

**NC Department of Insurance
Office of the State Fire Marshal - Engineering Division
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Mixed Occupancy Energy Requirements

Code: 2002 Energy Code
Section: 101.4.3

Date: October 6, 2005

Question:

When designing a mixed occupancy building, how would I apply the provisions of the Energy Code?

Answer:

When a building houses more than one occupancy, each portion of the building shall conform to the requirements for the occupancy housed therein. Where minor accessory uses do not occupy more than 10 per cent of the area of any floor of a building, the major use shall be considered the building occupancy. Buildings, other than detached one- and two-family dwellings and townhouses, with a height of four or more stories above grade shall be considered commercial buildings regardless of the number of floors that are classified as residential occupancy.

A mixed-occupancy building is one that contains both residential and commercial uses. When residential and commercial uses coexist in a building, each story must be evaluated separately. For example, consider this proposed three story building. The first floor contains a combination of retail space and apartments with the retail space dominating the first floor area. The second and third floors contain exclusively apartments. For the first floor, if the retail space is less than 90 per cent of the floor area for that floor, then the retail space must satisfy the commercial energy code provisions and the apartments on the first floor must satisfy the residential energy code provisions. However, if the retail space is greater than or equal to 90 per cent of the floor area for that floor, then the retail space and the apartments for that floor must satisfy the commercial energy code requirements. The top two stories are clearly residential and must satisfy the residential energy requirements because those stories are devoted solely to residential use and the building is not over three stories high.

If the building had been four stories, three stories as described above with the addition of a fourth story for more apartments, the entire building would be considered commercial by definition and subject to the commercial provisions of the energy code.