

# Public Review

## Vancouver Building By-law (VBBL)

### Proposed change to modify 3.2.5.12.(12)

**Topic:** Clarification of Permitted Cladding Types for Omission of Sprinkler Protection of Balconies

**Code change number:** 24-0029

**Code reference:** Div. B, 3.2.5.12.(12)

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## Description of the proposed change

The provisions of Sentence 3.2.5.12.(12) are intended to limit the potential for vertical flamespread up the side of a building, and provide minimum measures to reduce the risk for fire entry into a building from a deck, patio, balcony, or similar adjoining building construction. The proposed change will clarify the application for sprinklers and the minimum expected level of performance of building cladding systems where sprinkler protection is being omitted.

## Justification

The conditions of Sentence 3.2.5.12.(12) to avoid sprinklers require the adjoining deck, patio, or balcony construction to be noncombustible (meeting Subsection 3.1.5.) and clad with a noncombustible material (meeting CAN/ULC-S114) which severely limits the type of construction that would qualify. Wall assemblies tested to CAN/ULC-S134, and passing the criteria in Clause 3.1.5.5.(1)(b) have been tested under for use on high building, as a means to limit vertical flamespread. Notably, this test was not meant to test for flame reentry into a building, however it is an onerous test and is likely to be sufficient for the purposes of assessing the likely contribution of an exterior cladding to a developing fire.

The proposed change better aligns the BCBC and VBBL and provide more options that can be better aesthetically aligned with other cladding choices for the remainder of the exterior building face, while maintaining a high level of fire resistance.

## Proposed VBBL content

### Legend

Black Text – 2019 Vancouver Building By-law content

Red Text – Proposed modification to Vancouver Building By-law content

### **3.2.5.12. Automatic Sprinkler Systems**

[...]

**12)** Automatic sprinkler protection for an unenclosed exterior balcony of a residential *building* may be omitted if

a) the *building* is of *noncombustible construction*, and

b) the exterior wall assembly adjoining the balcony and the exterior ceiling assembly covering the balcony are constructed with *noncombustible* materials or assemblies satisfying the criteria of Clause 3.1.5.5.(1)(b).

[...]