

Greg Carney convened the Non-Residential Task Group under Ratings at 9:10 am.

Greg asked for self-introductions from all who were in attendance.

Mike Manteghi (Traco) reported that the task group was doing a good job. However, the group needs to finalize the process so a ballot can be written and sent to the sub-committee for comments. Once the ballot has passed the sub-committee and committee review with all negatives resolved then the program and all supporting documents will be presented to the board for review and approval.

Greg Carney read the amended scope approved at the meetings in Quebec City noting that comments had been received to include "cost effective" into the scope. Mike Springer, Gary Curtis and Tracy Rogers spoke to this issue noting that there was no way to define cost effective. It was agreed that while it was not possible to quantify this term, it was an important aspect to consider when developing the program.

Discussion of Visio-Flow Chart, (identified as NFRC NRPTG Flow Chart, Draft IIa 07-21-05)

Greg noted that this flow chart had been presented at the Quebec City meetings and subsequently posted to the NFRC website for review and comment by the task group members either by direct email or through the task group on-line discussion board.

Greg noted that a number of comments had been received and all agreed to allow each respondent to present their comments with an open discussion by all following each commenter.

Comments from Charlie Curcija, Carli Inc.:

Charlie proposed "tightening up" the requirements for components to be entered into their respective databases such as:

- Simulation of glass option entries in the International Glass Database (IGDB)
- Simulation of all spacers.

Charlie also noted that individuals participating in the peer review process for the framing system would be required to understand the Therm program.

Charlie then proposed relaxing the requirements for certification by incorporating a new entity called the Approved Calculation Entity (ACE), which would replace the Calculation Agent (CA). While training on the software tool would be a requirement for ACE's, this entity would not be subject to the same rigorous requirements as an Accredited Calculation Agent (CA).

Margaret Webb noted that the current system of peer review for the IGDB has been an accepted and well-recognized system for glass options and recommended against modifying the current system. Margaret also noted that requiring simulations of glass options would not add any meaningful information to the process and would just increase the cost of the process. Jeff Baker (WESTLab) noted that the glass manufacturers have the in-house expertise to provide the optical properties for their products while simulator do not.

The task group agreed to accept the current methodology for glass options. Charlie noted that there were some issues with laminated glass. Jeff Baker noted this was beyond the scope of this task group and was being addressed by the Optical Properties Task Group.

Margaret also noted that the issue of simulating each spacer had been addressed in the IGMA parametric analysis of spacers, which supported grouping spacers by their thermal conductivity (K_{eff}). Marg noted that a task group was presently developing grouping criteria for spacers and current groupings would be:

- Group 1: spacers with a $K_{eff} < 1$
- Group 2: spacers with a K_{eff} 1 to 2
- Group 3: spacers with a $K_{eff} > 2$

It was noted that this did not preclude any spacer manufacturer from simulating products on an individual basis.

The task group agreed to defer this discussion pending the presentation from the technical working group reviewing the spacer groupings.

Marg noted that under Charlie's proposal, the process would no longer be considered a true third party certification program since the verification of the software calculations was not being independently verified. Marg supported the concept of the ACE noting that this changed the start of the certification process as outlined in the current chart. Marg noted that the introduction of the ACE removed the requirement for the Calculation Agent and that should certification be required, the Inspection Agent (IA) as already defined in the PCP could provide the third party independent verification required by NFRC. Marg noted that the IA's would require training on the software program in order to validate the work conducted by the ACE.

In response to an enquiry from the audience it was noted that the spacer component does not include the sealant.

In response to an enquiry from the audience it was explained that NFRC 303 would most likely be the document number for the spacer procedure.

Comments from Margaret Webb, IGMA:

Marg noted that comments provided by IGMA represent those received from the IGMA Technical Services Committee.

Marg reported that overall IGMA supports the current direction of this process noting that the most recent changes reflect the differences between the residential and commercial industries and the availability of the software as a design / bid tool for the commercial industry irrespective of certification. Marg reiterated that IGMA does not support simulation and / or testing of glass options nor individual spacers unless requested by the spacer manufacturer. IGMA supports the peer review process.

Marcia Falke (Keystone Certifications) noted that simulating a product is a straightforward process for simple systems but could be difficult if the framing system is complex and has multiple parts. Marcia recommended that further work be done on grouping framing systems and the effect this will have on the program.

Joel Smith (Arch Aluminum) recommended that a working group be created to define the criteria of how the framing information is included in the component "bucket". It was noted that this working group has been created.

Marg noted that IGMA supports the Whole Product System Calculation as outlined by the flow chart with one exception. IGMA proposes that all IG manufacturers participate in a nationally recognized IG certification program such as IGMA, ALI, IGCC in order to address statements made by the US DOE regarding IGU failures in Energy Star windows and also to provide verification of the construction of the IGU (desiccant, spacer and sealant system).

The task group members agreed to include IG certification as requirement under the Quality Assurance section of the NFRC Certification Program.

While beyond the scope of this task group, Marg reported that IGMA does not support the current proposal to acquire a hard copy label.

Marg recommended that further work be done on the role and identification of the Responsible Party, defining whether this would be a single or multi-party responsibility. It was also noted that there has been no participation from Registered Design Professionals in the development of this program.

After general discussion, the task group members agreed that the term Specifying Authority would replace the Registered Design Professional and this entity would sign the license agreement.

Greg Carney summarized the discussions:

1. No requirement to simulate glass options.
2. Framing system will require simulation by an accredited simulation lab or in the case of a non-accredited simulation; the accredited laboratory must accept the simulation data.
3. Include IG certification as a requirement for NFRC certification.
4. Responsible Party terminology to be removed. Specifying Authority to replace Registered Design Professional.

Larry Livermore (AAMA) noted that anyone who goes through the training should be able to use the tool. However, certification is a different issue and needs to be resolved. Larry also noted that the level of difficulty in a commercial system can be extremely difficult compared to a residential system.

Discussion of Responsibility:

It was agreed that each party to the process must be responsible for supplying its components to the project e.g. IG manufacturer stipulates that they have supplied the correct glass options and spacer, framing suppliers stipulates that they have supplied the correct framing system. The glazing contractor stipulates that he has received the same materials as used to develop these rating and the on-site contractor stipulates that he has received what was specified.

There was discussion regarding which party to the certification process would contract with NFRC to obtain the project label. A straw vote was taken with the following results:

Registered Design Professional responsible (AIA) -14.

Opposed to the above -5

It was noted that California leaves the responsible party open and designates this party as the specifier who indicates who supplies the NFRC label. It was also noted that the ICC does not include the Registered Design Professional. It was agreed that the term "Specifier" is an open term that can encompass whom they feel is responsible to supply the NFRC label.

It was agreed that the Calculation Agent (CA) is performing the role of the Inspection Agent (IA). With the task group acceptance of the concept of the ACE, the CA is now redundant and an IA can perform the verification of the calculation.

It was noted that the peer review group for the framing system would need to be knowledgeable about the Therm program to ensure that the modeling is accurate.

There was general discussion regarding product versus project certification including inclusion in the Certified Product Directory? General discussions noted that this is not necessary with the component model approach and that projects would be certified not products. This item requires further discussion.

It was agreed that further discussion was required for monitoring and verifying ACE calculation. It was noted that for certification, verification of the calculation is provided by the IA.

It was agreed that further discussion was required regarding oversight: e.g. NFRC to show compliance of the entire building (100%) or some percentage of the fenestration systems. It was agreed that further discussion of project certification was required.

Future Action Plans

1. Incorporate changes and edits to the current Visio Flow Chart. (Margaret Webb)
2. Develop text for the PCP based on changes to the Visio Flow Chart. Volunteers: Joel Smith, Tony Kamber, Greg Carney, Mike Manteghi, Gary Curtis, Charlie Curcija, Margaret Webb. Jeff Baker to chair the working group. Draft text to be presented at meeting in Santa Fe, NM.

It was agreed that the task group would meet for one hour in Santa Fe, NM and that there be no more than two external task group meetings scheduled for 2006.

Charlie Curcija convened the Non Residential Task Group (under Technical).

Charlie reported that the component modeling approach works for several type of configurations including double sash, single glazing, slope glazing, #10 structural glazing. Charlie reported that condensation resistance has not been verified.

Charlie reported that a one-page proposal has been submitted to the Research Subcommittee for consideration to develop new frame grouping rules for commercial projects.

Charlie proposed that for framing, the worst case frame scenario could included double clear, 6 mm glass by 1" overall and the best would include coated glass 6 mm glass, 1"overall.

Jeff Baker, chairperson for the Spacer Grouping Working Group reported that the group has not met to finalize the spacer groupings. A meeting date of November 4th, 1:pm Eastern was established.

Software Program Working Group:

This working group has been formed but has not met. This group will be reviewing and recommending program specifications for the software tool. It was agreed that this should be a web-based software program, compatible with LBNL programs Window and Therm.

Jeff Baker is the chairperson for this working group.

Labeling:

The group discussed the labeling proposal submitted by Greg McKenna (Kawneer). It was noted that this proposed labeling procedure works well for the framing manufacturers due to the finite number of framing systems offered however it does not work for the IG manufacturers due to the vast number of possible combinations of glass and spacer / sealant options available.

It was agreed that certificates would be issued per project not per product.

It was agreed that this item required further discussion.

The meeting was concluded.