

503.1.4

Occupied Roof Allowances

CHANGE TYPE: Clarification

CHANGE SUMMARY: The proper approach to dealing with occupied roofs from the perspectives of building height, number of stories and installation of occupant notification features has been further clarified for a more consistent application of the code's intent.

2021 CODE TEXT: 503.1.4 Occupied roofs. A roof level or portion thereof shall be permitted to be used as an occupied roof provided the occupancy of the roof is an occupancy that is permitted by Table 504.4 for the story immediately below the roof. The area of the occupied roofs shall not be included in the building area as regulated by Section 506. An occupied roof shall not be included in the building height or number of stories as regulated by Section 504, provided the penthouses and other enclosed roof structures comply with Section 1511.

Exceptions:

1. The occupancy located on an occupied roof shall not be limited to the occupancies allowed on the story immediately below the roof where the building is equipped throughout with an automatic sprinkler system in accordance with Section 903.3.1.1 or 903.3.1.2 and occupant notification in accordance with ~~Section 907.5~~ Sections 907.5.2.1 and 907.5.2.3 is provided in the area of the occupied roof. Emergency voice/alarm communication system notification per Section 907.5.2.2 shall also be provided in the area of the occupied roof where such system is required elsewhere in the building.
2. *(no change to this exception)*



Photo courtesy of vgaic

Hotel rooftop cafe.

CHANGE SIGNIFICANCE: The allowable building height in stories as limited by Table 504.4 is based on a combination of factors. A primary consideration is the building's type of construction, consistent with the application of Table 504.3 for allowable building height in feet. However, a significant difference between the two tables is the impact of the building's use on its maximum allowable height. The limits on stories above grade plane set forth in Table 504.4 vary widely based on the building's occupancy classification(s). New criteria were added to the 2018 IBC in order to establish the appropriate methodology for the determination of the allowable number of stories where one or more occupancies are located on the roof of the building. The proper approach to dealing with occupied roofs from an allowable height and an allowable number of stories perspective have been further clarified for a more consistent application of the code's intent.

The provisions now specifically state that in the determination of a building's allowable height and number of stories, an occupied roof is not to be considered as an additional story. In addition, it has also been clarified that compliance with Section 1511 for penthouses and other enclosed roof structures is necessary. The base requirement for allowing a roof level to be occupied remains unchanged, as the occupancy of the roof is limited to only those occupancies permitted by Table 504.4 to be located on the story directly below the roof. Only where the conditions of Exception 1 are met is an occupancy not in compliance with the base requirement allowed to be located on the roof.

An additional clarification addresses the conditions of Exception 1 recognizing there is no story limitation to be applied on rooftop occupancies where specified fire protection features are provided. In the application of the exception, the building must be provided with an automatic sprinkler system. In addition, occupant notification shall be extended to the occupiable area of the roof where a fire alarm system is required. The new provisions specifically reference Sections 907.5.2.1, 907.5.2.2 and 905.5.2.3 addressing audible alarms, emergency voice/alarm communication systems and visual alarms, respectively. However, due to the absence of scoping language mandating a fire alarm system be installed, occupant notification at the roof level is only applicable where an alarm system is already required elsewhere in the building.



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