ADDENDA

ANSI/ASHRAE/IES Addendum co to ANSI/ASHRAE/IES Standard 90.1-2022

Energy Standard for Sites and Buildings Except Low-Rise Residential Buildings

Approved by ASHRAE and by the American National Standards Institute on August 29, 2025; and by the Illuminating Engineering Society on July 29, 2025.

This addendum was approved by a Standing Standard Project Committee (SSPC) for which the Standards Committee has established a documented program for regular publication of addenda or revisions, including procedures for timely, documented, consensus action on requests for change to any part of the standard. Instructions for how to submit a change can be found on the ASHRAE® website (https://www.ashrae.org/continuous-maintenance).

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ASHRAE obtains consensus through participation of its national and international members, associated societies, and public review.

Tatsuro Kobayashi

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Abdel K. Darwich

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FOREWORD

Addendum co revises the wattage threshold to the automatic daylight responsive controls for sidelighted areas in Section 9.4.1.1(e). This change simplifies the enforcement of the standard and avoids requiring an additional sidelighted control areas for situations where there is not much power. Currently, daylighting controls in the primary sidelighting have a general lighting power threshold of 75 W. The general lighting power threshold for daylighting controls in both secondary and primary sidelighted daylight areas is 150 W regardless of the wattage split between the two areas. Under the current requirements, a daylight responsive control could be required for a few watts in the primary sidelighted daylight areas as long as there is 150 W in the secondary sidelighted daylight areas or vice versa. This addendum replaces the combined primary and secondary sidelighted daylight areas wattage threshold with a simplified requirement of a 75 W controls threshold for the primary sidelighted daylight areas, and a 75 W controls threshold for the secondary sidelighted daylight areas.

The minimum value for reducing lighting power by the automatic daylight responsive control system was changed from 20% to 10% lighting power. This change supports the controllability of LED lighting now being used and aligns the value with the multilevel lighting control requirement in Section 9.4.1.1(d).

This does not add cost in material and labor and therefore no cost effectiveness calculation is performed.

Informative Note: In this addendum, changes to the current standard are indicated in the text by <u>underlining</u> (for additions) and <u>strikethrough</u> (for deletions) unless the instructions specifically mention some other means of indicating the changes.

Addendum co to Standard 90.1-2022

Modify Section 9.4.1.1 as shown (I-P and SI).

9.4.1.1 Interior Lighting Controls. For each *space* in the *building*, all of the lighting control functions indicated in Tables 9.4.1-1 and 9.4.1-2, for the appropriate *space* type in the first column, and as described below, shall be implemented. All control functions indicated as "REQ" are mandatory and shall be implemented. If a *space* type has control functions indicated as "ADD1," then at least one of those functions shall be implemented. If a *space* type has control functions indicated as "ADD2," then at least one of those functions shall be implemented. For *space* types not listed, select a reasonably equivalent type.

If using the Space-by-Space Method, the *space* type used for determining control requirements shall be the same *space* type that is used for determining the *LPD* allowance.

[...]

e. Automatic daylight responsive controls for sidelighting: In any *space* where the combined input power of all *general lighting* completely or partially within the *primary sidelighted areas* is 75 W or greater, the *general lighting* in the *primary sidelighted areas* shall be controlled by photocontrols.

In any *space* where the combined input power of all *general lighting* completely or partially within the *primary sidelighted area* and *secondary sidelighted area* areas is 150 75 W or greater, the *general lighting* in the *primary sidelighted area* and *secondary sidelighted area* shall be controlled by photocontrols. *General lighting* in the *secondary sidelighted area* areas shall be controlled independently of the *general lighting* in the *primary sidelighted area* areas.

The control *system* shall have the following characteristics:

- 1. The calibration adjustment control shall be located no higher than 11 ft above the finished floor. Calibration shall not require the physical presence of a person at the sensor while it is processing.
- 2. The photocontrol shall reduce electric lighting power in response to available daylight using *continuous daylight dimming* to 20% 10% or less and off.
- 3. When an *automatic* reduction control has reduced the lighting power to the unoccupied *set point* in accordance with Section 9.4.1.1(g), the daylight responsive control shall adjust the electric light in response to available daylight, but it shall not allow the lighting power to be above the unoccupied *set point*.

Exceptions to (e):

1. *Primary sidelighted areas* where the top of any existing adjacent *structure* or natural object is at least twice as high above the windows as its horizontal distance away from the windows.

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- 2. Sidelighted areas where the total glazing area is less than 20 ft².
- 3. Primary sidelighted areas adjacent to vertical fenestration that have external projections and no vertical fenestration above the external projection, where the external projection has a projection factor greater than 1.0 for north-oriented projections or where the external projection has a projection factor greater than 1.5 for all other orientations (see Figure 3.2-6).

[...]

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POLICY STATEMENT DEFINING ASHRAE'S CONCERN FOR THE ENVIRONMENTAL IMPACT OF ITS ACTIVITIES

ASHRAE is concerned with the impact of its members' activities on both the indoor and outdoor environment. ASHRAE's members will strive to minimize any possible deleterious effect on the indoor and outdoor environment of the systems and components in their responsibility while maximizing the beneficial effects these systems provide, consistent with accepted Standards and the practical state of the art.

ASHRAE's short-range goal is to ensure that the systems and components within its scope do not impact the indoor and outdoor environment to a greater extent than specified by the Standards and Guidelines as established by itself and other responsible bodies.

As an ongoing goal, ASHRAE will, through its Standards Committee and extensive Technical Committee structure, continue to generate up-to-date Standards and Guidelines where appropriate and adopt, recommend, and promote those new and revised Standards developed by other responsible organizations.

Through its *Handbook*, appropriate chapters will contain up-to-date Standards and design considerations as the material is systematically revised.

ASHRAE will take the lead with respect to dissemination of environmental information of its primary interest and will seek out and disseminate information from other responsible organizations that is pertinent, as guides to updating Standards and Guidelines.

The effects of the design and selection of equipment and systems will be considered within the scope of the system's intended use and expected misuse. The disposal of hazardous materials, if any, will also be considered.

ASHRAE's primary concern for environmental impact will be at the site where equipment within ASHRAE's scope operates. However, energy source selection and the possible environmental impact due to the energy source and energy transportation will be considered where possible. Recommendations concerning energy source selection should be made by its members.

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