



CITY OF CHICAGO

DEPARTMENT OF BUILDINGS

Code Memorandum

To: Department of Buildings Plan Reviewers, Project Managers, Project Administrators and Inspectors

From: Judith Frydland
Commissioner

Date: December 12, 2016

RE: Use of a Door Undercut for Make-up Air Transfer to Dwelling Unit in Compliance with Section 18-28-401.4 (2)

Code Section 13-64-020(b) requires that the corridor walls that separate residential dwelling units from the public corridor shall be protected with walls and ceilings that have a 1 hour fire rating.

Entry doors to the dwelling units located in the residential corridor walls shall be a minimum 20 minute fire rated doors and frames or an equivalent 1-3/4 inches thick solid core wood door with a solid rabbeted frame. The doors must meet the requirements of NFPA-80 (Standard for Fire Doors and other Opening Protectives). The NFPA-80 Standard requires that the undercut of the door be less than $\frac{3}{4}$ of an inch in order to maintain the door's fire rating.

The Department of Buildings and the Chicago Fire Department will allow the door undercut or clearances to be used to allow small amounts of makeup air to enter the dwelling unit from the public corridor due to a small pressure differential across the corridor doors.

Code sections 15-8-240(a)(5) and 13-196-170 require for new or existing residential buildings that exceed 4 stories, that all residential unit entry doors opening upon public corridors be equipped with an approved self-closing device. This is done to contain the smoke from a dwelling unit fire within that unit. The installation of transfer air grills through the corridor wall, even when provided with a fire damper, will defeat the purpose of the self-closing device on the unit entry door and therefore, transfer air grilles located in corridor walls are not allowed.

When the exhaust capacity from the dwelling unit exceeds the amount of air that can be supplied by the undercut of the door and door panel clearances then the required additional makeup air shall be provided through a properly engineered and fire-stopped hard duct that connects to the dwelling unit from an approved mechanical source of makeup air.

This memo is effective immediately for new construction buildings or remodeling permits where the existing corridor walls are being re-configured or re-built.