair
Joseph L. Furman
Automated Logic
16 Country Way
Wallingford, CT 06492
203-741-0776
joe.furman@automatedlogic.com

Assistant Regional Chair and Treasurer
Bill Walter
Carrier
315-432-6267
William.F.Walter@carrier.utc.com

Region Chapter Technology Transfer
Alexander Weiss
8 Bergen Beach Pl.
Brooklyn, NY 11234
718-251-1154
weisseng@gmail.com

Region Grassroots Government Activities
Richard E. Vehlow
NYS OGS Design
10 Catherine Pl.
Latham, NY 12110
518-474-2471
Rev1969@gmail.com

Region Membership Promotion
Steven Sill
NY State Office of People with Developmental Disabilities
2930 State Route 104A
Sterling, NY 13156
718-494-5166
stevesill1966@hotmail.com

Region Research Promotion
Christopher Phelan
Thermco
228 Scoles Ave.
Clifton, NJ 07012
973-77-6700
chrisphelan@thermcoreps.com

Region Student Activities
Ralph Draper
31 Gebig Rd.
Nottingham, NH 03290
603-608-8600
rwd@cisunix.unh.edu

Region Regional Historian
Stanley Westhoff
Unilix Advanced Manufacturing, LLC
18 Santee Dr.
Gansevoort, NY 12831
518-587-1949
stanley.westhoff@verizon.net

Region YEA
Frank Rivera
340 E 74th St. Apt 1J
New York, NY 10021
646-245-7526
frivera@mechheat.com

Region Nominating Committee Member
Russell J. Stuber
U & S Services Inc.
95 Stark St.
Tonawanda, NY 14150
716-693-4490
stuberr@usservicesinc.com

Region Nominating Committee Alternate
Darcy A. Carbone
Stebbins-Duffy, Inc.
6 Damon Rd.
Medford, MA 02155
617-957-2567
dcarbone@stebbinsduffy.com

Region CRC General Chair
Michael Circosta
8 Bayberry Rd.
Armonk, NY 10504
914-273-9173
mjcarmonk@optonline.net

Regional Electronics Communications Chair and Region Webmaster
Stacie Suh
Stebbins-Duffy, Inc.
10 Technology Dr. Ste. 1
Peabody, MA 01960
781-258-1002
Stacie@stebbinsduffy.com

Region Refrigeration Chair
Mark Cambria
Fusion Systems Engineering
634 Plank Rd. Ste. 203B
Clifton Park, NY 12065
518-621-0533
mcambria@fusionsystemseng.com

Region Chapter Programs Chair
Peter Oppelt
R.F. Peck Co.
Rochester, NY 14612
585-227-1720
poppelt@rfpeck.com

Director of Communications and Publications
Jodi Scott
ASHRAE
1791 Tullie Circle, N.E.
Atlanta, GA 30329
404-636-8400
jscott@ashrae.org

Director of Member Services
Joyce Abrams
ASHRAE
1791 Tullie Circle, N.E.
Atlanta, GA 30329
404-636-8400
jabrams@ashrae.org

Regional Representative
Garry Myers
WSP Flack + Kurtz
73 Bonnie Way
Allendale, NJ 07401
212-951-2815
garry.myers@wspfk.com
Your contribution puts us closer to achieving our goal. Please send what you can today!
Individual contributions of $100 or more and Corporate contributions of $150 or more receive this year’s Commemorative Coin and Honor Roll Contribution status.

Mail Check (Payable to “ASHRAE Research) to:
ASHRAE RESEARCH
DAC Sales
c/o Teri Shannon
PO Box 576
W. Kennebunk, ME 04094

Name: ____________________________________________________________
Company: __________________________________________________________
Address: ___________________________________________________________
TEL: _______________________________________________________________

INDIVIDUAL $25.00 $50.00 $100.00 $200.00 Other: ____________
CORPORATE $250.00 $500.00 $1,000.00 $2,000.00 Other: ____________

Contact Teri Shannon now! at 207-985-0873 or tshannon@dac-hvac.com

NorthEastAire

ASHRAE - BOSTON CHAPTER www.ashraeboston.org

Stephanie Lafontaine
RDK Engineers
70 Fargo Street
Suite 800
Boston, MA 02210
ADDRESS SERVICE REQUESTED