2021 GROUP A PROPOSED CHANGES TO THE I-CODES

April 11 – May 5, 2021
Virtual Committee Action Hearings
2021 GROUP A – PROPOSED CHANGES TO THE INTERNATIONAL PROPERTY MAINTENANCE / ZONING CODE

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The following is the tentative order in which the proposed changes to the code will be discussed at the public hearings. Proposed changes which impact the same subject have been grouped to permit consideration in consecutive changes.

Proposed change numbers that are indented are those which are being heard out of numerical order. Indentation does not necessarily indicate that one change is related to another. Proposed changes may be grouped for purposes of discussion at the hearing at the discretion of the chair. Note that some PM code change proposals may not be included on this list, as they are being heard by another committee.

**IPMC**

- PM1-21
- PM2-21
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- PM6-21
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- PM8-21
- PM9-21
  - F117-21 Part II
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- PM11-21
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- PM18-21
  - F57-21 Part II
- PM19-21

**IZC**

- FS97-21 Part III
- G44-21 Part IV
- Z1-21
2021 International Property Maintenance Code

Revise as follows:

[A] 102.4 Existing remedies. The provisions in this code shall not be construed to abolish or impair existing remedies of the jurisdiction or its officers or agencies relating to the removal or demolition of any structure that is dangerous, unsafe or insanitary.

102.6 Structural analysis. Where structural analysis is used to determine if an unsafe or hazardous structural condition exists, the analysis shall be permitted to use nominal strengths, nominal loads, load effects, required strengths and limit states in accordance with the requirements under which the structure was constructed or in accordance with any subsequent requirement.

[A] 110.1 Authority. Where the code official finds any work regulated by this code being performed in a manner contrary to the provisions of this code or in a dangerous or an unsafe manner, the code official is authorized to issue a stop work order.

111.1 Unsafe structures. An unsafe structure is one that is found to be dangerous or hazardous to the life, health, property or safety of the public or the occupants of the structure by not providing minimum safeguards to protect or warn occupants in the event of fire, or because such structure contains unsafe equipment or is dangerous, so damaged, decayed, dilapidated, structurally unsafe or of such faulty construction or unstable foundations, that partial or complete collapse is possible.

111.1.5 Dangerous-Hazardous structure or premises. For the purpose of this code, any structure or premises that has any or all of the conditions or defects described as follows shall be considered to be dangerous or hazardous:

1. Any door, aisle, passageway, stairway, exit or other means of egress that does not conform to the approved building or fire code of the jurisdiction as related to the requirements for existing buildings.

2. The walking surface of any aisle, passageway, stairway, exit or other means of egress is so warped, worn loose, torn or otherwise unsafe as to not provide safe and adequate means of egress.

3. Any portion of a building, structure or appurtenance thereof is dangerous, that has been damaged by fire, earthquake, wind, flood, deterioration, neglect, abandonment, vandalism or by any other cause to such an extent that it is likely to partially or completely collapse, or to become detached or dislodged.

4. Any portion of a building or any member, appurtenance or ornamentation on the exterior thereof that is not of sufficient strength or stability, or is not so anchored, attached or fastened in place so as to be capable of resisting natural or artificial loads of one and one-half the original designed value.

5. The building or structure, or part of the building or structure, because of dilapidation, deterioration, decay, faulty construction, the removal or movement of some portion of the ground necessary for the support, or for any other reason, is likely to partially or completely collapse, or some portion of the foundation or underpinning of the building or structure is likely to fail or give way.

6. The building or structure, or any portion thereof, is clearly unsafe for its use and occupancy.

7. The building or structure is neglected, damaged, dilapidated, unsecured or abandoned so as to become an attractive nuisance to children who might play in the building or structure to their danger, becomes a harbor for vagrants, criminals or immoral persons, or enables persons to resort to the building or structure for committing a nuisance or an unlawful act.

8. Any building or structure has been constructed, exists or is maintained in violation of any specific requirement or prohibition applicable to such building or structure provided by the approved building or fire code of the jurisdiction, or of any law or ordinance to such an extent as to present either a substantial risk of fire, building collapse or any other threat to life and safety.

9. A building or structure, used or intended to be used for dwelling purposes, because of inadequate maintenance, dilapidation, decay, damage, faulty construction or arrangement, inadequate light, ventilation, mechanical or plumbing systems, or otherwise, is determined by the code official to be unsanitary, unfit for human habitation or in such a condition that is likely to cause sickness or disease.

10. Any building or structure, because of a lack of sufficient or proper fire-resistance-rated construction, fire protection systems, electrical systems, fuel connections, mechanical systems, plumbing systems or other cause, is determined by the code official to be a threat to life or health.

11. Any portion of a building remains on a site after the demolition or destruction of the building or structure or whenever any building or structure is abandoned so as to constitute such building or portion thereof as an attractive nuisance or hazard to the public.

113.1 General. The code official shall order the owner or owner’s authorized agent of any premises upon which is located any structure, which in the code official’s or owner’s authorized agent judgment after review is so deteriorated or dilapidated or has become so out of repair as to be dangerous, unsafe, insanitary or otherwise unfit for human habitation or occupancy, and such that it is unreasonable to repair the
structure, to demolish and remove such structure; or if such structure is capable of being made safe by repairs, to repair and make safe and sanitary, or to board up and hold for future repair or to demolish and remove at the owner’s option; or where there has been a cessation of normal construction of any structure for a period of more than two years, the code official shall order the owner or owner's authorized agent to demolish and remove such structure, or board up until future repair. Boarding the building up for future repair shall not extend beyond one year, unless approved by the building official.

201.3 Terms defined in other codes. Where terms are not defined in this code and are defined in the International Building Code, International Existing Building Code, International Fire Code, International Fuel Gas Code, International Mechanical Code, International Plumbing Code, International Residential Code, International Zoning Code or NFPA 70, such terms shall have the meanings ascribed to them as stated in those codes.

Exception: When used within this code, the terms “unsafe” and “dangerous” shall have only the meanings ascribed to them in this code and shall not have the meanings ascribed to them by the International Existing Building Code.

SECTION 202 GENERAL DEFINITIONS.

Add new definition as follows:

DANGEROUS. Any building, structure or portion thereof that meets any of the conditions described below shall be deemed dangerous:

1. The building or structure has collapsed, has partially collapsed, has moved off its foundation or lacks the necessary support of the ground.
2. There exists a significant risk of collapse, detachment or dislodgment of any portion, member, appurtenance or ornamentation of the building or structure under permanent, routine, or frequent loads; under actual loads already in effect; or under snow, wind, rain, flood, earthquake, or other environmental loads when such loads are imminent.

Reason Statement: The usage of the terms “unsafe” and “dangerous” in the International Property Maintenance Code (IPMC) is out of sync with the usage of these terms in the International Building Code (IBC) and the International Existing Building Code (IEBC). Further, the effective definition of the term “dangerous” in the IPMC conflicts with basic structural engineering philosophy and can be difficult-to-impossible to implement. The definition of dangerous in the IBC and IEBC was initially difficult-to-impossible to implement, and has slowly been improved, simplified, and clarified over a large number of code cycles. The definition in the IMPC has both lagged and diverged, creating conflicts between the codes. This proposal addresses these conflicts and also de-tangles the various uses of “dangerous,” “unsafe,” and “hazardous” in the IPMC. To match the IBC and IEBC, the term “dangerous” should only be in reference to structural conditions that pose a significant hazard to life safety. Similarly, the term “unsafe” applies to both (structurally) dangerous conditions as well as all other conditions that pose a significant hazard to life safety. And the term “hazardous” is used throughout all the codes but is not specifically defined and therefore is used in its commonly understood meaning to indicate a significant hazard to life safety.

Further, tying an unsafe or dangerous determination to stresses (as Item 4 in Section 111.1.5 does) is extremely problematic. The existing wording of Item 4 contains the undefined term “capable of resisting,” which is subject to debate as to its meaning, is not codified in any way, requires structural analysis when there may be insufficient information to conduct such an analysis, and seems to require factors of safety that many older structures do not have. For example, many older wood structures may not be able to resist 1.5 times their original design load due to substantial reductions in design capacities in modern codes. This does not typically mean that they are dangerous/unsafe and must be flagged as such; rather, it just means that they have somewhat lower margins of safety against failure than required today for new construction. Other structures may be constructed with archaic materials for which no standardized capacities exist, making calculation of “capable of resisting” challenging or impossible. These are all reasons why the IBC and IEBC have moved away from defining “dangerous” conditions via specific requirements for calculations or factors of safety.

This proposal addresses the following specific sections in the IPMC:

Section 102.4: Italicizes the term “dangerous” so it is clear that “dangerous” is a defined term.

Section 102.6: Changes “unsafe structural condition” to “dangerous structural condition”. This will de-tangle structural concerns from “unsafe,” and appropriately reference “dangerous” conditions.

Section 110.1: Eliminates the use of the commonly understood (but not defined in the code) meaning of ”dangerous”, and refers only to “unsafe”, which itself includes “dangerous” conditions.

Section 111.1.1: Replaces the use of the commonly understood (but not defined in the code) meaning of “dangerous” with “hazardous” to avoid the problems of re-defining dangerous in the middle of the code.

Section 111.1.5: Replaces the use of the commonly understood (but not defined in the code) meaning of “dangerous” with “hazardous” to avoid the problems of re-defining dangerous in the middle of the code.

Section 111.1.5 Items 3, 4, and 5: Eliminates these three varieties of dangerous conditions and merely references the term dangerous, which subsumes all of these structural conditions. These three conditions overlap significantly and unnecessarily.
Section 113.1: Italicizes the term "dangerous" so it is clear that "dangerous" is a defined term.

Section 201.3 Exception: This proposal eliminates the need to call out the term "dangerous" as a term that does not mean what it means in the rest of the ICC family of codes.

Section 202: Adds the word dangerous as defined in the IBC and IEBC.

Cost Impact: The code change proposal will not increase or decrease the cost of construction. No increases or decreases in the cost of construction are anticipated as a result of this proposal as it is simply coordinating the IPMC with existing requirements already in place in other I-codes.
PM2-21

IPMC: 301.2

Proponents: Wayne Jewell, representing Self (wayne.jewell@greenoaktwp.com)

2021 International Property Maintenance Code

Revise as follows:

301.2 Responsibility. The owner of the premises shall maintain the structures and exterior property in compliance with these requirements and the code under which the building was constructed, except as otherwise provided for in this code. The owner or owners agent shall be responsible to know that any alterations or modifications to the building or portion thereof, exterior or interior, are altered or modified in accordance with the International Building Code or International Existing Building Code. A person shall not occupy as owner-occupant or permit another person to occupy premises that are not in a sanitary and safe condition and that do not comply with the requirements of this chapter. Occupants of a dwelling unit, rooming unit or housekeeping unit are responsible for keeping in a clean, sanitary and safe condition that part of the dwelling unit, rooming unit, housekeeping unit or premises they occupy and control.

Reason Statement: Section 305.1 states that a structure and equipment shall be maintained in good repair, structurally sound and sanitary; but to what standard. We as code officials immediately think of the code under which it was constructed, unless there has been alterations and modifications. What if those alterations or modifications were made without permit? What if they weren't authorized by the owner? Do we allow the re-occupancy or continued occupancy of a structure or portion thereof when there are violations of the code? No, we respond as required - but who do we send notice of violations to? The tenant that made the changes and has now left the premises? The owner who claims they did know changes were made and has no responsibility. What section of the code do you cite stating the owner has responsibility for knowing what is going on in their building?

Section 305.1 currently only cites that the owner is only responsible of the public areas of the structure and the exterior if there are two or more tenants. So the illegal alteration of a tenant space is not their responsibility? I appreciate stuff happens.

We all know structure and portions thereof are altered without permit. But where in the code other than the IBC state that in an existing building the owner is responsible. This section of the property maintenance code seems to let the owner off the hook for keeping their structure maintained in accordance with minimum code provision for other than the public areas and exterior. Not new code provision but those under which the building was constructed.

Cost Impact: The code change proposal will not increase or decrease the cost of construction. As any alteration to a building or portion thereof is required to be made only under a permit. This proposal will not increase the cost of building ownership or maintenance. It is simply clarifying that the owner is responsible even if a tenant makes modification without permits.
PM3-21

IPMC: SECTION 202, (New), 303.2

Proponents: Nicholas Capezza, representing Pool & Hot Tub Alliance (ncapezza@phta.org); Jennifer Hatfield, representing Pool & Hot Tub Alliance (jhatfield@phta.org)

2021 International Property Maintenance Code

SECTION 202 GENERAL DEFINITIONS.

Add new definition as follows:

POWER SAFETY COVER. A pool cover that is placed over the water area, and is opened and closed with a motorized mechanism activated by a control switch.

SAFETY COVER. A structure, fabric or assembly, along with attendant appurtenances and anchoring mechanisms, that is temporarily placed or installed over an entire pool, spa or hot tub and secured in place after all bathers are absent from the water.

Revise as follows:

303.2 Enclosures. Private swimming pools, hot tubs and spas, containing water more than 24 inches (610 mm) in depth shall be completely surrounded by a fence or barrier not less than 48 inches (1219 mm) in height above the finished ground level measured on the side of the barrier away from the pool. Gates and doors in such barriers shall be self-closing and self-latching. Where the self-latching device is less than 54 inches (1372 mm) above the bottom of the gate, the release mechanism shall be located on the pool side of the gate. Self-closing and self-latching gates shall be maintained such that the gate will positively close and latch when released from an open position of 6 inches (152 mm) from the gatepost. An existing pool enclosure shall not be removed, replaced or changed in a manner that reduces its effectiveness as a safety barrier.

Exception: Spas or hot tubs equipped with a lockable safety cover that complies with ASTM F1346 and private swimming pools equipped with a power safety cover in working condition by the control switch that complies with ASTM F1346 shall be exempt from the provisions of this section.

Reason Statement: This proposal seeks to harmonize the International Property Maintenance Code and the International Swimming Pool and Spa Code on the subject of enclosures. The International Swimming Pool and Spa Code allows an exception on enclosures for pools that meet the appropriate ASTM standard while the current International Property Maintenance Code does not. This proposal also includes the International Swimming Pool and Spa Code definitions for power safety cover and safety cover to ensure conformity in the definitions used throughout the I-Codes.

Cost Impact: The code change proposal will not increase or decrease the cost of construction. This proposal will not increase the cost of construction because no additional labor, materials, equipment, appliances, or devices are mandated beyond what is currently required by the code.
Add new text as follows:

303.3 Operations and Maintenance. The operations and maintenance of public swimming pools and spas shall comply with PHTA 2.

Add new standard(s) as follows:


Staff Analysis: A review of the standard proposed for inclusion in the code, PHTAANSI/PHTA/ICC-2 2021 Standard for Public Pool and Spa Operations and Maintenance, with regard to some of the key ICC criteria for referenced standards (Section 3.6 of CP#28) will be posted on the ICC website on or before March 20, 2021.

Reason Statement: This proposal seeks to incorporate the ANSI/PHTA/ICC-2 Standard for Public Pool and Spa Operations and Maintenance into the International Property Maintenance Code to ensure maintenance and operations requirements and guidance exist for public pools and spas. The PHTA-2 is intended to cover public/commercial aquatic venues operation and maintenance, as a resource for jurisdictions seeking guidance on this topic. This Standard can then be used by state and local authorities as a health and safety document for the operation and maintenance of all types of public aquatic venues. Industry partners such as commercial pool and spa service companies, water park operators and public pool operators will then be required to use this Standard as the benchmark for the minimum standards to operate and maintain public aquatic venues. In many states building and health officials regulate public pools and spas together. By adding this Standard into the IPMC, we are following the intent of this Code “to ensure public health, safety and welfare insofar as they are affected by continued occupancy and maintenance of structures and premises” are followed. Further, as public health officials adopt this Standard by reference in their rule or ordinance, this ensures harmonization with what building departments have adopted, if they adopt the IPMC in their jurisdiction. This Standard coordinates with the design and construction requirements of the International Swimming Pool and Spa Code, creating harmonization among the I-Codes.

Cost Impact: The code change proposal will not increase or decrease the cost of construction
This proposal will not increase the cost of construction because no additional labor, materials, equipment, appliances, or devices are mandated beyond what is currently required by the code.
2021 International Property Maintenance Code

Revise as follows:

102.6 Structural analysis. Where structural analysis is used to determine if an unsafe condition exists, the analysis shall be permitted to use nominal strengths, nominal loads, load effects, required strengths and limit states in accordance with the requirements under which the structure was constructed or in accordance with any subsequent requirement.

201.3 Terms defined in other codes. Where terms are not defined in this code and are defined in the International Building Code, International Existing Building Code, International Fuel Gas Code, International Mechanical Code, International Plumbing Code, International Residential Code, International Zoning Code or NFPA 70, such terms shall have the meanings ascribed to them as stated in those codes.

Exception: When used within this code, the terms unsafe and dangerous shall have only the meanings ascribed to them in this code and shall not have the meanings ascribed to them by the International Existing Building Code.

304.1.1 Potentially unsafe conditions. The following conditions shall be determined as potentially unsafe, shall be assessed, and shall be repaired or replaced to comply with the International Building Code or addressed in compliance with the International Existing Building Code as required for existing buildings:

1. The nominal strength of any structural member is exceeded by nominal loads, the load effects or the required strength.
2. The anchorage of the floor or roof to walls or columns, and of walls and columns to foundations is not capable of resisting all nominal loads or load effects.
3. Structures or components thereof that have reached their limit state.
4. Siding and masonry joints including joints between the building envelope and the perimeter of windows, doors and skylights are not maintained, weather resistant or watertight.
5. Structural members that have evidence of deterioration or that are not capable of safely supporting all nominal loads and load effects.
6. Foundation systems that are not firmly supported by footings, are not plumb and free from open cracks and breaks, are not properly anchored or are not capable of supporting all nominal loads and resisting all load effects.
7. Exterior walls that are not anchored to supporting and supported elements or are not plumb and free of holes, cracks or breaks and loose or rotting materials, are not properly anchored or are not capable of supporting all nominal loads and resisting all load effects.
8. Roofing or roofing components that have defects that admit rain, roof surfaces with inadequate drainage, or any portion of the roof framing that is not in good repair with signs of deterioration, fatigue or without proper anchorage and incapable of supporting all nominal loads and resisting all load effects.
9. Flooring and flooring components with defects that affect serviceability or flooring components that show signs of deterioration or fatigue, are not properly anchored or are incapable of supporting all nominal loads and resisting all load effects.
10. Veneer, cornices, belt courses, corbels, trim, wall facings and similar decorative features not properly anchored or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
11. Overhang extensions or projections including, but not limited to, trash chutes, canopies, marquees, signs, awnings, fire escapes, standpipes and exhaust ducts not properly anchored or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
12. Exterior stairs, decks, porches, balconies and all similar appurtenances attached thereto, including guards and handrails, are not structurally sound, not properly anchored or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
13. Chimneys, cooling towers, smokestacks and similar appurtenances not structurally sound or not properly anchored, or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.

Exceptions:

1. Where substantiated otherwise by an approved method.
2. Demolition of unsafe conditions shall be permitted where approved by the code official.

305.1.1 Potentially unsafe Unsafe conditions. The following conditions shall be determined as potentially unsafe, shall be assessed, and shall be repaired or replaced to comply with the International Building Code or addressed in compliance with the International Existing Building Code as required for existing buildings:

1. The nominal strength of any structural member is exceeded by nominal loads, the load effects or the required strength.
2. The anchorage of the floor or roof to walls or columns, and of walls and columns to foundations is not capable of resisting all nominal loads or load effects.
3. Structures or components thereof that have reached their limit state.
4. Structural members are incapable of supporting nominal loads and load effects.
5. Stairs, landings, balconies and all similar walking surfaces, including guards and handrails, are not structurally sound, not properly anchored or are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
6. Foundation systems that are not firmly supported by footings are not plumb and free from open cracks and breaks, are not properly anchored or are not capable of supporting all nominal loads and resisting all load effects.

Exceptions:

1. Where substantiated otherwise by an approved method.
2. Demolition of unsafe conditions shall be permitted where approved by the code official.

306.1.1 Potentially unsafe Unsafe conditions. Where any of the following conditions cause the component or system to be beyond its limit state, the component or system shall be determined as potentially unsafe, shall be assessed, and shall be repaired or replaced to comply with the International Building Code or addressed in compliance with the International Existing Building Code as required for existing buildings:

1. Soils that have been subjected to any of the following conditions:
   1.1. Collapse of footing or foundation system.
   1.2. Damage to footing, foundation, concrete or other structural element due to soil expansion.
   1.3. Adverse effects to the design strength of footing, foundation, concrete or other structural element due to a chemical reaction from the soil.
   1.4. Inadequate soil as determined by a geotechnical investigation.
   1.5. Where the allowable bearing capacity of the soil is in doubt.
   1.6. Adverse effects to the footing, foundation, concrete or other structural element due to the ground water table.
2. Concrete that has been subjected to any of the following conditions:
   2.1. Deterioration.
   2.2. Ultimate deformation.
   2.3. Fractures.
   2.4. Fissures.
   2.5. Spalling.
   2.6. Exposed reinforcement.
   2.7. Detached, dislodged or failing connections.
3. Aluminum that has been subjected to any of the following conditions:
   3.1. Deterioration.
   3.2. Corrosion.
   3.3. Elastic deformation.
   3.4. Ultimate deformation.
   3.5. Stress or strain cracks.
   3.6. Joint fatigue.
   3.7. Detached, dislodged or failing connections.

4. Masonry that has been subjected to any of the following conditions:
   4.1. Deterioration.
   4.2. Ultimate deformation.
   4.3. Fractures in masonry or mortar joints.
   4.4. Fissures in masonry or mortar joints.
   4.5. Spalling.
   4.6. Exposed reinforcement.
   4.7. Detached, dislodged or failing connections.

5. Steel that has been subjected to any of the following conditions:
   5.1. Deterioration.
   5.2. Elastic deformation.
   5.3. Ultimate deformation.
   5.4. Metal fatigue.
   5.5. Detached, dislodged or failing connections.

6. Wood that has been subjected to any of the following conditions:
   6.1. Ultimate deformation.
   6.2. Deterioration.
   6.3. Damage from insects, rodents and other vermin.
   6.4. Fire damage beyond charring.
   6.5. Significant splits and checks.
   6.6. Horizontal shear cracks.
   6.7. Vertical shear cracks.
   6.8. Inadequate support.
   6.9. Detached, dislodged or failing connections.
   6.10. Excessive cutting and notching.

Exceptions:

1. Where substantiated otherwise by an approved method.
2. Demolition of unsafe conditions shall be permitted where approved by the code official.

Reason Statement: Responding to a stated preference of the IPMC committee, this proposal eliminates a conflict between the IPMC and the IEBC regarding unsafe conditions. Two cycles ago, the IPMC committee confirmed its desire for such a change, stating that Sections 304.1.1, 305.1.1, and 306.1.1 should keep their lists of conditions but otherwise need “to be revised to eliminate any conflicts with the IEBC.” (PM4-15.) As written, these three sections conflict with the IEBC in two ways. First, they deem certain conditions (some readily observable and some not) to
be *unsafe* by default. Second, they default to automatic repair or replacement, if not condemnation of the building by Section 111. By contrast, the IEBC accepts many non-conforming conditions, is open to further assessment, and understands *unsafe* and *dangerous* conditions as more severe and more generically described.

This proposal resolves the conflict by removing the default judgment and by prioritizing further assessment. It preserves the IPMC's lists and its reference to the IEBC as the basis for making corrections. It preserves the IPMC's role as an enforcement tool, still allowing the maintenance inspector to flag any of the listed conditions. This maintains the intent and broad usefulness of the IPMC while avoiding conflict with the IEBC.

The specific changes proposed are:

- In the first part of Sections 304.1.1, 305.1.1, and 306.1.1, the proposal changes *unsafe* to “potentially unsafe” in the provision title and text. It also shifts the focus from automatic repair or replacement to assessment. At the end of Sections 304.1.1, 305.1.1, and 306.1.1, the proposal removes the two exceptions. The first one is no longer needed; the earlier changes provide a clearer version of the same idea. The second one, regarding demolition, is already covered as an option in the IEBC.

- In Section 102.6, the proposal makes an edit to coordinate with the earlier changes.

- In Section 201.3, the proposal removes an exception that was added in the last cycle to acknowledge the IPMC-IEBC conflict. This exception is no longer needed once the conflict is resolved with the change from *unsafe* to “potentially unsafe”.

**Cost Impact:** The code change proposal will not increase or decrease the cost of construction. The proposal merely clarifies the intended procedure for addressing conditions that are suspected of being unsafe. One could even argue that the proposal decreases the cost of operating and maintaining existing buildings because it removes provisions that improperly call for the repair or replacement of components that might be found acceptable with further assessment.

2021 International Property Maintenance Code

Revise as follows:

304.1.1 Unsafe conditions. The following conditions shall be determined as unsafe and shall be repaired or replaced to comply with the International Building Code or the International Existing Building Code as required for existing buildings:

1. The nominal strength of any structural member is exceeded by nominal loads, the load effects or the required strength. Structural members have deterioration or distress that appears to reduce their load-carrying capacity.
2. The anchorage of the floor or roof to walls or columns, and of walls and columns to foundations is not capable of resisting all nominal loads or load effects. Structures or components thereof have deterioration or distress that appears to reduce their load-carrying capacity.
3. Structures or components thereof that have reached their limit state have deterioration or distress that appears to reduce their load-carrying capacity.
4. Siding and masonry joints including joints between the building envelope and the perimeter of windows, doors and skylights are not maintained, weather resistant or water tight.
5. Structural members that have evidence of deterioration or that are not capable of safely supporting all nominal loads and load effects.
6. Foundation systems that are not firmly supported by footings, are not plumb and free from open cracks and breaks, are not properly anchored or are not capable of supporting all nominal loads and resisting all load effects.
7. Exterior walls that are not anchored to supporting and supported elements or are not plumb and free of holes, cracks or breaks and loose or rotting materials, are not properly anchored or are not capable of supporting all nominal loads and resisting all load effects.
8. Roofing or roofing components that have defects that admit rain, roof surfaces with inadequate drainage, or any portion of the roof framing that is not in good repair with signs of deterioration, fatigue or without proper anchorage and incapable of supporting all nominal loads and resisting all load effects.
9. Flooring and flooring components with defects that affect serviceability or flooring components that show signs of deterioration or fatigue, are not properly anchored or are incapable of supporting all nominal loads and resisting all load effects.
10. Veneer, cornices, belt courses, corbels, trim, wall facings and similar decorative features not properly anchored or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
11. Overhang extensions or projections including, but not limited to, trash chutes, canopies, marquees, signs, awnings, fire escapes, standpipes and exhaust ducts not properly anchored or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
12. Exterior stairs, decks, porches, balconies and all similar appurtenances attached thereto, including guards and handrails, are not structurally sound, not properly anchored or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
13. Chimneys, cooling towers, smokestacks and similar appurtenances not structurally sound or not properly anchored, or that are anchored with connections not capable of supporting all nominal loads and resisting all load effects.

Exceptions:

1. Where substantiated otherwise by an approved method.
2. Demolition of unsafe conditions shall be permitted where approved by the code official.

305.1.1 Unsafe conditions. The following conditions shall be determined as unsafe and shall be repaired or replaced to comply with the International Building Code or the International Existing Building Code as required for existing buildings:

1. The nominal strength of any structural member is exceeded by nominal loads, the load effects or the required strength. Structural members have deterioration or distress that appears to reduce their load-carrying capacity.
2. The anchorage of the floor or roof to walls or columns, and of walls and columns to foundations is not capable of resisting all nominal loads or load effects. Structures or components thereof have deterioration or distress that appears to reduce their load-carrying capacity.
3. Structures or components thereof that have reached their limit state, have deterioration or distress that appears to reduce their load-carrying capacity.

4. Structural members are incapable of supporting nominal loads and load effects.

4.5. Stairs, landings, balconies and all similar walking surfaces, including guards and handrails, are not structurally sound, not properly anchored or are anchored with connections not capable of supporting all nominal loads and resisting all load effects.

5.6. Foundation systems that are not firmly supported by footings are not plumb and free from open cracks and breaks, are not properly anchored or are not capable of supporting all nominal loads and resisting all load effects.

Exceptions:

1. Where substantiated otherwise by an approved method.

2. Demolition of unsafe conditions shall be permitted where approved by the code official.

Reason Statement: As currently written, Items 1, 2, and 3 of Sections 304.1.1 and 305.1.1 conflict with the provisions of the IEBC regarding unsafe and dangerous buildings. These items have been rewritten to better coordinate with the IEBC, first by clarifying that the term unsafe is applicable where there is deterioration or distress, and second by removing wording that implies that an engineering analysis is needed to make a determination of unsafe. This effort to better align the IPMC language with the IEBC is consistent with the committee reason provided for Item PM4-15. In addition, Item 5 of Section 304.1.1 and Item 4 of Section 305.1.1 were identified as redundant with Item 1 and therefore deleted. Under the current IPMC language, undamaged buildings constructed using an older building code could potentially be identified as unsafe and the building official required under Section 108 to condemn them. As an example, an undamaged building with a seismic design in accordance with the 2012 IBC could be identified as not capable of resisting the nominal loads and load effects required by the 2018 IBC; this could be interpreted to make the building qualify as unsafe. The proposed language clarifies that without indication of deterioration or distress, this building is not intended to be considered unsafe. The proposed language also focuses the criteria for unsafe away from a calculated determination and towards a visual and judgement-based determination. This is more appropriate to the intent and the remaining provisions of Chapter 3 of the IPMC.

Cost Impact: The code change proposal will not increase or decrease the cost of construction
The proposal is only clarifying existing provisions, not creating new provisions.
PM7-21

IPMC: 304.14

Proponents: José G. Roig, Austin Code Department, City of Austin, Texas, representing City of Austin, Texas (jose.roig@austintexas.gov)

2021 International Property Maintenance Code

Delete without substitution:

304.14 Insect screens. During the period from [DATE] to [DATE], every door, window and other outside opening required for ventilation of habitable rooms, food preparation areas, food service areas or any areas where products to be included or utilized in food for human consumption are processed, manufactured, packaged or stored shall be supplied with approved tightly fitting screens of minimum 16 mesh per inch (16 mesh per 25 mm), and every screen door used for insect control shall have a self-closing device in good working condition.

   Exception: Screens shall not be required where other approved means, such as air curtains or insect repellent fans, are employed.

Reason Statement: The International Property Maintenance Code (IPMC), clearly states its intent on Section 101.3 as follows:

101.3 Intent. This code shall be construed to secure its expressed intent, which is to ensure public health, safety, and welfare insofar as they are affected by the continued occupancy and maintenance of structures and premises. Existing structures and premises that do not comply with these provisions shall be altered or repaired to provide a minimum level of health and safety as required herein.

As stated in the intent of this code, this is a maintenance code, and this code should not impose any requirements that are not imposed by any code for new construction. The existence of this section in the code has created issues for jurisdictions adopting the code, as it requires the installation of screens for the dates that are determined by the jurisdiction, for both residential and commercial structures. The problem with this requirement is that a new structure can obtain its Certificate of Occupancy without any screens and immediately be out of compliance with this maintenance code.

The solution to this dilemma is to delete the section when the code is adopted, but this creates a lot of questions from stakeholders that believe this requirement should be there to protect the occupants of these structures. Unless this requirement is added to both the International Residential Code (IRC) and the International Building Code (IBC) for new construction, it does not belong in this maintenance code, as it creates an unnecessary burden for existing structures. If this is a good requirement to ensure the minimum health and safety safeguards, why is this not required as part of the IRC or IBC?

The code should let local health codes and regulations to deal with this issue as it relates to food preparation areas, food service areas or any areas where products to be included or utilized in food for human consumption are processed, manufactured, packaged or stored.

Cost Impact: The code change proposal will not increase or decrease the cost of construction

The removal of this section does not impact construction, as insect screens are not required for new construction. If anything, it will reduce the cost of adding screens once the structure has received a Certificate of Occupancy.

PM7-21
2021 International Property Maintenance Code

304.18 Building security. Doors, windows or hatchways for dwelling units, room units or housekeeping units shall be provided with devices designed to provide security for the occupants and property within.

Revise as follows:

304.18.1 Doors. Doors providing access to an individual dwelling unit, rooming unit or housekeeping unit that is rented, leased or let shall be where equipped with a deadbolt lock the deadbolt lock shall be designed to be readily openable from the side from which egress is to be made without the need for keys, special knowledge or effort and shall have a minimum lock throw of 1 inch (25 mm). Such deadbolt locks shall be installed according to the manufacturer’s specifications and maintained in good working order. For the purpose of this section, a sliding bolt shall not be considered an acceptable deadbolt lock.

Reason Statement: The intent of this provisions is to remove a requirement in the IPMC that exceeds the IBC and the IEBC. IPMC Section 304.18.1 requires deadbolts on doors. The IBC does not require deadbolts on doors but allows for them in Section 1010.2.4. So once a building is constructed with doors that comply with Sections 716 for opening protectives, the question of altering the doors to provide deadbolts can be an issue. IEBC does not address adding locks. The proposal resolves a disconnect between the IBC and IPMC.

This proposal is submitted by the ICC Building Code Action Committee (BCAC). BCAC was established by the ICC Board of Directors in July 2011 to pursue opportunities to improve and enhance assigned International Codes or portions thereof. In 2020 the BCAC has held several virtual meetings open to any interested party. In addition, there were numerous virtual Working Group meetings for the current code development cycle, which included members of the committee as well as interested parties. Related documents and reports are posted on the BCAC website at BCAC.

Cost Impact: The code change proposal will not increase or decrease the cost of construction

Security locks are typically provided on these types of doors. The requirement for these not to be key operated is in IBC, so there is no change to requirements for the locks.
PM9-21

IPMC: [A] 101.2, 305.1.1

Proponents: Gregory Benton, NYS DOS Division of Building Standards and Codes, representing NYS DOS Division of Building Standards and Codes (gregory.benton@dos.ny.gov); Joseph Hill, NYSDOS, representing NYSDOS (joseph.hill@dos.ny.gov)

2021 International Property Maintenance Code

[A] 101.2 Scope. The provisions of this code shall apply to all existing residential and nonresidential structures and all existing premises and constitute minimum requirements and standards for premises, structures, equipment and facilities for light, ventilation, space, heating, sanitation, protection from the elements, a reasonable level of safety from fire and other hazards, and for a reasonable level of sanitary maintenance; the responsibility of owners, an owner's authorized agent, operators and occupants; the occupancy of existing structures and premises, and for administration, enforcement and penalties.

Revise as follows:

305.1.1 Unsafe conditions. The following conditions shall be determined as unsafe and shall be repaired or replaced to comply with the International Building Code, or the International Existing Building Code, or the International Residential Code as required for existing buildings

1. The nominal strength of any structural member is exceeded by nominal loads, the load effects or the required strength.
2. The anchorage of the floor or roof to walls or columns, and of walls and columns to foundations is not capable of resisting all nominal loads or load effects.
3. Structures or components thereof that have reached their limit state.
4. Structural members are incapable of supporting nominal loads and load effects.
5. Stairs, landings, balconies and all similar walking surfaces, including guards and handrails, are not structurally sound, not properly anchored or are anchored with connections not capable of supporting all nominal loads and resisting all load effects.
6. Foundation systems that are not firmly supported by footings are not plumb and free from open cracks and breaks, are not properly anchored or are not capable of supporting all nominal loads and resisting all load effects.

Exceptions:

1. Where substantiated otherwise by an approved method.
2. Demolition of unsafe conditions shall be permitted where approved by the code official.

Reason Statement: Repairs are required to be done in accordance with the Building Code and Existing Building Code, but it's silent regarding residential structures. Section 101.2 of the Property Maintenance Code indicates that it applies to both "residential and nonresidential" uses. A code change proposal will be submitted in the future to the Residential Code administrative provisions in Group B modifications replicating Section 305.1.1 of the Property Maintenance Code.

Cost Impact: The code change proposal will not increase or decrease the cost of construction
This proposal clarifies an existing provision and should not affect cost.

PM9-21
2021 International Property Maintenance Code

CHAPTER 3
GENERAL REQUIREMENTS

Add new text as follows:

310 ACCESSIBILITY.

310.1 Maintenance of facilities. A facility that is required to be accessible shall be maintained accessible during occupancy.

310.1.1 Extent of application. The accessible features of a facility shall be maintained in good repair, in a clean, structurally sound, and sanitary condition and free from impediments to accessibility.

Reason Statement: The 2021 IPMC code does not clearly state that accessible features of a facility, installed as required by the provisions of the code, are to be maintained during occupancy. Section 102.2 of the 2021 IPMC speaks broadly about the maintenance of “equipment, systems, devices and safeguards required by this code or a previous regulation or code under which the structure or premises was constructed, altered or repaired ...” but does not clearly stipulate that the required interior and exterior accessible features required by the 2021 IBC which include, but are not limited to, parking and passenger loading facilities (Section 1106); fixed seating in assembly areas (Section 1108.2); toilet and bathing facilities (Section 1109.2); or passenger elevators and lifts on accessible routes (Section 1109.7). Although the 2021 IBC does provide provisions for the maintenance of “existing buildings constructed prior to the adoption of [the] code”, the scope of Chapter 11 only includes design and construction (1101.1).

By explicitly stating that all required accessible features of a facility are to be maintained during occupancy, code users are more likely to understand and implement the requirement. Additionally, code enforcement officials will have a tool for enforcing this provision confidently.

Cost Impact: The code change proposal will not increase or decrease the cost of construction
As this is already required by other regulations, adding it here is simply a matter of clarification and does not impose a cost increase.
PM11-21
IPMC: (New), SECTION 310 (New), 310.1 (New), 310.2 (New), 310.3 (New), ICC Chapter 08 (New)

Proponents: Mike Nugent, Chair, representing ICC Building Code Action Committee (bcac@icc SAFE.org); Marc Levitan, representing ICC 500 Storm Shelter Standard Committee (marc.levitan@nist.gov)

2021 International Property Maintenance Code

Add new definition as follows:

STORM SHELTER. A building, structure or portion thereof, constructed in accordance with ICC 500, designated for use during hurricanes, tornadoes or other severe windstorms.

Add new text as follows:

SECTION 310 STORM SHELTERS.

310.1 General. Community storm shelters shall be evaluated, maintained and repaired in accordance with this section and ICC 500.

310.2 Evaluation. Community storm shelters shall be evaluated annually, and when requested by the authority having jurisdiction, in accordance with ICC 500.

310.3 Maintenance and Repairs. Community storm shelters shall be maintained in an operable condition. All structural and operational elements shall be repaired or replaced in accordance with ICC 500 where damaged or found to be inoperable.

Add new standard(s) as follows:


Reason Statement: The 2020 edition of ICC 500, which was incorporated by reference in the 2021 I-Codes, contains new provisions for the evaluation, maintenance and repair of community storm shelters. The owner or their authorized agent of a storm shelter are required to have the shelter evaluated annually and where requested by the authority having jurisdiction to identify whether any structural elements are damaged or whether any impact-protective systems (including doors, windows and shutters) are damaged or are not operational. Any structural elements or impact-protective systems are found to be damaged or not operational are required to be repaired or replaced in accordance with Section 113 of ICC 500. 2020 ICC 500:

SECTION 113

EVALUATION, MAINTENANCE AND REPAIRS

113.1 General. Community shelters shall be evaluated and maintained in accordance with Sections 113.2 through 113.4.

113.2 Evaluation. The owner or owner’s authorized agent shall evaluate the storm shelter annually and when requested by the authority having jurisdiction. The evaluation of the storm shelter shall include the following:

1. The storm shelter envelope shall be evaluated through visual observation to assess whether the walls and roofs are intact and undamaged.

2. Impact-protective systems shall be evaluated for compliance with the manufacturer’s operational and maintenance requirements.

113.3 Maintenance and repairs. Storm shelters shall be maintained in an operable condition at all times. All structural and operational elements shall be repaired or replaced where damaged or found to be inoperable. 113.3.1 Damaged or missing components. Storm shelters shall be maintained so that walls and roofs are intact and undamaged. Any damage to the storm shelter or its impact-protective systems that impair its functionality shall be repaired or replaced. Damaged or missing components shall be replaced with components that are specified within the tested or listed assembly. 113.3.2 Replacement assemblies and systems. Where it is necessary to replace certified or listed impact-protective systems, replacements shall comply with applicable ICC 500 requirements and shall be tested and installed as required by this standard for new installations or construction. 113.4 Recordkeeping. A record of the evaluations shall be maintained by the owner or owner’s authorized agent. A record of the evaluations and any other tests, repairs or replacements and other operations and maintenance shall be kept on the premises or other approved...
location and consist of all changes to the original storm shelter envelope or impact-protective systems. Records shall include the date and person conducting the evaluations and maintenance or repairs. The proposed IPMC storm shelter provisions trigger evaluations of community storm shelters in order to verify that they are able to continue protecting occupants from extreme wind events. Door assemblies in multi-use storm shelters are especially vulnerable to disrepair when used frequently for their ‘normal use’ functions (e.g., gym, classroom, auditorium). Observations of existing storm shelter door assemblies have revealed the following common maintenance issues that can result in operational failure during an extreme wind event: debris in floor latch points preventing full connection, rust, and malfunctioning hardware. The new ICC-500 provision is specific to community storm shelters. Residential storm shelters are excluded so as not to burden homeowners who choose to incorporate a small residential storm shelter into their home or provide one in their yard.

This proposal is submitted by the ICC Building Code Action Committee (BCAC) and the ICC 500 Development Committee. BCAC was established by the ICC Board of Directors in July 2011 to pursue opportunities to improve and enhance assigned International Codes or portions thereof. In 2020 the BCAC has held several virtual meetings open to any interested party. In addition, there were numerous virtual Working Group meetings for the current code development cycle, which included members of the committee as well as interested parties. Related documents and reports are posted on the BCAC website at BCAC.

The ICC 500 (Standard for the Design and Construction of Storm Shelters) development committee has held several virtual meetings during the last two years to develop the 202 edition. In addition, there were numerous virtual Working Group meetings. All meetings included members of the committee as well as interested parties. Related documents and reports are posted on the ICC 500 website at ICC 500.

Cost Impact: The code change proposal will increase the cost of construction
The cost increase would largely be from the time and labor for the owner (or their agent) to conduct the annual visual inspection and/or hire an engineer or architect if needed for a more detailed evaluation. There would also be a cost to replace a damaged component for an impact-resistant door or window, or other impact-protective system (e.g. hurricane shutter) or the entire assembly if deemed necessary.
Proponents: Kevin Stewart, American Lung Association, representing American Lung Association; Jane Malone, American Association of Radon Scientists and Technologists, representing American Association of Radon Scientists and Technologists; Thomas Bowles, representing EPA (bowles.thomas@epa.gov); Ruth McBurney, representing CRCPD (rmcburney@crcpd.org); Jonathan Wilson, National Center for Healthy Housing, representing National Center for Healthy Housing (jwilson@nchh.org); Tobie Bernstein, representing Environmental Law Institute (bernstein@eli.org); David Kapturowski, representing Spruce Environmental Technologies, Inc. (dave@spruce.com)

2021 International Property Maintenance Code

CHAPTER 4
LIGHT, VENTILATION AND OCCUPANCY LIMITATIONS

SECTION 403 VENTILATION.

Add new text as follows:

403.6 Radon. Radon levels in multifamily buildings shall be tested in accordance with ANSI-AARST MAMF. Radon levels exceeding four pCi/L in multifamily buildings shall be mitigated in accordance with ANSI-AARST RMS-MF.

Add new standard(s) as follows:

AARST


Staff Analysis: A review of the standards proposed for inclusion in the code, ANSI/AARST MAMF-2017 Protocol for Conducting Measurements of Radon and Radon Decay Products in Multifamily Buildings and ANSI/AARST RMS-MF-2018 Radon Mitigation Standards for Multifamily Buildings, with regard to some of the key ICC criteria for referenced standards (Section 3.6 of CP#28) will be posted on the ICC website on or before March 20, 2021.

Reason Statement: The purpose of this proposed requirement is to protect families from exposure to radon gas in multifamily buildings. A requirement for radon testing and mitigation will protect occupants who have no authority, capacity, or other means to address excessive radon levels in their homes. Radon is present in indoor air everywhere, regardless of building type or radon zone. Radon-induced lung cancer takes 21,000 lives in the US each year. The awareness of the need to address radon in multifamily buildings is increasing. HUD’s multifamily loan program (which finances both market-rate and subsidized properties) requires radon testing and mitigation in all multifamily properties according to the measurement and mitigation consensus standards.[1] Several states (Illinois, Minnesota, New Jersey, Oregon, Washington) require soil gas control in the construction of multifamily buildings. Since 2017, the International Green Construction Code, in conjunction with the related standard ASHRAE 189.1, has required soil gas control in new green buildings.

The standards included in this proposal have been vetted and approved by EPA, multiple regulatory states and by HUD (as mentioned above). They can be viewed for free at https://standards.aarst.org

More Background on Radon:

Epidemiological studies confirm that radon increases the risk of lung cancer in the general population. Radon is the second leading cause of lung cancer – second only to smoking – and more significant than secondhand smoke. In the US alone, 21,000 lung cancer deaths each year are caused by radon exposure. 3 The World Health Organization estimates that between 3% and 14% of all lung cancer cases worldwide are caused by radon exposure. 4 The Surgeon General of the United States issued a Health Advisory in 2005 warning Americans about the health risk from exposure to radon in indoor air. Dr. Richard Carmona, the Nation’s Chief Physician, urged Americans find out how much radon they might be breathing. Dr. Carmona also stressed the need to remedy the problem as soon as possible when the radon level is 4 pCi/L or more.

Radon is a colorless and odorless gas that is a decay product of uranium and occurs naturally in soil and rock. The main source of high-level radon pollution in buildings is surrounding uranium-containing soil such as granite, shale, phosphate and pitchblende. Radon enters a building through cracks in walls, basement floors, foundations and other openings. There is no known threshold concentration below which radon exposure presents no risk. Even low concentrations of radon can result in a small increase in the risk of lung cancer.
Cost Impact: The code change proposal will increase the cost of construction. The proposal will increase the cost of property maintenance. Testing will cost $50-80 per unit. Mitigation, if needed, will cost $1,500-$4,000 per unit. Costs can vary depending on structural and market factors.
Proponents: Benjamin Pothoff, representing City of Dubuque

2021 International Property Maintenance Code

Revise as follows:

404.3 Minimum ceiling heights. Habitable spaces, hallways, corridors, and portions of basements containing these spaces, laundry areas, bathrooms, toilet rooms and habitable basement areas shall have a minimum clear ceiling height of 7 feet (2134 mm). Bathrooms, toilet rooms and laundry rooms shall have a ceiling height of not less than 6 feet 8 inches (2032 mm).

Exceptions:

1. In one- and two-family dwellings, beams or girders spaced not less than 4 feet (1219 mm) on center and projecting not greater than 6 inches (152 mm) below the required ceiling height.
2. Basement rooms in one- and two-family dwellings occupied exclusively for laundry, study or recreation purposes, having a minimum ceiling height of 6 feet 8 inches (2033 mm) with a minimum clear height of 6 feet 4 inches (1932 mm) under beams, girders, ducts and similar obstructions.
3. Rooms occupied exclusively for sleeping, study or similar purposes and having a sloped ceiling over all or part of the room, with a minimum clear ceiling height of 7 feet (2134 mm) over not less than one-third of the required minimum floor area. In calculating the floor area of such rooms, only those portions of the floor area with a minimum clear ceiling height of 5 feet (1524 mm) shall be included.

Reason Statement: Inconsistent language between IPMC section 404.3 and IRC section 305.1 would in effect allow construction of a dwelling in compliance with the IRC however upon completion, it would be immediately in violation of the IMPC. IPMC section 404.3 specifically requires laundry areas, bathrooms, and toilet rooms to have a minimum ceiling height of 7 feet. Exception 2 provides that basement rooms in one- and two-family dwellings occupied exclusively for laundry, study, or recreation purposes have a minimum ceiling height of 6 feet 8 inches. IRC section 305.1 allows bathrooms, toilet rooms, and laundry rooms to have a minimum ceiling height of 6 feet 8 inches.

By changing IPMC 404.3 to allow bathrooms, toilet rooms, and laundry areas/rooms to have a minimum ceiling height of 6 feet 8 inches the two codes will be consistent.

Bibliography: 2021 International Property Maintenance Code

Cost Impact: The code change proposal will not increase or decrease the cost of construction
No change to cost of construction, less restrictive on property maintenance requirement.
PM14-21
IPMC: 404.4, 404.4.1, 404.5, TABLE 404.5

Proponents: Gerard Hathaway, representing New York State Department of State (Gerard.Hathaway@dos.ny.gov); China Clarke, representing New York State Dept of State (china.clarke@dos.ny.gov)

2021 International Property Maintenance Code

Revise as follows:

404.4 Bedroom and living room Habitable room and bedroom requirements. Every habitable room and bedroom and living room shall comply with the requirements of Sections 404.4.1 through 404.4.5.

404.4.1 Room area. Every habitable room living room shall contain not less than 120 square feet (11.2 m²) and every bedroom shall contain not less than 70 square feet (6.5 m²) and every bedroom occupied by more than one person shall contain not less than 50 square feet (4.6 m²) of floor area for each occupant thereof.

404.5 Overcrowding. Dwelling units shall not be occupied by more occupants than permitted by the minimum area requirements of Table 404.5.

Revise as follows:
TABLE 404.5
MINIMUM AREA REQUIREMENTS

<table>
<thead>
<tr>
<th>SPACE</th>
<th>MINIMUM AREA IN SQUARE FEET</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1-2 occupants</td>
</tr>
<tr>
<td>Living room</td>
<td>70</td>
</tr>
<tr>
<td>Dining room</td>
<td>No requirement</td>
</tr>
<tr>
<td>Bedrooms</td>
<td>Shall comply with Section 404.4.1</td>
</tr>
</tbody>
</table>

For SI: 1 square foot = 0.0929 m².

a. See Section 404.5.2 for combined living room/dining room spaces.
b. See Section 404.5.1 for limitations on determining the minimum occupancy area for sleeping purposes.

Reason Statement: The purpose of this code change is to coordinate the minimum room area requirements found in the International Property Maintenance Code (IPMC) with those found in the International Residential Code (IRC) and the International Building Code (IBC). We have received technical support questions on this subject in New York State, and nationally it has been discussed in industry related forums online.

IPMC 404.4.1 requires that every living room contain not less than 120 square feet (11.2 m²) and every bedroom contain not less than 70 square feet (6.5 m²). The IBC has similar language which is somewhat compatible with the IPMC, requiring that every dwelling unit shall have not less than one room (not specifically a living room) that shall have not less than 120 square feet (11.2 m²) of net floor area, and that other habitable rooms (not only but including bedrooms) shall have a net floor area of not less than 70 square feet (6.5 m²). However, IRC R304.1 simply requires that habitable rooms (including living rooms, bedrooms, etc.) shall have a floor area of not less than 70 square feet (6.5 m²).

Possible scenario: A dwelling unit could be constructed under the IRC or IBC with a 70 square foot living room as allowed by both the IRC and IBC, receive a Certificate of Occupancy, and they would not be in compliance with the 2018 IPMC, which requires a minimum 120 square foot living room. Section 404.5 Overcrowding and Table 404.5 Minimum Area Requirements are retroactive for property maintenance purposes and apply to dwelling units built under the IRC and IBC for municipalities who have adopted the IRC, IBC and IPMC. This could be a problem because municipalities often have local requirements to re-inspect properties when they change hands to confirm that the conditions of the C of O are still in place or as a regular inspection schedule. That inspection would turn up the non-compliance, even though the 70 square foot living room was originally built to code.

The proposed changes to IPMC 404.4 and 404.4.1 are meant to use language (the term "habitable rooms") which is compatible with both the IRC and IBC for consistency. Also, to allow small dwellings to have the minimum 70 square foot living rooms as intended by both the IRC and IBC.

This code change proposal also includes a change in IPMC 404.5 Overcrowding, specifically Table 404.5 Minimum Area Requirements. The "Living Room"/"1-2 occupants" cell of the table has been changed to delete the minimum 120 square foot requirement and allow a minimum 70 square foot Living Room for 1-2 occupants in small dwellings constructed under either the IRC or IBC.

This change continues the effort to allow smaller dwellings built under the IRC and IBC to be compatible with the IPMC once they are completed. Previous cycle code change proposal RB106-13 (R304.1, R304.2), approved for the 2015 IRC, removed the requirement that every dwelling unit have at least one room not less than 120 square feet from the IRC. One of the prime reasons given for that code change proposal was to allow small dwellings to be built under the IRC.

Some people believe that a 70 square foot living room for up to 2 occupants is too small when compared to the efficiency unit requirements that require a minimum of 120 square feet for a maximum of one occupant.

Under IBC Section 1207.4 "Efficiency dwelling units" it is stated that; "An efficiency living unit shall conform to the code except as modified herein." The section allows smaller units if specific provisions are followed. The IPMC has a corresponding Section 404.6 with occupancy limitations that apply only to Efficiency Units constructed under the IBC and does not apply to dwelling units constructed under the IRC.

The IPMC Efficiency Unit minimum floor area of 120SF is because it is allowed to be the only room except for the required separate closet and bathroom for one occupant and increasing by 100SF per additional occupant up to a total of three.

The IRC allows a minimum floor area of 70SF per habitable room (but, must still follow the requirements of the IPMC). A dwelling unit constructed under the IRC to minimum area requirements would have floor areas that add-up as follows: Living Room 70SF, plus Bedroom 70SF for one occupant (as a combined 140SF space this is already more than the 120SF minimum required for an Efficiency Unit in the IBC), plus bathroom, closets and any other non-habitable spaces. If there were two occupants that would add another 70SF if in separate bedrooms (one 100SF bedroom required if they shared).

Again, this proposed change allows Tiny Houses in the IRC and does not affect the requirements of the IBC and is meant simply to coordinate
provisions of the IRC with the occupancy limitations of the IPMC.

New York State has already made this change as of May 12, 2020.

**Cost Impact:** The code change proposal will decrease the cost of construction
Allowing small homes to be built, without forcing them to provide a 120 square foot living room, will decrease cost.
PM15-21

IPMC: 404.6

Proponents: Mike Nugent, Chair, representing ICC Building Code Action Committee (bcac@icc.org)

2021 International Property Maintenance Code

Revise as follows:

404.6 Efficiency unit. Nothing in this section shall prohibit an efficiency living unit from meeting the following requirements:

1. A unit occupied by not more than one occupant shall have a minimum clear floor area of 120 square feet (11.2 m²). A unit occupied by not more than two occupants shall have a minimum clear floor area of 190 square feet (17.6 m²). A unit occupied by three occupants shall have a minimum clear floor area of 260 square feet (24.1 m²). These required areas shall be exclusive of the areas required by Items 2 and 3.

2. The unit shall be provided with a kitchen sink, cooking appliance and refrigeration facilities, each having a minimum clear working space of 30 inches (762 mm) in front. Light and ventilation conforming to this code shall be provided.

3. The unit shall be provided with a separate bathroom containing a water closet, lavatory and bathtub or shower.

4. The maximum number of occupants shall be three.

Reason Statement: This proposal aims to correlate the minimum clear floor area requirements for efficiency dwelling units between the IPMC to that of the IBC. There was a similar proposal last cycle, G130-18 Part II. The proposal was rejected because of the inclusion for Type A and Type B unit, therefore, we removed that from the proposal.

This proposal is submitted by the ICC Building Code Action Committee (BCAC). BCAC was established by the ICC Board of Directors in July 2011 to pursue opportunities to improve and enhance assigned International Codes or portions thereof. In 2020 the BCAC has held several virtual meetings open to any interested party. In addition, there were numerous virtual Working Group meetings for the current code development cycle, which included members of the committee as well as interested parties. Related documents and reports are posted on the BCAC website at BCAC.

Cost Impact: The code change proposal will decrease the cost of construction
The correlation for the IPMC to match that of the IBC for occupied units, reduces the square footage for minimum clear floor area.
Proponents: Steven Rosenstock, Edison Electric Institute, representing Edison Electric Institute (srosenstock@eei.org)

2021 International Property Maintenance Code

Revise as follows:

602.2 Residential occupancies. Dwellings shall be provided with heating facilities capable of maintaining a room temperature of 68°F (20°C) in all habitable rooms, bathrooms and toilet rooms based on the winter outdoor design temperature for the locality indicated in Appendix D of the International Plumbing Code. Cooking appliances shall not be used, nor shall portable unvented fuel-burning space heaters be used, as a means to provide required heating. The installation of one or more portable space heaters shall not be used to achieve compliance with this section.

Exception: In areas where the average monthly temperature is above 30°F (-1°C), a minimum temperature of 65°F (18°C) shall be maintained.

602.3 Heat supply. Every owner and operator of any building who rents, leases or lets one or more dwelling units or sleeping units on terms, either expressed or implied, to furnish heat to the occupants thereof shall supply heat during the period from [DATE] to [DATE] to maintain a minimum temperature of 68°F (20°C) in all habitable rooms, bathrooms and toilet rooms. Cooking appliances shall not be used, nor shall portable unvented fuel-burning space heaters be used, as a means to provide required heating. The installation of one or more portable space heaters shall not be used to achieve compliance with this section.

Exceptions:

1. When the outdoor temperature is below the winter outdoor design temperature for the locality, maintenance of the minimum room temperature shall not be required provided that the heating system is operating at its full design capacity. The winter outdoor design temperature for the locality shall be as indicated in Appendix D of the International Plumbing Code.

2. In areas where the average monthly temperature is above 30°F (-1°C), a minimum temperature of 65°F (18°C) shall be maintained.

Reason Statement: This proposal modifies Sections 602.2 and 602.3 to make the language more enforceable and to put restrictions in the appropriate sections.

As currently written, section 602.2 is not enforceable for existing properties. It would require code officials to try to track the sale and use of portable space heaters in residential and commercial buildings (where the occupants own the building and own all of the heating equipment) on a continuous basis. If found, then a code official would have to confiscate such units, which are available in hardware stores and on-line, and could be replaced in a day.

In existing buildings, as currently written, 602.2 would prevent the use of such systems during periods of building renovations when central heating systems are taken off-line.

In existing buildings, it would prevent their use in times of emergencies (e.g., a central heating system shut down and could not be repaired or replaced for a significant amount of time, possibly allowing unsafe thermal conditions).

In existing buildings, portable electric space heaters do not create any emissions or indoor air quality issues.

Portable electric space heaters are safe to use in existing buildings and are required to meet safety standards, such as UL 1278.

The International Fire Code (IFC) allows the use of listed portable electric space heaters. Therefore, as currently written, 602.2 would conflict with the IFC. This code change will remove that conflict.

According to the US Energy Information Administration, Nationwide, 37% of U.S. households supplement their main equipment with a secondary source of heat. Almost half of these households use portable electric heaters, the most common secondary heating choice in every climate region. (emphasis added) (see https://www.eia.gov/todayinenergy/detail.php?id=30672 for more information).

By moving the language from 602.2 to 602.3, the code will be more usable, more enforceable, and will ensure that the problems noted with landlords will still be solved by having the language in Section 602.3.

Cost Impact: The code change proposal will not increase or decrease the cost of construction.
Portable space heaters are appliances that are purchased by homeowners or building owners at hardware stores or at on-line web sites after a building has been built.
2021 International Property Maintenance Code

Add new text as follows:

603.2 Inspection and Maintenance of HVAC Systems. The inspection and maintenance of HVAC systems in one and two family dwellings and multi-family dwellings of three stories or fewer above grade shall be performed in accordance with ANSI/ACCA 4 QM.

The inspection and maintenance of HVAC systems in commercial buildings shall be performed in accordance with ASHRAE/ACCA/ANSI Standard 180.

607.2 Inspection and Maintenance. The inspection and maintenance of duct systems in one and two family dwellings and multi-family dwellings of three stories or fewer above grade shall be performed in accordance with ANSI/ACCA 4 QM.

The inspection and maintenance of duct systems in commercial buildings shall be performed in accordance with ASHRAE/ACCA/ANSI Standard 180.

Add new standard(s) as follows:

ANSI/ACCA QM 4-2019: Quality Maintenance of Residential HVAC Systems


Reason Statement: The purpose of this proposal is to clarify the applicable national standards that cover inspection and maintenance of HVAC systems installed in residential and commercial buildings. Currently, the 2021 IMC references ASHRAE/ACCA/ANSI Standard 180, which pertains to Commercial Building HVAC systems. For HVAC systems in residential buildings, ANSI/ACCA 4 QM is the applicable standard, however ACCA’s proposal to add 4 QM to the IMC in conjunction with Standard 180 were rejected during the last code change cycle for the reason that the IMC only covers commercial buildings and not residential. Since this is a maintenance issue, ACCA is proposing the above to clarify which standards for maintenance and inspection are applicable. A description of both standards’ purpose and scope is shown below. Both standards are ANSI approved and published standards. The purpose and scope of ANSI/ACCA 4 QM is to provide minimum requirements for the inspection, by appropriately licensed HVAC contractors, of residential HVAC equipment found in one- or two-family dwellings of three or fewer stories. This standard includes checklist tasks for inspecting, testing, and measuring electrical, controls, mechanical, venting, air distribution, and piping systems of residential HVAC systems. The purpose and scope of ASHRAE/ACCA/ANSI Standard 180 is to establish minimum HVAC inspection and maintenance requirements that preserve a system’s ability to achieve acceptable thermal comfort, energy efficiency, and indoor air quality in commercial buildings. The scope of Standard 180 provides minimum requirements for the HVAC system inspection and maintenance practice in new and existing buildings. This includes HVAC equipment, air distribution systems, air handlers, and other equipment. The provisions of this standard do not apply to single-family houses or multifamily structures of three or fewer stories above grade.

2. ANSI/ACCA 4 QM-2019, Quality Maintenance of Residential HVAC Systems

Cost Impact: The code change proposal will not increase or decrease the cost of construction

The standards proposed for inclusion are currently being used and are considered current industry practice.
SECTION 606 ELEVATORS, ESCALATORS AND DUMBWAITERS.

606.1 General. Elevators, dumbwaiters and escalators shall be maintained in compliance with ASME A17.1. The most current certificate of inspection shall be on display at all times within the elevator or attached to the escalator or dumbwaiter, be available for public inspection in the office of the building operator or be posted in a publicly conspicuous location approved by the code official. The inspection and tests shall be performed at not less than the periodic intervals listed in ASME A17.1, Appendix N, except where otherwise specified by the authority having jurisdiction.

606.2 Elevators. In buildings equipped with passenger elevators, not less than one elevator shall be maintained in operation at all times when the building is occupied.

   Exception: Buildings equipped with only one elevator shall be permitted to have the elevator temporarily out of service for testing or servicing.

Add new text as follows:

606.3 Private residence elevators. Requirements for private residence elevators shall be in accordance with Sections 603.3.1 through 603.3.3.

606.3.1 General. The design, construction, installation, alteration, repair and maintenance of elevators in private residences shall conform to Section 5.3 of ASME A17.1/CSA B44.

606.3.2 Hoistway Enclosures. Hoistway enclosures shall comply with Section 5.3.1.1 of ASME A17.1/CSA B44.

606.3.3 Hoistway Opening Protection. Hoistway landing doors for private residence elevators shall comply with Sections 5.3.1.8.1 through 5.3.1.8.3 of ASME A17.1/CSA B44 or Sections 10.1.4.1 through 10.1.4.3 of ASME A17.3.

Add new standard(s) as follows:

ASME

American Society of Mechanical Engineers
Two Park Avenue
New York NY 10016-5990

A17.3-2020: Safety Code for Existing Elevators and Escalators

Staff Analysis: A review of the standard proposed for inclusion in the code, ASME A17.3-2020: Safety Code for Existing Elevators and Escalators with regard to some of the key ICC criteria for referenced standards (Section 3.6 of CP#28) will be posted on the ICC website on or before March 20, 2021.

Reason Statement: Excessive clearances between the car door and the hoistway door on private residence elevators presents a serious hazard to young children and slight built adolescents or adults. Proper installation of the hoistway landing doors is critical to ensuring the gap between the hoistway door and the car door or gate does not exceed a 4 inch gap. The 4 inch maximum clearance is based on anthropometric data for young children. However, private residence elevators are not inspected by elevator inspectors in most jurisdictions and the few jurisdictions that do inspect them are mostly limited to the installation of new equipment. On the other hand, almost all private residence construction is inspected by construction officials.

The General Contractor typically constructs the hoistway enclosure and installs the hoistway doors on private residence elevators. Ensuring the installation of the hoistway doors so that the clearance between the hoistway door and the landing sill does not exceed the 0.75 inch requirement in ASME A17.1/CSA B44, will greatly increase the likelihood that the clearance between the hoistway and car doors will comply with the 4 inch gap. The proposed language increases awareness for the building designers, contractors and building code officials to the need to mitigate this serious hazard, while retaining the actual code requirements in ASME A17.1/CSA B44 and ASME A17.3.

Also adding a reference standard ASME A17.3 Safety Code for Existing Elevators and Escalators.

Cost Impact: The code change proposal will not increase or decrease the cost of construction. There is no additional cost because these requirements are already contained in the A17.1/B44 code referenced in Chapter 8. This is being added to alert builders to these requirements.
PM19-21
IPMC: SECTION 608 (New), 608.1 (New)

Proponents: Jonathan Roberts, representing UL LLC (jonathan.roberts@ul.com)

2021 International Property Maintenance Code

Add new text as follows:

SECTION 608 COMMERCIAL COOKING SYSTEMS.

608.1 Operations and Maintenance. Commercial cooking systems shall be operated and maintained in accordance with Section 606.3 of the International Fire Code.

Reason Statement: This proposal adds language into the IMPC to specifically require the maintenance of the components of the commercial cooking system, which includes hoods, grease-removal devices, fans, ducts and other appurtenances as necessary to help ensure that all the equipment functions properly and that the ventilation is maintained free of obstructions. The addition of this will provide consistency in the application and enforcement of this maintenance requirement.

Cost Impact: The code change proposal will not increase or decrease the cost of construction
This will be maintenance after installation that is already required to be done per the requirements found in the IFC, so it will not affect the cost of construction.
PM20-21

IPMC: [BE] 702.1, [BE] 702.2

Proponents: Wayne Jewell, Green Oak Charter Township, representing Self (wayne.jewell@greenoaktwp.com)

THIS CODE CHANGE WILL BE HEARD BY THE IBC MEANS OF EGRESS COMMITTEE. SEE THE TENTATIVE HEARING ORDER FOR THIS COMMITTEE.

2021 International Property Maintenance Code

Revise as follows:

[BE] 702.1 General. A safe, continuous and unobstructed path of travel shall be provided from any point in a building or structure to the public way. Means of egress shall comply with the code under which the building was constructed. International Fire Code.

[BE] 702.2 Aisles. The required width of aisles in accordance with the code under which the building was constructed. International Fire Code shall be unobstructed.

Reason Statement: The proposed changes are a better correlation of the language to that of Section 805, exception 2 of the IEBC. Otherwise it is possible that the existing Means of Egress including aisles could be in good condition and safe. Yet not be in compliance with the Chapter 10 provisions of a current IFC as it is duplicated from the IBC. As the language is currently written is is possible that the well maintained means of egress or even just aisles would be required to be altered/modified to comply with current IFC/IBC egress code regulations. Which has seen several changes over the years. It also seems contrary to the intent of IBC Section 102.6, Section 101.4.1 of the IEBC for a legally occupied building to remain unchanged. The continuing references to other codes in those sections are to deal with unsafe or hazardous conditions, not well maintained and previously compliant to codes used to construct the building.

Cost Impact: The code change proposal will not increase or decrease the cost of construction
The code change will really aid in proper enforcement and thus reduce cost of maintaining a legally occupied building.

PM20-21
Proponents: Wayne Jewell, Green Oak Charter Township, representing Self (wayne.jewell@greenoaktwp.com)

This code change will be heard by the IBC Fire Safety Committee. See the tentative hearing order for this committee.

2021 International Property Maintenance Code

Revise as follows:

[BF] 703.2 Unsafe conditions. Where any components are not maintained and do not function as intended or do not have the fire resistance required by the code under which the building was constructed or altered, such components or portions thereof shall be deemed unsafe conditions in accordance with Section 108 or 109 of this code, 114.1.1 of the International Fire Code. Components or portions thereof determined to be unsafe shall be repaired or replaced to conform to that code under which the building was constructed or altered. Where the condition of components is such that any building, structure or portion thereof presents an imminent danger to the occupants of the building, structure or portion thereof, the code official shall act in accordance with Section 104 and 106 of this code, 114.2 of the International Fire Code.

Reason Statement: The proposed language reflects corrects what appears as a limitation to the Property Maintenance Code Official. As they don't work under the provisions of the Fire Code. Section 103.1 identifies who is the Code Official is the person appointed as the executive person in charge of the department of property maintenance inspection. While that position could also be a fire code official that is a rare occurrence and the proposed language would not inhibit them from carrying out their appointed duties. IPMC Section 104.1 states that the Code Official shall enforce the provisions of the code - the existing language is contrary to that charge.

IPMC Sections 104.5 &106.2 state the Code Official shall issue all notices and orders; and the format and process of serving such notices or orders.

IPMC Sections 108 and 109 provided a better basis to define, determine and establish that a condition is unsafe or emergency condition. Provisions IFC Section 114.1.1 "as shall be deemed necessary in accordance with this section" don't provide any direction to use as a basis by which an evaluation can be made. It basically, leaves it as subjective.

Not all unsafe conditions are a clear and imminent threat to human life, safety or health; which how the provisions of IFC Section 114.1.1 begin to describe conditions. It also directs that the building be referred to the building department. Departments of Property Maintenance Inspection work very closely with building and fire departments; and this doesn't change that working relationship.

Cost Impact: The code change proposal will not increase or decrease the cost of construction.

These changes to the person designated to enforce will not raise the cost of construction or property maintenance.
PM22-21
IPMC: [F] 704.1.3

Proponents: William Koffel, representing Air Movement and Control Association (wkoffel@koffel.com)

THIS CODE CHANGE WILL BE HEARD BY THE FIRE CODE COMMITTEE. SEE THE TENTATIVE HEARING ORDER FOR THIS COMMITTEE.

2021 International Property Maintenance Code

Revise as follows:

[F] 704.1.3 Fire protection systems. Fire protection systems shall be inspected, maintained and tested in accordance with the following International Fire Code requirements.

1. Automatic sprinkler systems, see Section 903.5.
2. Automatic fire-extinguishing systems protecting commercial cooking systems, see Section 904.13.5.
3. Automatic water mist extinguishing systems, see Section 904.11.
4. Carbon dioxide extinguishing systems, see Section 904.8.
5. Carbon monoxide alarms and carbon monoxide detection systems, see Section 915.6.
6. Clean-agent extinguishing systems, see Section 904.10.
7. Dry-chemical extinguishing systems, see Section 904.6.
8. Fire alarm and fire detection systems, see Section 907.8.
9. Fire department connections, see Sections 912.4 and 912.7.
10. Fire pumps, see Section 913.5.
11. Foam extinguishing systems, see Section 904.7.
12. Halon extinguishing systems, see Section 904.9.
13. Single- and multiple-station smoke alarms, see Section 907.10.
14. Smoke and heat vents and mechanical smoke removal systems, see Section 910.5.
15. Smoke control systems, see Section 909.22.
16. Wet-chemical extinguishing systems, see Section 904.5.
17. Duct and air transfer openings, see Section 706.

Reason Statement: Fire dampers, smoke dampers, and combination fire-smoke dampers are other fire protection features detailed in the International Fire Code which should be listed in this section.

Cost Impact: The code change proposal will not increase or decrease the cost of construction
This proposal does not increase cost since it is an editorial change which simply refers to existing damper requirements as outlined in the referenced code section of the International Fire Code. This proposal does not make technical changes.