

EB36-25

IEBC: SECTION 310 (New), 310.1 (New), CHAPTER 10, SECTION 1009, 1009.1

Proponents: Julius Carreon, City of Bellevue, representing Washington Association of Building Officials Technical Code Development Committee (jcarreon@bellevuewa.gov); Micah Chappell, Seattle Dept. of Construction and Inspections (SDCI), representing Washington Association of Building Officials Technical Code Development Committee (WABO TCD) (micah.chappell@seattle.gov); Sean Angeley, City of Bellingham, representing Washington Associated of Building Officials, Technical Code Development Committee (smangeley@cob.org)

2024 International Existing Building Code

Add new text as follows:

SECTION 310 **PLUMBING**

310.1 Minimum Fixtures. Where an *alteration* results in increased occupant load of the story by more than 20 percent, plumbing fixtures for the story shall be provided in quantities specified in the International Plumbing Code based on the increased occupant load.

CHAPTER 10 **CHANGE OF OCCUPANCY**

SECTION 1009 **PLUMBING**

Revise as follows:

1009.1 Increased demand. Where the occupancy of an *existing building* or part of an *existing building* is changed such that the new occupancy is subject to increased or different plumbing fixture requirements or to increased water supply requirements in accordance with the *International Plumbing Code*, the new occupancy shall comply with the intent of the respective *International Plumbing Code* provisions.

~~**Exception:** Only where the occupant load of the story is increased by more than 20 percent, plumbing fixtures for the story shall be provided in quantities specified in the International Plumbing Code based on the increased occupant load.~~

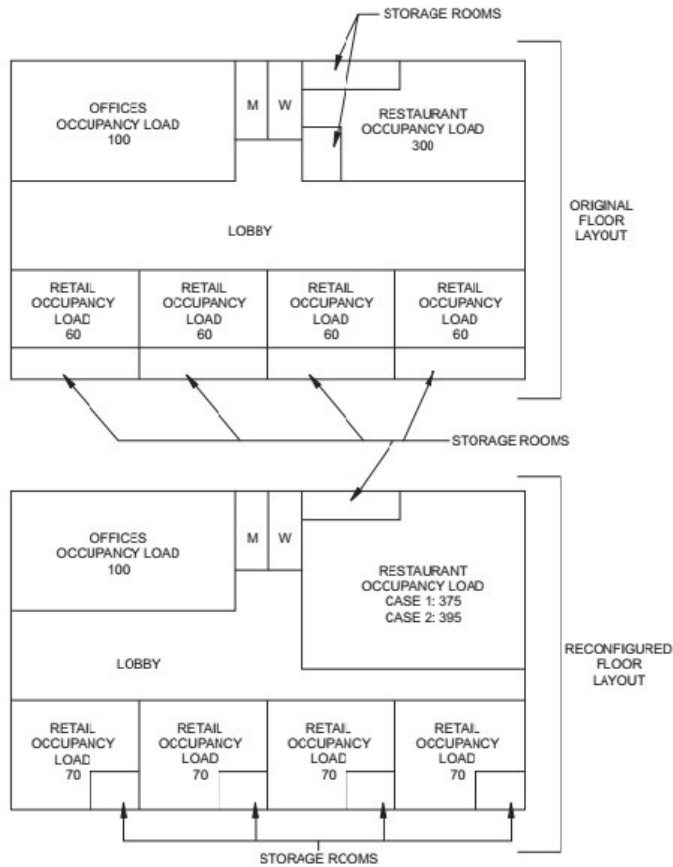
Reason: This code change is to undo the inadvertently substantive change when the plumbing requirements in the alterations section of the code (Section 809 in the 2018 IEBC and prior) were moved to the exception for plumbing fixtures in the change of occupancy section during the 2021 code cycle (See EB92-19): <https://www.cdpassess.com/proposal/5439/8306/preview/>.

This provision allows existing plumbing fixtures to remain unchanged as long as renovations result in an occupant load increase of no more than 20% of the current load. During the 2021 code change cycle, proponents of EB92-19 argued that a 20% occupant load increase qualifies as a change of occupancy. They suggested relocating this provision from the Level 2 Alteration section to the Change of Occupancy chapter as an exception.

While we acknowledge that a significant occupant load increase could qualify as a change of occupancy, even within the same group classification (e.g., converting a restaurant to a bar/nightclub within Group A-2), we interpret the 20% allowance differently. We believe it should only apply to reconfigurations where the building's use or occupancy does not change, aligning with the definition of an alteration (See Figure 809.1 as an example). This interpretation reflects that plumbing fixture requirements depend not only on occupant load but also on the building's use or occupancy type (see IBC Table 2902.1). For instance, in a change of occupancy scenario, converting a mercantile space (occupancy load factor = 60 sf/person) to a business use (occupancy load factor = 150 sf/person) could decrease the

occupant load of the space but necessitate different plumbing fixture requirements. Applying the 20% exception in this scenario seems inappropriate because it could result in significantly insufficient plumbing fixtures for the new business use. Hence, this proposal is intended to correct this by removing the exception in Section 1009.1 and relocating it back to the alteration section.

In place of relocating the 20% plumbing allowance back to the alteration level 2 work area section, we believe it should be permitted for any compliance method. Hence, we are proposing to relocate the provision as a new section in Chapter 3.



(Alteration example from 2018 IEBC Commentary Figure 809.1)

Cost Impact: The change proposal is editorial in nature or a clarification and has no cost impact on the cost of construction

Justification for no cost impact:

This code proposal is a clarification (or correction) that could decrease construction costs for alteration projects but may increase costs for change-of-occupancy projects.

EB36-25

RB35-25

IRC: SECTION 202 (New), SECTION 317 (New), 317.1 (New), 317.2 (New), R318.1, R321.1.1

Proponents: Steve Thomas, Shums Coda Associates, representing Colorado Chapter Code Development Committee
(sthomas@coloradocode.net)

2024 International Residential Code

Add new definition as follows:

OCCUPIABLE ROOFS. An exterior space on a roof that is designed for human occupancy, other than maintenance or repair.

Add new text as follows:

SECTION R317 **OCCUPIABLE ROOFS**

R317.1 Occupiable Roofs. Occupiable roofs shall comply with this section. The occupiable roof shall not be included in the number of stories as regulated in Section R101.2.

R317.2 Enclosures . Elements or structures enclosing the occupiable roof areas shall not extend more than 48 inches (1220 mm) above the surface of the occupiable roof.

Exceptions:

1. Stair and mechanical enclosures not exceeding 50 square feet (4.65 m²) in roof area.
2. Elements or structures enclosing occupiable roof areas located on the same level as a story.

SECTION R318 **MEANS OF EGRESS**

Revise as follows:

R318.1 Means of egress. *Dwelling units* shall be provided with a means of egress in accordance with this section. The means of egress shall provide a continuous and unobstructed path of vertical and horizontal egress travel from all portions of the *dwelling unit, including occupiable roofs*, to the required egress door without requiring travel through a garage. The required egress door shall open directly into a *public way* or to a *yard or court* that opens to a *public way*.

SECTION R321 **GUARDS AND WINDOW FALL PROTECTION**

R321.1.1 Where required. *Guards* shall be provided for those portions of open-sided walking surfaces, including floors, *stairs, ramps* and landings that are located more than 30 inches (762 mm) measured vertically to the floor or *grade* below at any point within 36 inches (914 mm) horizontally to the edge of the open side and at the perimeter of occupiable roofs. Insect screening shall not be considered as a *guard*.

Exception: Portions of an occupiable roof located less than 30 inches (762 mm) measured vertically to adjacent unoccupiable roof areas where approved guards are present at the perimeter of the roof.

Reason: The IRC is silent on how to apply the code to occupiable roofs. These occupiable spaces are becoming more popular and we

need something in the code to address the issue. The proposed language is modeled after the IBC language regarding occupiable roofs. We believe that it is important to have some level of regulations when someone wants to use the roof for an occupiable space. This proposal will provide equivalent requirements to those included in the IBC.

Cost Impact: The change proposal is editorial in nature or a clarification and has no cost impact on the cost of construction

Justification for no cost impact:

We believe that most building departments are already requiring occupiable roofs to comply with these proposed requirements. The intent is to provide clarifying language to give the code official language to use for things that are already being done.

RB35-25

G32-25 Part I

IBC: SECTION 202; IFC: SECTION 202

Proponents: David Renn, PE, SE, City and County of Denver, representing Code Change Committee of ICC Colorado Chapter (david.renn@denvergov.org)

THIS IS A 2 PART CODE CHANGE.

PART I WILL BE HEARD BY THE ADMINISTRATIVE CODE COMMITTEE.

PART II WILL BE HEARD BY THE RESIDENTIAL BUILDING CODE COMMITTEE.

SEE THE TENTATIVE HEARING ORDER FOR THESE COMMITTEES.

2024 International Building Code

Revise as follows:

[A] TOWNHOUSE UNIT. A single-family *dwelling* unit in a *townhouse* that extends from the foundation to the roof and has a *yard, court* or *public way* on not fewer than two sides.

2024 International Fire Code

Revise as follows:

[A] TOWNHOUSE UNIT. A single-family *dwelling* unit in a *townhouse* that extends from the foundation to the roof and has a *yard, court* or *public way* on not fewer than two sides.

G32-25 Part I

G32-25 Part II

IRC: SECTION 202

Proponents: David Renn, PE, SE, City and County of Denver, representing Code Change Committee of ICC Colorado Chapter (david.renn@denvergov.org)

2024 International Residential Code

Revise as follows:

[RB] TOWNHOUSE UNIT. A single-family *dwelling unit* in a *townhouse* that extends from foundation to roof and that has a *yard, court* or *public way* on not less than two sides.

Reason: The current definition of townhouse unit requires that the unit have a yard or public way on two sides, and the definition of yard requires the yard to be an open space other than a court. By definition, a court is a space bounded on three or more sides by walls or buildings. Based on these definitions, townhouses that are staggered front to back create courts which are not allowed. Given that IRC Section R302.1 requires a lot line or an imaginary line between townhouse units to measure fire separation distance to, exterior walls of the units adjacent to a court will be protected based on distance to these lines, preventing fire spread from one unit to another. Therefore, there is no hazard addressed by prohibiting a court to count as an open side for a townhouse. Note that the imaginary line requirement was added in the 2024 IRC and without this there may have been a hazard in previous codes if there was no lot line and the exterior walls were not protected to prevent spread of fire from one unit to another. See figure below showing the staggered townhouse configuration with a court.

Note that if a townhouse unit has an emergency escape and rescue opening (EERO) on the court side of the unit, IRC Section R319.1 requires the court (or yard) to open to a public way, which will typically prohibit an enclosed court (i.e., all sides having a wall or building). However, if a condition exists where there are no EERO openings into the court, and exterior walls are protected based on lot lines or imaginary lines, an enclosed court would be allowed just as an enclosed yard is currently allowed.

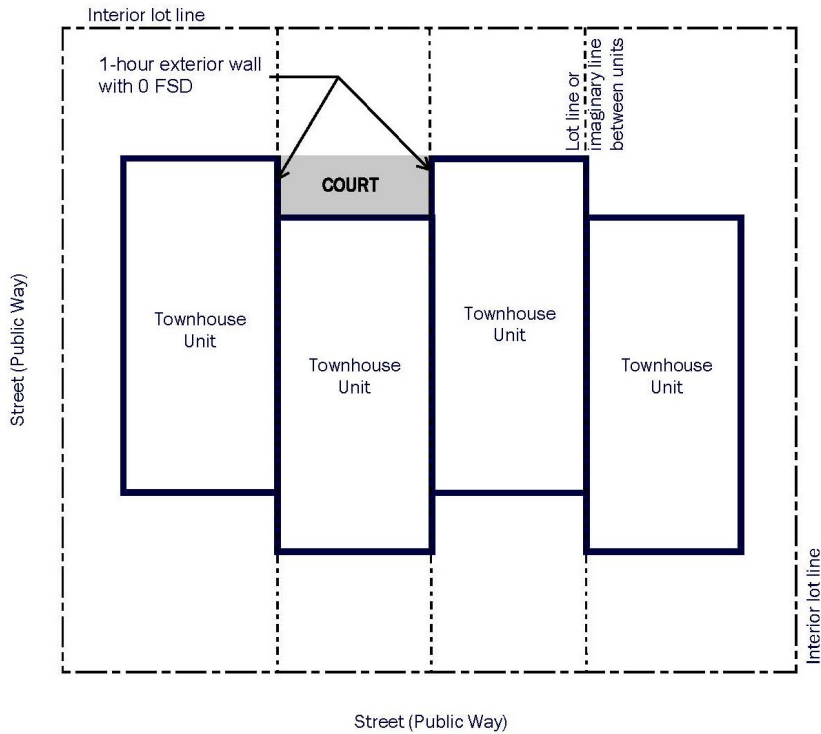
The definitions of court and yard are included in this proposal for reference - there are no proposed changes to these definitions.

This proposal revises the definition of townhouse unit to include a court as one of the required open sides. As described above, this condition presents no hazard due to new requirements for lot lines or imaginary lines between units.

The following definitions are located here for reference:

[BG] COURT. An open, uncovered space, unobstructed to the sky, bounded on three or more sides by exterior *building* walls or other enclosing devices.

[BG] YARD. An open space, other than a *court*, unobstructed from the ground to the sky, except where specifically provided by this code, on the *lot* on which a *building* is situated.



Cost Impact: The change proposal is editorial in nature or a clarification and has no cost impact on the cost of construction

Justification for no cost impact:

This proposal simply adds an option for an open side of a townhouse unit to be a court. This adds a design option not previously allowed but is not expected to change the cost of construction since either townhouse separation walls or fire-resistance rated exterior walls are currently required for adjacent townhouse units.

G32-25 Part II

RB39-25

IRC: SECTION 202

Proponents: Jeffrey Shapiro, International Code Consultants, representing National Fire Sprinkler Association
(jeff.shapiro@intlcodeconsultants.com)

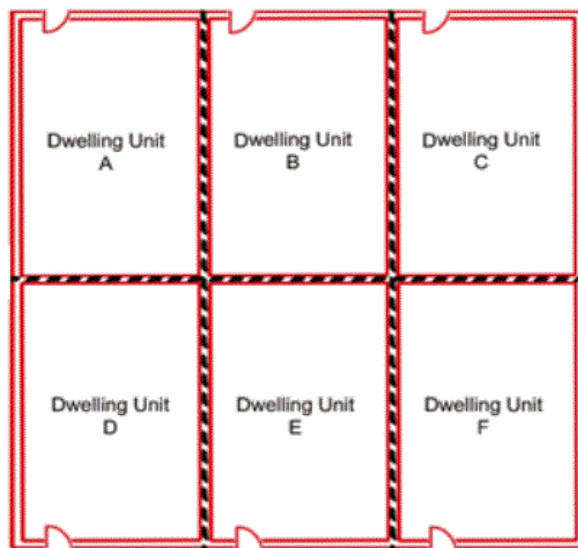
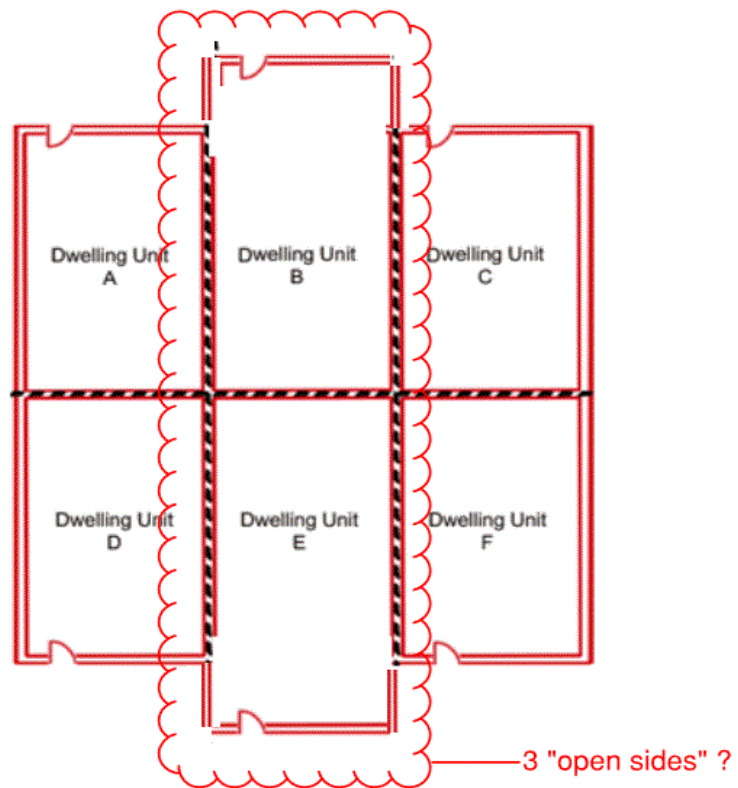
2024 International Residential Code

Revise as follows:

[RB] TOWNHOUSE UNIT. A single-family *dwelling unit* in a *townhouse* that extends from foundation to roof and that has a *yard* or *public way* on not less than two sides or on not less than one side where an automatic sprinkler system in accordance with Section P2904 is provided throughout the *townhouse*.

Reason: For the past few code cycles, we have had a lot of discussion regarding what constitutes an "open side." Creative architects can easily manipulate layouts to take advantage of the fact that there is no definition or guidance on what is or isn't an open side with respect to the minimum wall length or percentage of open perimeter that must be provided. In previous code hearings, we discussed how an open side might be as little as a 3-foot wide pathway to a rear exit door. Looking at the attached figure, simply by moving the exterior wall out a bit on the center units, do you go from one side open to three. Some would argue "no" but there's nothing in the code to definitively back that opinion or interpretation.

From the perspective of what does the open side buy with respect to safety if the building is sprinklered and otherwise satisfies the requirements for means of escape and exit openings using only one open side, the answer is not much in my opinion. The back sides of townhouse lots are often difficult, if not impossible, to ladder with ground ladders given fences, plants/trees, and poor access from the street side. Given the relatively little value of requiring the second open side, no guidance on what constitutes "open," and the possible value to townhouse developers to have this design option as a sprinkler incentive in jurisdictions where sprinklers might not otherwise be required because of local amendments, the approach recommended herein puts an end to a lot of misery in applying the code and provides an acceptable level of safety.



Cost Impact: Decrease

Estimated Immediate Cost Impact:

\$0

Depending on the design, a few windows or doors might be eliminated, but this would be entirely optional. Nevertheless, the option being added certainly will be cost neutral or better.

Estimated Immediate Cost Impact Justification (methodology and variables):

You cannot assign a dollar value to an option that may or may not be used in design. Mostly, this provides a design advantage, as opposed to a cost savings.

RB39-25

Proponents: Jeffrey Shapiro, P.E., FSFPE, LTFR, representing Lake Travis Fire Rescue (jeff.shapiro@intlcodeconsultants.com)

2024 International Residential Code

Revise as follows:

R101.2 Scope. The provisions of this code shall apply to the construction, *alteration*, movement, enlargement, replacement, *repair*, equipment, use and occupancy, location, removal and demolition of detached one- and two-family *dwelling*s and *townhouse*s not more than three *stories above grade plane* in height with a separate means of egress and their *accessory structure*s not more than three *stories above grade plane* in height.

Exception: Where provided with an automatic sprinkler system complying with Section P2904, detached one- and two-family dwellings and townhouses not more than three *stories above grade plane* in height with a separate means of egress and their *accessory structure*s not more than three *stories above grade plane* in height shall be permitted to be constructed or repurposed in accordance with this code to accommodate any of the following additional uses: ~~The following shall be permitted to be constructed in accordance with this code where provided with an automatic sprinkler system complying with Section P2904:~~

1. Live/work units located in *townhouse*s and complying with the requirements of Section 508.5 of the *International Building Code*.
2. *Owner-occupied lodging houses* with five or fewer *guestrooms*.
3. A care facility with five or fewer *persons* receiving custodial care within a *dwelling unit*.
4. A care facility with five or fewer persons receiving medical care within a *dwelling unit*.
5. A day care facility for five or fewer *persons* of any age receiving care within a *dwelling unit*.

Reason: There has been an increased level of discussion lately regarding the permissible use of one- and two-family dwellings and townhouses to accommodate purposes where varying levels of care are provided. While the model codes (ICC and NFPA) are 100-percent clear that newly constructed residential occupancies require fire sprinklers, dwellings that are being repurposed fall into a gray area of following the IEBC, with no clear path to the IRC. The IEBC currently provides an exception to the scope in Section 101.2, which states: "Exception: Detached one- and two-family dwellings and townhouses not more than three stories above grade plane in height with a separate means of egress, and their accessory structures not more than three stories above grade plane in height, shall comply with this code or the International Residential Code."

The reference to "one- and two-family dwellings and townhouses" doesn't mention the additional listed uses in the IRC scope exception, and these additional uses are only deferred by the IBC to the IRC for "construction," as stated in the text of the exception, implying new. Nevertheless, repurposing a dwelling for the listed uses, should seemingly be permissible under the IRC if all of the applicable requirements are met. This is not intended to resolve the current issue associated with claims of discrimination against occupants who may not be related and may be receiving care. It simply opens an option for some repurposed buildings to be regulated by the IRC rather than the IEBC or IBC. It also clarifies that you cannot repurpose a building to these uses without providing sprinkler protection, just as the IBC doesn't defer new construction unless sprinklers are provided.

Although I serve as a consultant to the National Fire Sprinkler Association, this proposal has not been reviewed or endorsed by NFSA, and I am not representing NFSA on this issue.

Cost Impact: The change proposal is editorial in nature or a clarification and has no cost impact on the cost of construction

Justification for no cost impact:

The IRC and IBC already require residential uses to be sprinklered. This proposal simply clarifies that "construction" under the current IRC exception could also include repurposing of an existing dwelling to the listed uses.