ADDENDA

ANSI/ASHRAE Addendum s to
ANSI/ASHRAE Standard 62.2-2022

Ventilation and Acceptable Indoor Air Quality in Residential Buildings

Approved by the ASHRAE Standards Committee on April 14, 2025, and by the American National Standards Institute on May 9, 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 (www.ashrae.org/continuous-maintenance).

The latest edition of an ASHRAE Standard may be purchased on the ASHRAE website (www.ashrae.org) or from ASHRAE Customer Service, 180 Technology Parkway, Peachtree Corners, GA 30092. E-mail: orders@ashrae.org. Fax: 678-539-2129. Telephone: 404-636-8400 (worldwide), or toll free 1-800-527-4723 (for orders in US and Canada). For reprint permission, go to www.ashrae.org/permissions.

 ISSN 1041-2336

Approved American National Standard
ANSI
www.ansi.org

SPECIAL NOTE

This American National Standard (ANS) is a national voluntary consensus Standard developed under the auspices of ASHRAE. *Consensus* is defined by the American National Standards Institute (ANSI), of which ASHRAE is a member and which has approved this Standard as an ANS, as "substantial agreement reached by directly and materially affected interest categories. This signifies the concurrence of more than a simple majority, but not necessarily unanimity. Consensus requires that all views and objections be considered, and that an effort be made toward their resolution." Compliance with this Standard is voluntary until and unless a legal jurisdiction makes compliance mandatory through legislation.

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

ASHRAE Standards are prepared by a Project Committee appointed specifically for the purpose of writing the Standard. The Project Committee Chair and Vice-Chair must be members of ASHRAE; while other committee members may or may not be ASHRAE members, all must be technically qualified in the subject area of the Standard. Every effort is made to balance the concerned interests on all Project Committees.

The Senior Manager of Standards of ASHRAE should be contacted for

a. interpretation of the contents of this Standard,
b. participation in the next review of the Standard,
c. offering constructive criticism for improving the Standard, or
d. permission to reprint portions of the Standard.

DISCLAIMER

ASHRAE uses its best efforts to promulgate Standards and Guidelines for the benefit of the public in light of available information and accepted industry practices. However, ASHRAE does not guarantee, certify, or assure the safety or performance of any products, components, or systems tested, installed, or operated in accordance with ASHRAE's Standards or Guidelines or that any tests conducted under its Standards or Guidelines will be nonhazardous or free from risk.

ASHRAE INDUSTRIAL ADVERTISING POLICY ON STANDARDS

ASHRAE Standards and Guidelines are established to assist industry and the public by offering a uniform method of testing for rating purposes, by suggesting safe practices in designing and installing equipment, by providing proper definitions of this equipment, and by providing other information that may serve to guide the industry. The creation of ASHRAE Standards and Guidelines is determined by the need for them, and conformance to them is completely voluntary.

In referring to this Standard or Guideline and in marking of equipment and in advertising, no claim shall be made, either stated or implied, that the product has been approved by ASHRAE.

(This foreword is not part of this standard. It is merely informative and does not contain requirements necessary for conformance to the standard. It has not been processed according to the ANSI requirements for a standard and may contain material that has not been subject to public review or a consensus process. Unresolved objectors on informative material are not offered the right to appeal at ASHRAE or ANSI.)

FOREWORD

Addendum s adds an informative appendix on how to implement infectious risk management to reduce the risk of disease transmission due to infectious aerosols in dwelling units. Because it is an informative appendix, compliance with the standard does not require compliance with this appendix. However, the addendum is written in enforceable language so that it can be adopted by an authority having jurisdiction, if one chooses. The appendix is based on ASHRAE Standard 241, Control of Infectious Aerosols.

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

Addendum s to Standard 62.2-2022

Add the following definition to Section 3.1.

3.1 Terms

***equivalent clean airflow*:** the theoretical flow rate of pathogen-free air that, if distributed uniformly within the breathing zone, would have the same effect on infectious aerosol concentration as the sum of actual outdoor airflow, filtered airflow, and inactivation of infectious aerosols.

Add new Informative Appendix X as shown below. Note that "X" is a placeholder.

(This appendix is not part of this standard. It is merely informative and does not contain requirements necessary for conformance to the standard. It has not been processed according to the ANSI requirements for a standard and may contain material that has not been subject to public review or a consensus process. Unresolved objectors on informative material are not offered the right to appeal at ASHRAE or ANSI.)

INFORMATIVE APPENDIX X
CONTROL OF INFECTIOUS AEROSOLS

X1. OVERVIEW

This appendix provides prescriptive requirements for infection risk management mode (IRMM) to reduce risk of long-range disease transmission due to infectious aerosols in dwelling units.

X2. DWELLING UNIT VENTILATION RATE DURING INFECTION RISK MANAGEMENT MODE

Dwelling units shall comply with ASHRAE Standard 241 or Section X.2.1.

X2.1 The ventilation rate (Q_{tot}) required in the dwelling unit to mitigate long-range transmission risk during infection risk management mode shall be no less than the greater of Q_{tot} as determined in Section 4.1.1 and $Q_{tot,IRMM}$ as determined in accordance with Equation X-1. Infiltration credit per Section 4.1.2 shall not be taken.

$$Q_{tot,IRMM} = \mathrm{ECA}_i \times P_{DU,IRMM} - \sum V_{ACS} \qquad \text{(X-1)}$$

where

$Q_{tot,IRMM}$ = minimum total required ventilation rate during all occupied hours in IRMM, cfm (L/s)

ECA_i = required equivalent clean airflow per person for infection risk mitigation, 30 cfm (15 L/s) per person

$P_{DU,IRMM}$ = number of people in the dwelling unit in IRMM; $P_{DU,IRMM}$ shall be no less than the number of occupants per Section 4.1.3

V_{ACS} = infectious air cleaning system equivalent clean airflow rate, determined per Section 7 of ASHRAE Standard 241, cfm (L/s)

X3. ADDITIONAL REQUIREMENTS

X3.1 General Requirements

X3.1.1 All toilets shall be provided with lids. The building readiness plan (BRP) shall indicate that lids are to be closed when flushing.

X3.1.2 All plumbing traps shall be filled with water.

X3.1.3 Fans used to meet the requirements of this appendix that are connected to ductwork exceeding 3 ft (1 m) shall have their flows measured in accordance with either Section 4.3 or 5.4.

X3.2 Building Readiness Plan (BRP). A BRP shall be created to describe the engineering and nonengineering controls, and their operation, that the facility will use to achieve its *total required ventilation rate* ($Q_{tot,IRMM}$) during IRMM. The BRP shall be included in a section of the operations and maintenance plan required by Section 8 of Standard 62.2. The BRP shall require that local exhaust ventilation be operated in bathrooms and toilets when in use.

X3.3 Multifamily Dwellings. Existing buildings with forced-air HVAC systems supplying air that is returned through ductwork from more than one dwelling unit shall have at least MERV 13A filtration or ePM1 of 50% filtration, per Standard 241, Table 7-1, or equivalent. Otherwise, the HVAC systems shall be blocked off and portable HVAC and air filtration/air cleaning units shall be provided.

X4. SEPARATION AREAS

When a dwelling unit has infected or vulnerable occupants, a separate, fully enclosed space shall be used as a separation area. It shall be permitted to have a single space comply nonsimultaneously with both Section X4.1 and X4.2 provided operation and any reconfiguration is described in the BRP. The BRP shall specify what protections caregivers shall take when entering a separation area. Where the separation area does not have restroom facilities, the BRP shall document how occupants of that area will access restroom facilities outside the area while minimizing infection risk.

X4.1 Separation Area for Infected Occupants. The separation area for infected occupants shall meet the requirements of either Section X4.1.1 or X4.1.2.

X4.1.1 The separation area shall be air sealed from the rest of the dwelling unit. Unsealed transfer grilles or jump ducts shall have a damper that operates during IRMM to prevent flow from the separation space to other parts of the dwelling unit. An exhaust ventilation system capable of a minimum of 140 cfm (70 L/s) shall be operated to exhaust the separation area to the outdoors. A fan installed in a window or other opening shall be permitted. Any supply registers and return grilles in the room that are part of the dwelling's central conditioning systems shall be sealed, with temporary space conditioning provided as needed.

X4.1.2 The separation area shall contain an exhaust ventilation system that can maintain a measured negative pressure of 5 Pa with respect to the rest of the dwelling unit.

X4.2 Separation Area for Vulnerable Occupants. The separation area for vulnerable occupants, as determined in accordance with the authority having jurisdiction, shall meet the requirements of either Section X4.2.1 or X4.2.2. Air that is mechanically recirculated from other parts of the dwelling unit into the separation area, such as via supply registers, shall meet the requirements of Section X3.3.

Exception to X4.2: No separation area for vulnerable occupants is required when the dwelling unit equivalent clean airflow meets or exceeds required V_{ECA_T} per Equation X-1 using ECA_i of 70 cfm (35 L/s) per person. For attached dwelling units, any ventilation greater than Q_{tot} from Section 4.1.1 shall not be provided by exhaust ventilation.

X4.2.1 The separation area shall be air sealed from other parts of the dwelling unit. Unsealed transfer grilles or jump ducts shall have a damper that operates during IRMM to prevent flow to the separation space from other parts of the dwelling unit. A supply ventilation system capable of a minimum of 140 cfm (70 L/s) shall be operated to supply equivalent clean air to the separation area. A fan installed in a window or other opening shall be permitted.

X4.2.2 The separation area shall contain a supply system that can maintain a measured positive pressure of 5 Pa with respect to other parts of the dwelling unit is required.

X5. REFERENCES

ASHRAE. 2023. ANSI/ASHRAE Standard 241-2023, *Control of Infectious Aerosols*. Peachtree Corners, GA: ASHRAE.

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.

ASHRAE · 180 Technology Parkway · Peachtree Corners, GA 30092 · www.ashrae.org

About ASHRAE

Founded in 1894, ASHRAE is a global professional society committed to serve humanity by advancing the arts and sciences of heating, ventilation, air conditioning, refrigeration, and their allied fields.

As an industry leader in research, standards writing, publishing, certification, and continuing education, ASHRAE and its members are dedicated to promoting a healthy and sustainable built environment for all, through strategic partnerships with organizations in the HVAC&R community and across related industries.

To stay current with this and other ASHRAE Standards and Guidelines, visit www.ashrae.org/standards, and connect on LinkedIn, Facebook, Twitter, and YouTube.

Visit the ASHRAE Bookstore

ASHRAE offers its Standards and Guidelines in print, as immediately downloadable PDFs, and via ASHRAE Digital Collections, which provides online access with automatic updates as well as historical versions of publications. Selected Standards and Guidelines are also offered in redline versions that indicate the changes made between the active Standard or Guideline and its previous version. For more information, visit the Standards and Guidelines section of the ASHRAE Bookstore at www.ashrae.org/bookstore.

IMPORTANT NOTICES ABOUT THIS STANDARD

To ensure that you have all of the approved addenda, errata, and interpretations for this Standard, visit www.ashrae.org/standards to download them free of charge.

Addenda, errata, and interpretations for ASHRAE Standards and Guidelines are no longer distributed with copies of the Standards and Guidelines. ASHRAE provides these addenda, errata, and interpretations only in electronic form to promote more sustainable use of resources.

5/25