

**South Carolina Energy Independence and Sustainable Construction Advisory Committee
1201 Main Street, 6th Floor Conference Room, Columbia, SC 29201**

**Quarterly Meeting/Conference Call
10:00 AM., Wednesday February 7, 2018**

Public Notice of this meeting was properly posted at the Office of the State Engineer, 1201 Main Street, Suite 600, and provided to all requesting persons, organizations, and news media in compliance with the South Carolina Freedom of Information Act, Section 30-4-80.

MEETING AGENDA

- 1. Welcome and Call to Order**
- 2. Approval of Agenda**
- 3. Approval of Minutes of Previous Meetings: **Tab-1****
- 4. New Business:**
 - a. Review and comment on the progress from the Sub Committee as to their Charge to have a recommendation back to our committee on developing a methodology by which the cost-benefit ratio of the rating system can be measured.
 - b. Randy Jones would like 5 minutes to update the committee on ASHRAE's Beq which has gone to an online system.
- 5. Public Comments:**
- 6. Dates of Next Meeting: *TBD***
- 7. Adjournment:**

Quarterly Council Meeting Minutes
10:00 A.M., February 7, 2018

South Carolina Energy Independence and Sustainable Construction Advisory Committee
(EISCAC)

1201 Main Street, 6th Floor Conference Room, Columbia, SC 29201

Committee Members Present or Called in:

Joey A. Ferguson, Forestry Association – Pawleys Island, SC
Thomas R. Jones, ASHRAE – Mount Pleasant, SC
John White, State Engineer – Chair – Columbia, SC
Henry Porter, DHEC – Columbia, SC
John C. McLean, AIA – Columbia
Michael A. Snelling, Jr., Manufactures Alliance – Lexington, SC
Ashton Estridge, AGC – Lexington, SC
Kevin R. Krick, Council of Engineering and Surveying Societies – Lexington, SC
Ulrike Heine, Research University – Pendleton, SC
Anthony James, Energy Office – Columbia, SC

Committee Members Absent:

Chris Ruff, Chemistry Council – Pomaria, SC
Thomas H. Davis (Hamilton), Conservation Community – Isle of Palms, SC

Welcome and Call to Order by the Chair

The Chair welcomed the committee and the meeting was called to order at 10:05 am.

Approval of Agenda

- Motion to approve agenda was made seconded. Motion passed

Approval of Minutes for October 25, 2017 Meeting

- Motion to approve minutes was made seconded. Motion passed

Old Business

- Clint Burdett gave an update on the charge below and that the sub-committee has met and has set up future meeting dates to answer the questions in the 6 month deadline.
Make provisions for the establishment of a sub-committee is to research the facility energy efficiency rating systems established in the Energy Independence and Sustainable Construction Act of 2007 (the “Act”) and to develop and make recommendations to the Committee for the implementation of a methodology by which the cost-benefit ratio of the rating systems can be measured. In developing this methodology the sub-committee is to address the following three issues and make a recommendation back to the Committee.
 1. How many years should be used to evaluate the return on investment of implementing the requirements of the Act?
 2. Which sustainable construction practices (energy, water etc.) should be measured?
 3. What method should the A/E employee and what rigor should the A/E apply to measure the Cost Benefit ratio?
- The sub-committee was changed slightly with some retiring individuals as follows:
 1. Department of Mental Health, Ken Roey, 935-5655
 2. Department of Administration, ~~Scott Capell~~ retired, Amanda Heaitley, 734-4162
 3. ~~Midlands Technical College, Mike Proctor, 822-3217~~ retired
 4. AIASC, Adrienne Montare, 252-6050
 5. Society of Professional Engineers, Joe Jones, 771-4271
 6. Energy Office, Conn Fraser, 737-5229

7. USC, Derek Gruner, 777-1184
8. Clemson, Tony Putnam, 864 656-7300
9. Clint Burdett, OSE, 737-6598

New Business

- Randy Jones handed out, see attached, ASHRAE's BEQ. This is a Building Energy Quotient program that provides a quick energy analysis that benchmarks a buildings energy performance. This tool can be used in the design process as well as in operation.

Date of Next Meeting/Conference Call

- May 16, 2018, 10:00 am
- August 15, 2018, 10:00 am
- November 7, 2018 10:00 am

Adjournment

- The meeting adjourned at 10:31 am.

DRAFT



Be an Energy Genius

ASHRAE's Building Energy Quotient program
boosts your building's performance
the smart way.



Building EQ improves building energy performance

- Make informed decisions managing your building portfolio
- Compare your building's performance to similar buildings
- Connect building owners and managers with energy audit solutions
- Identify actionable recommendations for retrofits, maintenance, and upgrades
- Calculate the payback of prospective energy improvements and upgrades
- Improve building energy performance and reduce cost



Building EQ is Powered by ASHRAE



Building EQ rests on ASHRAE methodologies and standards and the experience of credentialed practitioners. These characteristics assure owners that they are receiving reliable and consistent results and recommendations.

Two separate ratings that work together:

IN OPERATION RATING

Compares actual building energy use to the baseline performance of similar buildings using metered energy information.

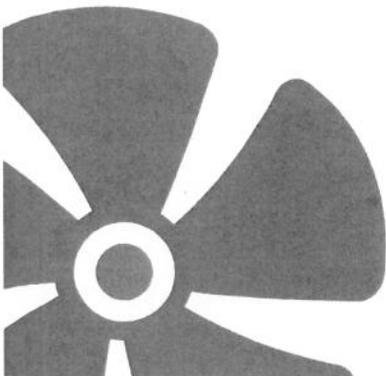
- Provides actionable recommendations with estimated costs and payback information that can be used to improve building energy performance
- Assists in preparation of an ASHRAE Level 1 Energy Audit
- Utilizes a standardized framework for assessing the building's energy usage provides consistent results
- Identifies low-cost/no-cost operations and maintenance improvements
- Recommends potential capital improvements
- Includes a survey of indoor environmental quality
- Calculates a **Building EQ Performance Score** to rate your building
- Requires 12 to 18 months of metered energy data



AS DESIGNED RATING

Compares potential building energy use to the baseline performance of similar buildings using a simulated standardized energy use model.

- Based on a building's physical characteristics and systems
- Independent of occupancy and operating variables
- Allows comparison of potential energy performance between buildings with very different operational and occupancy profiles
- Identifies whether a building is achieving the full design potential as compared to actual energy performance
- Models only the candidate building for consistency between the two ratings
- Applicable to both new and existing buildings



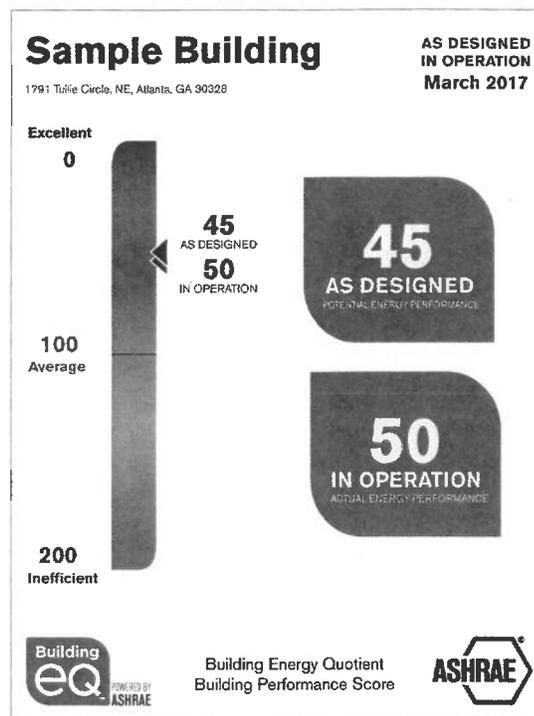
Benefits of Building EQ:

Building EQ identifies factors causing the gap between a building's as designed potential and its actual performance in operation. The building owner is connected with a credentialed practitioner who can help implement recommendations identified in the assessment.

Building EQ provides the credentialed practitioner with a consistent methodology to be followed and provides the owner with easily understood and applied information on their building's energy performance.

Building EQ delivers the following items:

- **Building EQ Performance Score**, rating your building's performance – available to all users
- **User Input Report**, documenting data entered into the Building EQ Portal – available for all submissions
- **Building EQ Disclosure Report**, presenting key energy use information for compliance with disclosure ordinances – available to credentialed practitioners for approved submissions
- **Building EQ Label Report**, displaying the Building EQ Performance Score – available to credentialed practitioners for approved submissions
- **Audit Report Spreadsheets**, automatically populated with the information gathered during the In Operation assessment for use in a final audit report – available to credentialed practitioners for approved submissions
- **Building EQ Database**, being created to allow access to aggregated information from submitted buildings for comparison and incentives – available soon



Building EQ Portal features:

- Online Data Entry and submission process
- Metered energy data exchange from ENERGY STAR® Portfolio Manager
- Median EUI calculation aligned with ENERGY STAR®
- Building EQ Performance Score visible to all users on the main input screen at all times
- Redesigned label/award that shows the Building EQ Performance Score on a barometer/scale. Letter grades have been eliminated
- Standard reports can be automatically generated by credentialed users
- Improved submission approval process
- Help and validation information built into the system
- Customized reporting capabilities in development

Be an Energy Genius

Building EQ Credentialed Practitioners

Official submittals must be submitted to ASHRAE by a credentialed provider (BEAP, BEMP, or Professional/Chartered Engineer).

For a list of ASHRAE Certified Professionals, visit www.ashrae.org/beap and www.ashrae.org/bemp.

You may also consult with a Professional or Chartered Engineer licensed in the jurisdiction where your building is located.

Verification of professional credentials is accomplished via a minimal one time set-up fee.

If you see this mark, you are working with a Building EQ Professional.



www.ashrae.org/BuildingEQ

Be an Energy Genius



ASHRAE's Building Energy Quotient program provides a quick energy analysis that benchmarks a building's energy performance. Building EQ also assists in preparation of an ASHRAE Level 1 Energy Audit to identify means to improve a building's energy performance including low-cost, no-cost energy efficiency measures and an Indoor Environmental Quality survey with recorded measurements to provide additional information to assess a building's performance.

Two different evaluations can be used independently to compare a candidate building to other similar buildings in the same climate zone or together for an assessment of a building's design potential compared to actual operation:

As Designed compares energy use based on the building's physical characteristics and systems

- Simulated standardized energy use model
- Independent of operational and occupancy variables

In Operation compares actual building energy use

- Based on actual metered energy use of a building
- Assists in preparation of on-site ASHRAE Level 1 Energy Audit
- Measurements confirm that indoor environmental quality is not compromised for energy savings

Benefits:

- ✓ Streamlines and improves the audit process
- ✓ Utilizes standard and consistent process for tracking improvement over time
- ✓ Provides a Building EQ performance score (efficiency) to benchmark building
- ✓ Compares building's performance score to other similar buildings
- ✓ Details actionable recommendations to improve a building's performance
- ✓ Provides documentation of the assessment and the results
- ✓ Creates an opportunity to reassess building performance following implementation of energy efficiency improvements to assess effectiveness (improved performance/rating)
- ✓ Offers a building label to recognize high performance buildings

For additional information, please visit www.ashrae.org/BuildingEQ

