M I N U T E S
2015 International Energy Conservation Code Task Force
Eighth Meeting
August 15, 2017, 10:00 A.M.

Call to order- Chairman, Joel Rodriguez called the meeting to order at 10:10 A.M. by welcoming and introducing Task Force members, Department of Community Affairs (DCA) staff, and guests. (See the last page of the minutes for a list of attendees).

Handouts- The following handouts were submitted prior to the meeting (Copies are available upon request.)

1. Air Barrier Insulation Installation Component Guide submitted by Mike Barcik, Southface
2. Energy Code Compliance Certificate submitted by Lauren Westmoreland, SEEA
3. Effective date of 2015 IECC by Neal Dawson, American Institute of Architects (AIA Georgia)
4. Effective date of 2015 IECC by Bruce Widener, Conditioned Air Association of Georgia (CAAG)
5. Effective date of 2015 IECC by Mark Rice, Building Officials Association of Georgia (BOAG)
6. National Electrical Manufacturers Associations (NEMA) opposing:
   - DCA #48, Section C402.4 (including deletion of C402.4.1.1 through C402.4.3.2)
   - DCA #52, Deletion of Section C405.2.3 and its subsections
7. American Architectural Manufacturers Association (AMMA) opposing:
   - DCA #48, Section C402.4 (including deletion of C402.4.1.1 through C402.4.3.2)
   - DCA #52, Deletion of Section C405.2.3 and its subsections
8. Fenestration Manufacturers Association (FMA) opposing:
   - DCA #47, Table C402.1.3
   - DCA #48, Section(s) C402.4 - C402.4.3.2
   - DCA #52, Section(s) C405.2.3- C405.2.3-405.2.3.2-C405-2-3-3

Approval of Minutes- The minutes from the June 15, 2017, Task Force meeting were reviewed.
A motion was made by Ryan Taylor and seconded by Ron Anderson to approve the minutes as written. ***Motion Carried Unanimously***

Code Effective Date Discussion-
Chairman Rodriguez discussed the effective date of the 2015 International Energy Conservation Code (2015 IECC) and updated the Task Force on his preliminary report, presented to the State Code Advisory Committee (SCAC). Considering the fact it took the Task Force longer than it was anticipated to review the code and all the proposed amendments, the deadline for submitting the final report to SCAC has passed. With the support of Task Force members, industry and general public Chairman announced the tentative effective date of the 2015 IECC will be January 1, 2019.
In lieu of the one year delay, the stepped implementation was amended, from the two approved amendments, item 58, R402.4.1.2 Testing and item 68, R403.3.4 Duct Leakage.

Item 58 - R402.4.1.2 Testing.
A motion was made by Mike Barcik and seconded by Elaine Powers to revise R402.4.1.2Testing to read as follows:
R402.4.1.2 Testing. All one and two-family dwelling units shall be tested and verified to less than five air changes per hour at 50 Pascals (ACH50) for Climate Zones 2, 3, and 4. ***Motion Carried Unanimously***

Item 68 - R403.3.4 Duct leakage.

A motion was made by Lauren Westmoreland and seconded by Elaine Powers to revise R403.3.4 Duct leakage to read as follows:

R403.3.4 Duct leakage ~~(Prescriptive)~~ (Mandatory). The total leakage of the ducts, where measured by one of the following methods in accordance with Section R403.3.3 shall be as follows:

1. **Rough-in test:** The total leakage shall be less than or equal to 4 cubic feet per minute (113.3 L/min) per 100 square feet (9.29 m^2) of conditioned floor area where the air handler is installed at the time of the test. ~~Where the air handler is not installed at the time of the test, the total leakage shall be less than or equal to 3 cubic feet per minute (85 L/min) per 100 square feet (9.29m^2) of conditioned floor space.~~
2. **Post-construction test:** Total leakage shall be less than or equal to 4 cubic feet per minute (113.3 L/min) per 100 sq. feet (9.29 m^2) of conditioned floor area.

   Exception:

   1. A duct air leakage test shall not be required where the ducts and air handlers are located entirely within the building thermal envelope.
   2. Duct tightness testing is not required for existing duct systems unless more than 50% of the duct system is modified.
   3. If the air handler, furnace or evaporator coil is replaced on an existing system, all joints, seams and connections from equipment to duct system and duct system connections to plenums within 5 feet from the new work shall meet the sealing requirements of this code and be verified by a visual inspection by the state licensed conditioned air contractor or by a DET Verifier. ***Motion Carried Unanimously***

Item 1 - C202 On-Site Renewable Energy definition.

A motion was made by Ron Anderson and seconded by Mike Barcik to approve C202 On-Site Renewable Energy definition as written. ***Motion Carried Unanimously***

Item 29 - Section C407.3 Performance-based compliance.

A motion was made by Mike Barcik and seconded by Max Rietschier to revise C407.3 Performance-based compliance to read as follows:

C407.3 Performance-based compliance. Compliance based on total building performance requires that a proposed building (*proposed design)* be shown to have an annual energy cost that is less than or equal to the annual energy cost of the *standard reference design.* Energy prices shall be taken from a source *approved* by the *code official,* such as the Department of Energy, Energy Information Administration's *State Energy Price and Expenditure Report. Code officials* shall be permitted to require time-of-use pricing in energy cost calculations. ~~Nondepletable energy collected off site shall be treated and priced the same as purchased energy. Energy from nondepletable energy sources collected on site shall be omitted from the annual the reduction in energy cost of the *proposed design.*~~ The reduction in annual energy cost of the *proposed design* associated with *on-site renewable energy* shall be not more than 5% of the total annual energy cost. The amount of renewable energy purchased from off-site sources shall be the same in the *standard reference design* and the *proposed design*.

Exception: Jurisdictions that require site energy (1 kWh = 3413 Btu) rather than energy cost as the metric of comparison.

C407.4.2 Additional documentation. The *code official* shall be permitted to require the following documents:

1. Documentation of the building component characteristics of the *standard reference design*.

2. Thermal zoning diagrams consisting of floor plans showing the thermal zoning scheme for *standard reference design* and *proposed design*.
3. Input and output reports from the energy analysis simulation program containing the complete input and output files, as applicable. The output file shall include energy use totals and energy use by energy source and end-use served, total hours that space conditioning loads are not met and any errors or warning messages generated by the simulation tool as applicable.
4. An explanation of any error or warning messages appearing in the simulation tool output.
5. A certification signed by the builder providing the building component characteristics of the *proposed design* as given in Table C407.5.1 (1).
6. Documentation of the reduction in annual energy use associated with on-site renewable energy. ***Motion Carried Unanimously***

Item 30 - Table C407.5.1 (1) Specifications for the Standard Reference and Proposed Designs.
A motion was made by Lauren Westmoreland and seconded by Ryan Taylor to disapprove Table C407.5.1 (1) Specifications for the Standard Reference and Proposed Designs.
Motion Carried Unanimously

Item 31 - R202 On-Site Renewable Energy definition.
A motion was made by Elaine Powers and seconded by Ron Anderson to approve R202 On-Site Renewable Energy definition as written. ***Motion Carried Unanimously***

Item 47 - Table C402.1.3 Opaque Thermal Envelope Insulation Component Minimum Requirements- R-value Method.
A motion was made by Ron Anderson and seconded by Lauren Westmoreland to revise Table C402.1.3 Opaque Thermal Envelope Insulation Component Minimum Requirements- R-value Method to read as follows: ***Motion Carried Unanimously***

TABLE C402.1.3 **OPAQUE THERMAL ENVELOPE INSULATION COMPONENT MINIMUM REQUIREMENTS R-VALUE METHOD**			
Climate Zone	**4 EXCEPT MARINE**		remainder of table left unchanged
	All other	**Group R**	
	Slab-on-grade floors		
Unheated slabs	~~R-10 for 24" below~~ NR	~~R-10 for 24" below~~ NR	
Heated slabs	R-15 for 24" below	R-15 for 24" below	

Item 49 - C403.2.3 HVAC equipment performance requirements.
A motion was made by Ron Anderson and seconded by Mike Barcik to approve C403.2.3 HVAC equipment performance requirements as written. ***Motion Carried Unanimously***

Item 50 - C403.2.3 HVAC equipment performance requirements.
Modification to C403.2.3 to reference 90.1-2016 HVAC efficiencies. Proponent withdrew the proposed amendment.

Item 51 - C403.4.2.6 Pump Isolation.

A motion was made by Neal Davis and seconded by Elaine Powers to revise C403.4.2.6 Pump Isolation to read as follows:

C403.4.2.6 Pump Isolation. Chilled water plants including more than one chiller shall have the capability to reduce flow automatically through the chiller plant when a chiller is shut down. Chillers piped in series for the purpose of increased temperature differential shall be considered as one chiller. Boiler plants including more than one boiler shall have the capability to reduce flow automatically through the boiler plant when a boiler is shut down. Flow isolation shall allow time for adequate thermal dissipation of residual heat to prevent relief before isolating boiler(s). ***Motion Carried Unanimously***

Item 52 - C405.2.3, C405.2.3.1, C405.2.3.2, C405.2.3.3.

Delete C405.2.3 Daylight-responsive controls. Daylight-responsive, Delete C405.2.3.1 Daylight-responsive control function, Delete C405.2.3.2 Sidelight daylight zone, Delete C405.2.3.3 Toplight daylight zone. Proponent withdrew the proposed amendment.

Item 53 - C408 SYSTEM COMMISSIONING.

Proponent withdrew the proposed amendment to delete SECTION C408 SYSTEM COMMISSIONING entirely.

A motion was made by Elaine Powers and seconded by Mike Barcik to delete C408.2.4.1 Acceptance of report and to strike the word "commissioning" and replace it with "functional performance testing" wherever it appears throughout the entire section C408 SYSTEM COMMISSIONING as required. ***Motion Carried Unanimously***

Item 54 - C408.2 Mechanical systems and service water-heating systems commissioning and completion requirements.

Revise C408.2 mechanical systems and service water-heating systems commissioning and completion requirements. Proponent withdrew the proposed amendment.

Item 55 - C408.2.3.1 Equipment.

Revise C408.2.3.1 Equipment. Proponent withdrew the proposed amendment.

Item 61 - C403.3 Economizers (Prescriptive).

A motion was made by Mike Barcik and seconded by Elaine Powers to approve C403.3 Economizers as written. ***Motion Carried Unanimously***

Item 62 - C403.2.9 Duct and plenum insulation and sealing.

A motion was made by Neal Davis and seconded by Mike Barcik to revise C403.2.9 Duct and plenum insulation and sealing to read as follows:

C403.2.9 Duct and plenum insulation and sealing. Supply and return air ducts and plenums shall be insulated with a minimum of R-6 insulation where located in unconditioned spaces and where located outside the building with a minimum of R-8 insulation in Climate Zones 2 through 4 ~~and a minimum of R-12 insulation in Climate Zones 5 through 8~~. Where located within a building envelope assembly, the duct or plenum shall be separated from the building exterior or unconditioned or exempt spaces by a minimum of R-8 insulation in Climate Zones 2 through 4 ~~and a minimum of R-12 insulation in Climate Zones 5 through 8~~.

The rest of section was left unchanged. ***Motion Carried Unanimously***

Item 63 - C403.2.9.2 Joints, Seams and Connections.
A motion was made by Neal Davis and seconded by Ron Anderson to revise C403.2.9 C403.2.9.2 Joints, Seams and Connections to read as follows:

Without exception all closure systems shall have mastic applied that is at least 0.08 inches (2mm) thick. Closure systems used to seal flexible air ducts and flexible air connections shall comply with UL 181B and shall be marked "181 B-FX" for pressure-sensitive tape or "181 B-M" for mastic.
The rest of section left unchanged. ***Motion Carried Unanimously***

Item 67 - R403.5.4 Drain water heat recovery units.
Proponent provided testimony in support of amendment.
A motion was made by Mike Barcik and seconded by Elaine Powers to approve R403.5.4 Drain water heat recovery units as written. ***Motion Carried Unanimously***
Chapter 6 [CE], Reference Standards needs to be amended to add IAPMO PS 92 as a new reference Standard.
Item 75 - Appendix RC, Air Barrier and Insulation Installation Component Guide.
A motion was made by Neal Davis and Seconded by Ryan Taylor to approve Appendix RC as written.
Motion Carried Unanimously

Item 76 - Appendix RD, Georgia Residential Energy Code Compliance Certificate.
A motion was made by Mike Barcik and Seconded by Elaine Powers to revise Appendix RD and submit it later to DCA. ***Motion Carried Unanimously***

OLD BUSINESS. There was no further old business.

NEW BUSINESS. There was no new business.

CONCLUSION OF MEETING

- Chairman Rodriguez announced the next scheduled meeting is September 21, 2017.
- No further business or discussion. The meeting adjourned at 4:10 P.M.

Attendees

Task Force Members Present: Joel Rodriguez, Ryan Taylor, Ron Anderson, Mike Barcik, Kelly Cutts, Neal Davis, Max Rietschier, Andrea Papageorge, James Martin, Elaine Powers, John Pruitt, Scott Walters, and Lauren Westmoreland.
Task Force Members Absent: Mark Gallman, Jim Moody and David Hirsch.

Staff Members Present: Ted Miltiades, Seti Ordoobadi, Bill Towson, Soli Nicolson, Matt McConnell and Kadedra Caldwell.

Guests: Bourke Reeve, Southface; Brian Shanks, Beazer Homes; Eric Lacey, RECA; Abe Kruger, SK Collaborative; Phil Brown, ICYNENE; Brian Griffin, Quality Air Inc.; Shan Arora, Southface; Bettie Sleeth, HBAG; Jeffery Saules, Energy Vanguard; Nick Wortel, APA; Berneta Haynes, Georgia Watch; Ron Petrey, Mingledorff's; Jennifer Deweese, Duke Realty; Meghan McNulty, ASHRAE/ Servidyne.

End of Minutes.