INTERPRETATION IC 90.1-2004-16 OF ANSI/ASHRAE/IESNA STANDARD 90.1-2004 Energy Standard for Buildings Except Low-Rise Residential Buildings

Date Approved: March 19, 2008

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<u>Reference</u>: This request for interpretation refers to the requirements presented in ANSI/ASHRAE/IESNA Standard 90.1-2004, Section 5.5.4.2.2, regarding skylights.

Background: Regarding the Standard 90.1-2004 requirement for skylights, we have a potential application on a project where there is a large percentage of horizontal skylight but each skylight is shaded by a permanent opaque device that encloses almost the entire skylight, leaving only a vertical north opening in the enclosure. These enclosures are designed so that the only solar entering the skylight is from the north. How should these skylights be treating per the code when using each of the following methods - prescriptive method, trade-off method, and whole building method? Are they still considered to be "skylights" or can they be considered as projected "vertical fenestration"?

<u>Interpretation</u>: A skylight shaded with a permanent opaque enclose that allows light to enter only through a vertical north opening can be considered as vertical fenestration facing north.

Question: Is this interpretation correct?

<u>Answer:</u> No. The code text is clear. The assembly described above is a skylight. The glazing described simply <u>is not</u> vertical fenestration by definition.

Comment: ASHRAE 90.1-2004 defines a skylight as:

fenestration: all areas (including the frames) in the building envelope that let in light, including windows, plastic panels, clerestories, skylights, glass doors that are more than one-half glass, and glass block walls. (See *building envelope* and *door*.)

- (a) *skylight:* a fenestration surface having a slope of less than 60 degrees from the horizontal plane. Other fenestration, even if mounted on the roof of a building, is considered vertical fenestration.
- (b) *vertical fenestration:* all fenestration other than skylights. Trombe wall assemblies, where glazing is installed within 12 in. of a mass wall, are considered walls, not fenestration.