

be required where the grounded conductor is used to ground equipment as permitted in 250.142.

378.70 Extensions from Nonmetallic Wireways. Extensions from nonmetallic wireway shall be made with cord pendants or any wiring method of Chapter 3. A separate equipment grounding conductor shall be installed in, or an equipment grounding connection shall be made to, any of the wiring methods used for the extension.

Part III. Construction Specifications

378.120 Marking. Nonmetallic wireways shall be marked so that the manufacturer's name or trademark and interior cross-sectional area in square inches shall be visible after installation. Marking for limited smoke shall be permitted on the nonmetallic wireways that have limited smoke-producing characteristics.

ARTICLE

380

Multioutlet Assembly

Part I. General

Δ **380.1 Scope.** This article covers the use and installation requirements for multioutlet assemblies.

Informational Note: See [Article 100](#) for the definition of *multioutlet assembly*.

Multioutlet assemblies are metal or nonmetallic raceways that are usually surface mounted and designed to contain branch-circuit conductors and receptacles. Exhibit 380.1 provides an illustration of a multioutlet assembly. Multioutlet assemblies can be assembled at the factory or in the field with the receptacles spaced at desired intervals.

See also

[220.14\(H\)](#) and [Exhibit 220.2](#) for load calculations

Part II. Installation

380.10 Uses Permitted. The use of a multioutlet assembly shall be permitted in dry locations.

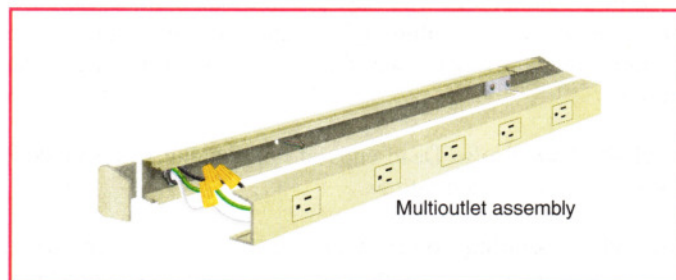


EXHIBIT 380.1 A typical multioutlet assembly shown in an exploded view.

380.12 Uses Not Permitted. A multioutlet assembly shall not be installed as follows:

- (1) Where concealed, except that it shall be permissible to surround the back and sides of a metal multioutlet assembly by the building finish or recess a nonmetallic multioutlet assembly in a baseboard
- (2) Where subject to severe physical damage
- (3) Where the voltage is 300 volts or more between conductors unless the assembly is of metal having a thickness of not less than 1.02 mm (0.040 in.)
- (4) Where subject to corrosive vapors
- (5) In hoistways
- (6) In any hazardous (classified) location, except as permitted by other articles in this *Code*
- (7) Where cord and plug connected

380.23 Insulated Conductors. For field-assembled multioutlet assemblies, insulated conductors shall comply with 380.23(A) and (B), as applicable.

(A) Deflected Insulated Conductors. Where insulated conductors are deflected within a multioutlet assembly, either at the ends or where conduits, fittings, or other raceways or cables enter or leave the multioutlet assembly, or where the direction of the multioutlet assembly is deflected greater than 30 degrees, dimensions corresponding to one wire per terminal in Table 312.6(A) shall apply.

(B) Multioutlet Assemblies Used as Pull Boxes. Where insulated conductors 4 AWG or larger are pulled through a multioutlet assembly, the distance between raceway and cable entries enclosing the same conductor shall not be less than that required by 314.28(A)(1) for straight pulls and 314.28(A)(2) for angle pulls. When transposing cable size into raceway size, the minimum metric designator (trade size) raceway required for the number and size of conductors in the cable shall be used.

Safeguards to prevent overfill are provided by limiting the number of conductors that can be installed in multioutlet assemblies. For deflected insulated conductors, dimensions corresponding to the minimum width of wiring gutters must be maintained.

Where a multioutlet assembly is used as a pull box for insulated conductors of 4 AWG or larger, the distance between the raceway and the cable entries enclosing the conductor must not be less than eight times the trade size or metric designator of the raceway for straight pulls. For angle pulls, the distance must be six times the trade size or metric designator of the raceway.

380.76 Metal Multioutlet Assembly Through Dry Partitions. It shall be permissible to extend a metal multioutlet assembly through (not run within) dry partitions if arrangements are made for removing the cap or cover on all exposed portions and no outlet is located within the partitions.