



EXHIBIT 518.1 Protective cover for flexible cords and cables laid on floors or on the ground. (Courtesy of Electriduct)

devices to de-energize the contacts when the grounded conductor is open, a grounded conductor is transposed (miswired), and/or an ungrounded conductor is open. For that reason, GFCI protection for temporary wiring must be listed as portable or provide equivalent protection to a portable GFCI device.

Exhibit 518.1 is an example of a protective cover used where cords are subject to physical damage, such as pedestrian walkways or light vehicle pathways.

518.4 Wiring Methods.

- Δ (A) **General.** The wiring method shall qualify as an equipment grounding conductor in accordance with 250.118 or shall contain an equipment grounding conductor sized in accordance with Table 250.122, and shall be any of the following:

- (1) Metal raceways
- (2) Flexible metal raceways
- (3) Nonmetallic raceways encased in not less than 50 mm (2 in.) of concrete
- (4) Type MI, Type MC, or Type AC cable

- Δ (B) **Communications, Signaling Systems, Data Systems, Fire Alarm Systems, and Systems Less Than 120 Volts, Nominal.** Fixed wiring methods for specific installations shall be as follows:

- (1) Audio signal processing, amplification, and reproduction equipment — 640.9
- (2) Communications systems — Part IV of Article 805 and Part VI of Article 840
- (3) Class 2 and Class 3 remote control and signaling circuits — Article 725, Part III
- (4) Class 2 circuits that transmit power, data, or both to a powered device

Informational Note: See ANSI/NEMA C137.3-2017, *American National Standard for Lighting Systems — Minimum Requirements for Installation of Energy Efficient Power over Ethernet (PoE) Lighting Systems*, for information on installation of cables for PoE lighting systems. See Part III of Article 760 for information on fire alarm circuits.

(C) **Nonrated Construction.** In addition to the wiring methods permitted by 518.4(A), nonmetallic-sheathed cable, electrical nonmetallic tubing, and rigid nonmetallic conduit shall be permitted to be installed in those buildings or portions of those buildings that are not required to be of fire-rated construction by the applicable building code.

Informational Note: Fire-rated construction is the fire-resistive classification used in building codes.

- Δ (D) **Spaces with Finish Rating.** Electrical nonmetallic tubing and rigid nonmetallic conduit shall be permitted to be installed in club rooms, conference and meeting rooms in hotels or motels, courtrooms, dining facilities, restaurants, mortuary chapels, museums, libraries, and places of religious worship where the following apply:

- (1) The tubing or conduit is installed concealed within walls, floors, and ceilings where the walls, floors, and ceilings provide a thermal barrier of material that has at least a 15-minute finish rating as identified in listings of fire-rated assemblies.
- (2) The tubing or conduit is installed above suspended ceilings where the suspended ceilings provide a thermal barrier of material that has at least a 15-minute finish rating as identified in listings of fire-rated assemblies.

Electrical nonmetallic tubing and rigid nonmetallic conduit are not recognized for use in other space used for environmental air in accordance with 300.22(C).

Informational Note: A finish rating is established for assemblies containing combustible (wood) supports. The finish rating is defined as the time at which the wood stud or wood joist reaches an average temperature rise of 121°C (250°F) or an individual temperature rise of 163°C (325°F) as measured on the plane of the wood nearest the fire. A finish rating is not intended to represent a rating for a membrane ceiling.

The wiring methods identified in 518.4(A) and (B) apply to any wall, floor, or ceiling within an assembly occupancy, as classified in 518.2. The requirements of 518.4(C) apply to those portions of the building and those assembly occupancies not required to be fire rated. Determination of whether a building or portions of a building are required to be constructed using fire-rated construction methods is a function of the building code in effect in a jurisdiction. Under certain height, area, and occupancy type parameters, a building intended for the assembly of 100 or more persons could be constructed using methods that are not fire-rated. The use of electrical nonmetallic tubing and rigid nonmetallic conduit as permitted in 518.4(D) applies only to the specific occupancies described, provided the wiring methods are installed concealed behind a surface that has a 15-minute finish rating.