



## Unsprinklered Limited or Non-Combustible Concealed Spaces Policy (for Existing Sprinklered Buildings) Effective Date: January 1, 2023

The following are guidelines to certify what is required for Structure and Mechanical/Electrical/Plumbing (MEP) compliance as a Limited or Non-Combustible Concealed Space and therefore not requiring Fire Sprinkler Protection.

**Unless allowed under NFPA 13 section 9.2.1 as amended by SJMC Section 17.12.1015, all spaces and materials within these spaces shall comply with the testing requirements presented by 4.9.2 and/or 4.9.1.1.**

2022 NFPA 13 Annex 9.2.1.1 says we should allow the usual amount of cabling and goes on to say the threshold is not defined. We find "usual" and "not defined" too obscure, hence impossible to review and then inspect as such. Although the "industry" had assured us that any "usual" cabling is now available in fire resistant sheathing if installed exposed, we have found that almost all of the cabling presented has been tested to NFPA 262 standards and not NFPA 259 standards. and hence, NOT compliant materials for the requirements to allow the omission of sprinklers as indicated in section 2022 NFPA 13 section 4.9.2. There are few cable products available that pass the requirements of 2022 NFPA 13 section 4.9.2.

For ease of use, we have provided the following guidelines for acceptable installation of MEP products in 2022 NFPA 13 Section 9.2.1 compliant non-sprinklered concealed spaces (other measures may also be deemed acceptable):

### **Electrical**

- a. For **alternating current (AC)** wiring: wiring shall be in 2022 California Electrical Code (CEC) compliant metal conduit or be MC cabling.
- b. For single **direct current (DC)** and **Data** wiring: wiring shall be in 2022 CEC compliant for plenums and run as single cables at a min. of 12" apart.
- c. For bulk **direct current (DC)** and **Data** wiring (multiple cables grouped together). When run in bulk, the wiring shall be neatly bundled, banded with wire ties and properly attached to the structure. The following conditions are acceptable in concealed spaces with wiring being bulked together:
  1. Provide localized sprinkler protection per 2022 NFPA 13 Section 9.3.17.1.2 (See herein).

2. Provide metal conduit/metal jacket (MC cabling) throughout.
3. Provide limited combustibile wiring per 2022 NFPA 13 Section 4.9.2.  
**Note: The majority of plenum-rated low voltage cable does NOT meet this requirement. Approved material must be tested in accordance with NFPA 259 and either ASTM E84 or ANSI/UL 723.**
4. Fill entire concealed space with insulation with 2” gap at the top for ventilation.
5. If not per c.1 – 4. above, it may be acceptable to separate wires into bundles of 1” max. diameter, spaced at a min. of 12” apart.

### **Mechanical**

- a. Control wiring: Control wiring will not need protection since the wiring is not bulked together.
- b. Duct work: Class A rated ductwork (Flame-Spread Classification, Flame-Spread Rating or Index Class 1 (or A) 0-25) will not need protection. All insulation and lining shall have a flame spread rating of not more than 25 and a smoke develop rating of no higher than 50 when tested in accordance to ASTM C411, or as required by local codes.
- c. Mechanical units: **Fan coils will not be an issue since the units have a metal exterior.**

### **Plumbing**

- a. **CPVC and steel piping will not need protection**