



Building Standards and Codes

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TECHNICAL BULLETIN

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Source Document: 19 NYCRR Part 1221 – BUILDING CONSTRUCTION
19 NYCRR Part 1222 – PLUMBING SYSTEMS²
Topic: Minimum Required Toilet Facilities Based on Occupancy

This document provides clarification on the minimum number of required toilet facilities based on Use/Occupancy Classification and Occupant load.

The provisions for the required number of toilet fixtures are found in Table 2902.1 of the 2015 International Building Code (2015 IBC) and in Table 403.1 of the 2015 International Plumbing Code (2015 IPC), both of which are titled '*Minimum Number of Required Plumbing Fixtures*'.

Both Section 2902.2 of the 2015 IBC and Section 403.2 of the 2015 IPC, state that: '*Where plumbing fixtures are required, separate facilities shall be provided for each sex.*' Except as follows:

1. In dwelling units or sleeping units.
2. In structures and tenant spaces with a total occupant load of 15 or fewer.
3. In mercantile occupancies with a maximum occupant load of 100 or less.

Section 2902.1.2 of the 2015 IBC establishes that '*family or assisted-use toilet facilities... are permitted to be included in the number of required fixtures...*'. Section 2902.2.1 further provides that when two such facilities are provided they shall be permitted to serve as the required separate facilities and they '*shall not be required to be identified for exclusive use by either sex*'. However, the requirement for separate facilities for each sex cannot be met by providing only one single *family, or assisted use toilet facility*, unless an exception in Section 2902.2 is applicable. Similar language is provided in Sections 403.1.2 and 403.2.1 of the 2015 IPC.

Further, Section 403.1.1 of the 2015 IPC requires that the occupant load of each sex be determined by dividing the total occupant load in half, and that fractional numbers be rounded up to the next whole number.

Where either one or two toilet facilities are provided, each must be accessible for persons with disabilities in accordance with Section 1109.2. of the 2015 IBC (with exceptions). Per Section 1109.2.2, where facilities with multiple compartments are provided, '*at least 5 percent of the total number of compartments shall be wheelchair accessible*' AND where the combined total water closet compartments and urinals provided in a toilet room is six or more, '*at least 5 percent... shall be ambulatory accessible... in addition to the wheelchair accessible compartment.*'

Below are a few examples of how to calculate the minimum required toilet facilities based on occupancy:

Example 1 (B Occupancy):

Minimum fixture tables require that at least 1 water closet be provided for each 25 occupants '*for the first 50 and 1 per 50 for the remainder exceeding 50*' in a Business occupancy. Therefore, using the exception to Section 2902.2, a minimum

¹ The "Code Effective Date" for this Technical Bulletin is October 31, 2017, which is the effective date of the current version of the New York State Uniform Fire Prevention and Building Code (the Uniform Code).

² The 2015 International Building Code (2015 IBC) is a publication incorporated by reference in 19 NYCRR Part 1221 and the 2015 International Plumbing Code (2015 IPC) is a publication incorporated by reference in 19 NYCRR Part 1222. The 2017 Uniform Code Supplement is a publication incorporated by reference in 19 NYCRR Parts 1219 through 1228. The 2015 IBC and IPC, as amended by the 2017 Uniform Code Supplement are all part of the Uniform Code.

of one toilet facility is required if the total number of employees and customers is 15 or less. And, a minimum of two toilet facilities are required, one for each sex, in spaces with a total occupant load of more than 15 and less than 50. Two unlabeled family or assisted-use facilities would also suffice per Section 2909.2.1. In a Business occupancy with an occupant load greater than 50, two additional toilet fixtures (one for each sex) are required for each 50 additional occupants or portion thereof.

Assume an occupant load of 51, which divided in half equals 25.5 for each sex. The load is rounded up to 26, and since one fixture is required for each 25 occupants, this means two fixtures for each sex, or four fixtures total are required.

Example 2 (F and S Occupancy):

Similar to Example 1, one single toilet facility is required in a Factory or Storage use with an occupant load of 15 or less. Two toilet facilities as noted in the example above are required with an occupant load between 16 and 100. Two additional toilet fixtures are required for each additional 100 occupants or portion thereof.

Example 3 (A-4 and A-5 Occupancy):

In a coliseum or stadium with an occupant load of 3,000, which equals 1,500 male and 1,500 female occupants, 20 toilet fixtures are required for men ($1,500/75$) and 38 fixtures are required for women ($1,500/40$).

If the occupant load were increased to 3,001, it equals 1500.5, rounded up to 1501 of each sex. Therefore, 21 toilet fixtures are required in the men's bathroom ($1,500 / 75 + 1$ per additional 120 or fraction). The required number of fixtures in the women's bathroom remains at 38 unless the occupant load increases to 3,160 ($3,160 / 2 = 1580$, then $1,520 / 40 + 1$ per additional 60 or fraction = 39).

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