



**Better
Buildings®**
U.S. DEPARTMENT OF ENERGY

Healthcare Break-out Session

Monday, May 9th, 2:00 – 3:15 PM

Room: Holmead East

Level: Lobby

Agenda

- 2:00 Welcome & Introductions
- 2:15 Sector Priorities Discussion
- 2:30 Open Floor Discussion & Partner Highlights
- 3:00 Program Updates, New Resources & Activities
- 3:15 Adjourn

Welcome & Introductions

Better Buildings Team Members:



Sultan Latif
DOE
Healthcare Lead



Samantha Stafford
JDM
Hospitality
Account Manager



Kat Benitez
JDM
Healthcare Subject
Matter Expert

Healthcare Partner Introductions

- Wish I Could... Game!
- Share:
 - Your Name
 - Your Organization
 - Your Role
 - What you wish you/your team could achieve in energy or water efficiency at your organization if given the opportunity

Steering Committee Members (2014-2016)

- Corey Zarecki, *Gundersen Health System (Chair)*
- Drew Chidester, *University of Pittsburg Medical Center*
- Dan Lilly, *New York-Presbyterian Hospital*
- John Krolicki, *University of Pittsburg Medical Center*
- Jon Utech, *Cleveland Clinic Foundation*
- Kay Winokur, *Beaumont Health System*
- Pat Lydon, *Legacy Health*
- Richie Stever, *University of Maryland Medical Center*

Thank you!

Nominations are due June 15th.
Self-nominations are encouraged!

Sector Priorities Discussion

Sector Priorities

- **Priority 1: Evaluating offerings for building controls/analytics/EMIS and managing EMIS**
 - **Summit Session on Wednesday:** From Numbers to Action: Using EMIS to Detect Problems and Fix Them
 - **Resource:** [Primer on Organizational Use of EMIS](#)
 - **Webinar:** [Cutting Edge Building Technologies](#) (Building IQ Tech Demo with NYP)
 - **Tech Team Meeting:** [Hospitals Use Data Analytics & Monitoring Based Commissioning](#)
 - **Upcoming:** ASHRAE Guideline 36 *High Performance Sequences of Operation for HVAC Systems* (public review expected in Q2 2016)
 - **In development:** Peer exchange on efficiency software for EMIS

Sector Priorities

- Priority 2: Optimizing air exchange rates in hospitals
 - **Summit Session Today!** Optimizing Air Exchange Rates in Hospitals: Best Practices and New ASHRAE Guidance
 - **Peer Exchange:** [Ventilation Setbacks for Healthcare Facilities](#)
 - **Best Practices:** Cleveland Clinic's Engaging Clinicians to Reduce Resource Use in Operating Rooms [Implementation Model](#) and [video](#)
 - To be expanded with new developments!

Sector Priorities

- Priority 3: Managing energy consumption of central plants and related equipment
 - **Summit Sessions on Wednesday:**
 - Central Plants: Keeping the Heart and Lungs Healthy
 - Energy Efficiency for Large Building Chiller Systems
 - **Presentation:** [Systems Approach to Central Plant HVAC Optimization](#)
 - **Planned Resources:** Central Plant overview and best management practices

Open Floor Discussion & Partner Highlights

Open Floor Discussion

- New market trends?
- Utility engagement?
- New technologies?
- What is the next big thing?
- Did you attend the National Cancer Institute tour?
- How have you been engaging staff, doctors, others?
- How have you been funding energy and water efficiency projects?

Program Updates

Better Buildings 2015 Snapshot

Better Buildings Challenge Snapshot, 2015

Partnership	
Number of Partners and Allies	310+
Square Feet Represented	4.2 billion
New Partners in the past year	60+
Solutions	
Partner Solutions Available for Replication	400+
Results	
Energy Saved (Btus)	161 trillion
Dollars Saved	\$1.3 billion
Avoided CO ₂ e emissions (tons)	10.1 million
Funding Committed/Placed	\$5.5 billion / \$5.4 billion
Water Savings (gallons)	2.1 billion

Better Buildings Alliance Snapshot, 2015

Partnership	
Number of Member Organizations	202
Square Feet Represented	11+ billion
Percent of U.S. Commercial Buildings	13%
New Partners and Affiliates	19
New Resources Developed	
Business partners, technology and procurement specifications, user guides, rebate resources and case studies	40+

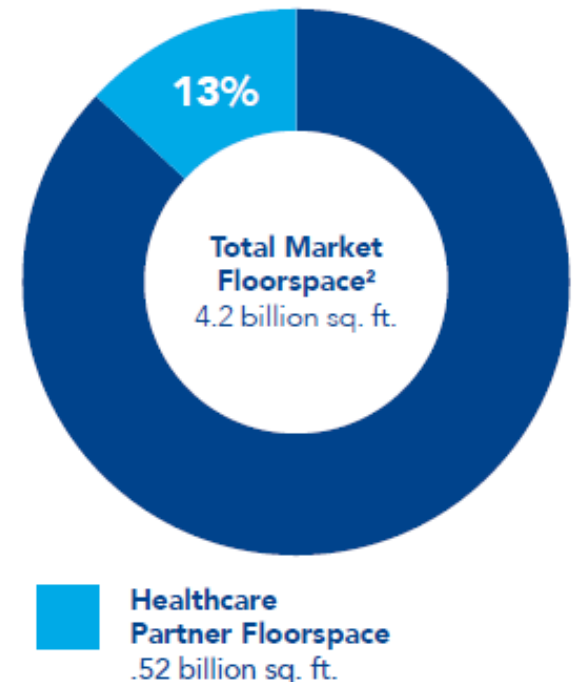
[Review the Better Buildings Alliance 2016 Winter Progress Update!](#)

BBA Sector Snapshot

Membership

- **Ascension***
- Beaumont Health System
- Bon Secours Health System
- Broward County Public Schools
- Catholic Health Initiatives (CHI)
- CentraCare Health
- **Cleveland Clinic Foundation***
- Defense Health Agency (DHA)
- Department of Veterans Affairs
- Gundersen Health System
- Health Care REIT
- HealthSouth
- Hospital Corporation of America
- Inova Health System
- Kaiser Permanente
- Legacy Health
- Lincoln Harris
- Mayo Clinic
- **NewYork-Presbyterian Hospital***
- North Shore-Long Island Jewish Health System
- Providence Health & Services
- Southwestern Vermont Health Care
- Summa Health System
- U.S. Department of Veterans Affairs
- **University of Maryland Medical Center***
- **University of Nebraska Medical Center***
- **UPMC: University of Pittsburgh Medical Center***
- University of South Alabama Medical Center
- University of Utah Health Care
- Veterans Health Administration
- Westchester Medical Center

Percent of Market Floorspace Of Healthcare Members



*Challenge Partner!

New BBA Partners since May 2015



UNIVERSITY OF UTAH
HEALTH CARE



University of Nebraska
Medical Center™
BREAKTHROUGHS FOR LIFE.®



RAMAPO
COLLEGE
OF NEW JERSEY



MICHIGAN STATE
UNIVERSITY



NORTHWESTERN
UNIVERSITY



New BBC Commercial Partners since May 2015



Saunders Hotel Group



NORTHWESTERN UNIVERSITY



Berkeley UNIVERSITY OF CALIFORNIA



General Program Updates

- **Watch** the [Better Buildings Challenge SWAP](#)
- **Check out** the new Better Buildings [Solutions Center](#) and program webpages
- *Upcoming:*
 - **Attend** the webinar “Sustainability How-to Guide Series – Measurement & Monitoring” on May 18th at 1pm
 - **Attend** the Renewable Integration Tech Team webinar “Energy Storage: Overview and Case Studies” on May 24th at 2pm

New Healthcare Sector Webpage!

<http://betterbuildingsolutioncenter.energy.gov/alliance/sector/healthcare>



Healthcare facilities are the third most energy-intensive facility type in the United States, spending more than \$11 billion on energy every year. In total, the sector constitutes 4 billion square feet of floorspace. Better Buildings Alliance Healthcare sector partners represent nearly 528 million square feet of space, or 13% of the total market in the United States. These leading healthcare organizations are developing strategic cost reduction programs to improve the environment of care for patients, employees and their communities.



Explore Market Solutions Resources: [Break Energy Efficiency Barriers](#)

Highlighted Sector Activities

View select opportunities available to Alliance partners. Sign up for a technology campaign, engage in peer-exchange call with experts, or adopt another partner's proven solution.

Take Action

Events Calendar

Better Buildings partners participate in webinars, peer-exchange calls, meetings, and industry workshops and conferences. Browse upcoming events and opportunities to participate by month.

Get Involved

Find Energy Solutions

Filter By:

BARRIER

--Choose--

BUILDING SIZE

--Choose--

BUILDING TYPE

--Choose--

LOCATION

--Choose--

PARTNER

--Choose--

SECTOR

--Choose--

CONTENT TYPE

--Choose--

TECHNOLOGY

--Choose--

← Healthcare-specific solutions and activities

Find More Solutions
Search or sort by:

- Energy efficiency barrier
- Your sector
- Your city or state
- Key words, and more!

Technology Team Updates

- New Resources Relevant to Sector:
 - [Solar Integration Case Studies for Healthcare](#)
 - [A Primer on Organizational Use of EMIS](#)
 - [Business Case for Proactive Advanced RTU Replacement](#)
 - [Decision Guides for Plug and Process Load Controls](#)
 - [Plug & Process Load Tech Team Presentation](#) with Pat Lydon from Legacy Health
- LEEP Campaign
 - Awards to be presented at Greenbuild conference in October
 - “Best Healthcare” sub-sector award!
- Interior Lighting Campaign (ILC)
 - Awards to be presented at BOMA national conference in June
- Advanced Roof-top Unit (ARC) Campaign
 - Awards presented at PRSM national conference in April

NEW! Smart Energy Analytics Campaign

The Smart Energy Analytics Campaign promotes the adoption of analytics software and ongoing monitoring.

Join the Campaign to receive

- Energy Management and Information Systems (EMIS) best practice resources and technical support
- Peer-to-peer learning network focusing on EMIS technology topic areas
- Recognition for exemplary performance

What does Campaign Participation look like?

- Participants pledge to install or use existing EMIS to analyze data and identify energy-saving improvements

www.smart-energy-analytics.org

Campaign is delivered in partnership with:



Healthcare Summit Sessions of Interest

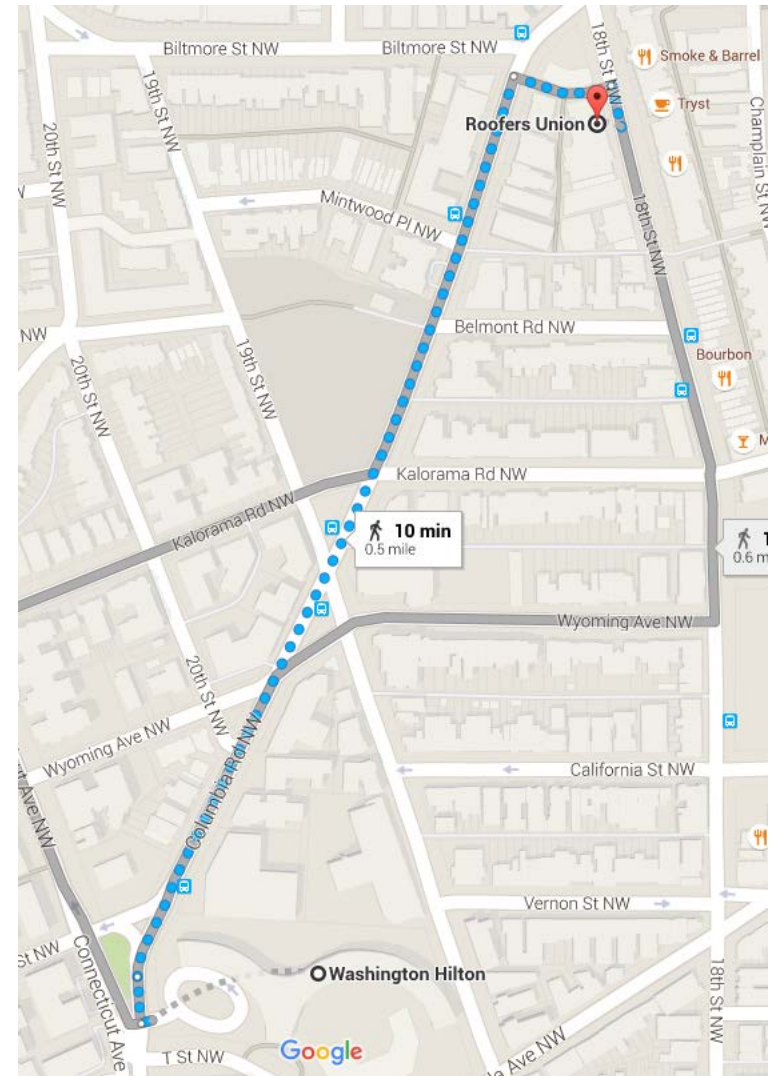
- Optimizing Air Exchange Rates in Hospitals: Best Practices and New ASHRAE Guidance
 - Today! – 3:45 to 5:00pm
 - Jim Prince, **Ascension**; Ken Hansen, **UNMC**
- Healthy Funding: Green Revolving Funds for Healthcare
 - Tuesday, May 10th – 9:45 to 11:00am
 - Jon Utech, **Cleveland Clinic**; Camille Grippon, **Bon Secours**
- Integrating Distributed Generation into Energy Efficiency Programs
 - Tuesday, May 10th – 2:00 to 3:15pm
 - Corey Zarecki, **Gundersen Health System**

Healthcare Summit Sessions of Interest

- **Central Plants: Keeping the Heart and Lungs Healthy**
 - Wednesday, May 11th – 9:45 to 11:00am
- **Energy Efficiency for Large Chiller Systems**
 - Wednesday, May 11th – 2:00 to 3:15pm
- **Results from the Field: Highlights from Technology Demonstration Projects**
 - Wednesday, May 11th – 3:45 to 5:00pm
- **From Numbers to Action: Using EMIS to Detect Problems and Fix Them**
 - Wednesday, May 11th – 3:45 to 5:00pm

TONIGHT! Sector Networking Event

TONIGHT!
5:30pm
Roofers Union
2446 18th St
Washington, DC
20009



Thank You

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