GEW14-14
601.6 (New)

Proponent: Garrett Stone, Brickfield, Burchette, Ritts & Stone, representing Brickfield, Burchette, Ritts & Stone (gas@bbrslaw.com); Brian Dean (Brian.Dean@icfi.com); William Prindle (william.prindle@icfi.com); Maureen Guttman (mguttman@ase.org); Harry Misuriello (misuriello@verizon.net)

Add new text as follows:

601.6 Maximum envelope values under all compliance methods. Regardless of the method of compliance with this code, the area-weighted average U- factor, C-factor, F-factor and SHGC values applicable to each component of the building envelope shall not exceed by more than 10 percent the values specified in Tables C402.1.2 and C402.3 of the *International Energy Conservation Code*.

Reason: This proposal promotes energy conservation and environmental stewardship by adding a reasonable mandatory backstop for thermal envelope measures. The thermal envelopes of buildings designed and constructed today may be in existence for 100 years or more. Over the building's useful life, there will be regular changes in lighting, heating and cooling equipment, and other measures that can be accomplished without disturbing the building shell. However, the passive components of the thermal envelope – such as insulation – are likely to remain unchanged for much longer periods of time.

The IGCC is designed to enhance sustainability at all phases of the building – from design and construction to additions and alterations to removal and demolition. Buildings properly designed and constructed today will require fewer alterations in the future – and will result in lower impacts on the environment. This is why the most permanent elements of the building – components of the thermal envelope – must be built to a level of efficiency that will not be a burden to later owners and operators of the building.

The new section 601.6 we are proposing will apply an area-weighted cap or limit on the use of thermal envelope components to ensure prudent levels of performance are achieved by each envelope component in all buildings. Specifically, this new section allows each component to exceed the prescriptive requirements of the IGCC by roughly 20% (the current IGCC requires a 10% improvement over the IECC values; this proposal allows trade-offs of envelope values up to 10% higher than what the IECC allows). This approach will allow substantial trade-off flexibility while still ensuring that all envelope measures will exceed some reasonable level of performance.

The buildings designed and constructed today will be a part of the urban landscape for generations to come. It is important that the permanent envelope of each new building meets a level of efficiency within a reasonable range of the IGCC's envelope requirements.

Cost Impact: Will increase the cost of construction

Analysis: The International Energy Conservation Code tables referenced in the text of this proposal are numbers for the 2012 Edition. Due to significant changes approved for the 2015 IECC, the table numbers for the 2015 Editions will be C402.1.4 and C402.4