

Chapter 120: ELECTRICAL INSTALLATION STANDARDS

SUMMARY: This chapter adopts the current edition of the *National Electrical Code* to which all installations must conform.

1. All installations of electrical equipment commencing on or after July 2, 2021 must comply with the 2020 edition of the *National Electrical Code*, *National Fire Protection Association* standard #70, as well as with all applicable statutes or rules of the State and this Board and all applicable ordinances, orders, rules and regulations of local municipalities.
2. The Board hereby adopts and incorporates into this chapter by reference the *National Electrical Code*, *National Fire Protection Association* standard # 70 (2020 edition), subject to the following amendments and exclusions:
 - A. The Board adopts Article 100, excepting the definition of Dormitory Unit, which the Board adopts as amended below:

ARTICLE 100**Definitions . . .**

Dormitory Unit. A building or a space in a building in which group sleeping accommodations are provided for any number of persons who are not members of the same family in one room, or a series of closely associated rooms, under joint occupancy and single management, with or without meals, but without individual cooking facilities. (CMP 2)

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- B. The Board adopts Article 200.6(D) as amended below:

200.6 Means of Identifying Grounded Conductors...

(D) Grounded Conductors of Different Systems. Where grounded conductors of different systems are installed in the same raceway, cable, box, auxiliary gutter, or other type of enclosure, each grounded conductor shall be identified by system. Identification that distinguishes each system grounded conductor shall be permitted by one of the following means:

- (1) One system grounded conductor shall have an outer covering conforming to 200.6(A) or (B).
- (2) The grounded conductor(s) of other systems shall have a different outer covering conforming to 200.6(A) or 200.6(B) or by an outer covering of white or gray with a readily

distinguishable colored stripe other than green running along the insulation.

- (3) Other and different means of identification allowed by 200.6(A) or (B) shall distinguish each system grounded conductor.

The means of identification shall be permanently posted where the conductors of different systems originate.

- C. The Board adopts Article 210.5(C)(1)(b) as amended below:

210.5 Identification for Branch Circuits. . .

(C) Identification of Ungrounded Conductors. . .

(1) Branch Circuits Supplied from More Than One Nominal Voltage System . . .

- (b) *Posting of Identification Means.* The method utilized for conductors originating within each branch-circuit panelboard or similar branch-circuit distribution equipment shall be permanently posted at each branch-circuit panelboard or similar branch-circuit distribution equipment. The label shall be of sufficient durability to withstand the environment involved and shall not be handwritten.

- D. The Board adopts Article 210.8(B) as amended below:

210.8 Ground-Fault Circuit-Interrupter Protection for Personnel . . .

(B) Other Than Dwelling Units. All 125-volt through 250-volt receptacles supplied by single-phase branch circuits rated 150 volts or less to ground, 50 amperes or less, and all receptacles supplied by three-phase branch circuits rated 150 volts or less to ground, 50 amperes or less, installed in the locations specified in 210.8(B)(1) through (B)(12) shall have ground-fault circuit-interrupter protection for personnel.

- E. The Board adopts Article 210.8(F) as amended below:

210.8 Ground-Fault Circuit-Interrupter Protection for Personnel . . .

(F) Outdoor Outlets. All outdoor outlets for dwellings, other than those covered in 210.8(A)(3), Exception to (3), that are supplied by single-phase branch circuits rated 150 volts to ground or less, 50 amperes or less, shall have ground-fault circuit-interrupter protection for personnel.

Exceptions: Ground-fault circuit-interrupter protection shall not be required on (1) lighting outlets other than those covered in 210.8(C), (2) heat pumps, (3) sewer pumps, or (4) water pumps.

F. The Board adopts Article 215.12(C)(1)(b) as amended below:

215.12 Identification for Feeders. . .

(C) Identification of Ungrounded Conductors. . .

(1) Feeders Supplied from More Than One Nominal Voltage System. . .

- (b) *Posting of Identification Means.* The method utilized for conductors originating within each feeder panelboard or similar feeder distribution equipment shall be permanently posted at each feeder panelboard or similar feeder distribution equipment.

G. The Board adopts Article 230.2(E) as amended below:

230.2 Number of Services . . .

- (E) Identification.** Where a building or structure is supplied by more than one service, or any combination of branch circuits, feeders, and services, a permanent plaque or directory shall be installed at each service disconnect location and at each outside electrical meter location denoting all other services, feeders, and branch circuits supplying that building or structure and the area served by each. See 225.37.

H. The Board does not adopt Article 230.67, **Surge Protection.**

I. The Board adopts Article 334.10(3) as amended below:

334.10 Uses Permitted. . .

- (3) Other structures permitted to be of Types III, IV, and V construction. In buildings or structures with interior finished walls and/or ceilings, cables shall be concealed within walls, floors, or ceilings that provide a thermal barrier of material that has at least a 15-minute finish rating as identified in listings of fire-rated assemblies.

J. The Board does not adopt Article 334.12(A)(2).

K. The Board adopts Article 338.12(B)(1) and (2) as amended below:

338.12 Uses Not Permitted. . .

- (B) Underground Service-Entrance Cable.** Underground service-entrance cable (USE) shall not be used under the following conditions or in the following locations:

- (1) For interior wiring of branch circuits and feeders originating and terminating within the same building

- (2) For aboveground installations except where USE cable emerges from the ground and is terminated in an enclosure at a location acceptable to the Authority Having Jurisdiction and the cable is protected in accordance with 300.5(D)

L. The Board adopts Article 400.12(4) as amended below:

400.12 Uses Not Permitted. Unless specifically permitted in 400.10, flexible cords, flexible cables, cord sets, and power supply cords shall not be used for the following: . . .

- (4) Where attached to building surfaces

Exception to (4): Flexible cord and flexible cable shall be permitted to be attached to building surfaces in accordance with 368.56(B) and 590.4. Flexible cord and cable shall also be permitted to have one connection to the building surface for a suitable tension take-up device. Length of the cord or cable from the supply termination to the take-up device shall be limited to 6' (1.83 m). Strain relief cable grips shall be provided for the cord or cable at the equipment terminations.

M. The Board adopts Article 406.9(C) as amended below:

406.9 Receptacles in Damp or Wet Locations. . .

- (C) **Bathtub and Shower Space.** Receptacles shall not be installed within or directly over a bathtub or shower stall.

N. The Board adopts Article 625.40 as amended below:

625.40 Electric Vehicle Branch Circuit. Each outlet installed for the purpose of charging electric vehicles shall be supplied by an individual branch circuit. Each circuit shall have no other outlets.

Exception: Installations that comply with documented manufacturer installation instructions.

O. The Board adopts Article 702.4(B)(2) as amended below:

702.4 Capacity and Rating. . .

- (B) **System Capacity. . .**

- (2) **Automatic Transfer Equipment.** For other than single-family dwellings, where automatic transfer equipment is used, an optional standby system shall comply with 702.4(B)(2)(a) or (B)(2)(b) in accordance with Article 220 or by another approved method.

- (a) *Full Load.* The standby source shall be capable of supplying the full load that is transferred by the automatic transfer equipment.

(b) *Load Management*. Where a system is employed that will automatically manage the connected load, the standby source shall have a capacity sufficient to supply the maximum load that will be connected by the load management system.

3. Copies of the *National Electrical Code*, *National Fire Protection Association* standard #70 may be purchased from:

National Fire Protection Association
1 Batterymarch Park, P.O. Box 9101
Quincy, MA 02269-9101
Telephone: 1-800-344-3555
www.nfpa.org

STATUTORY AUTHORITY:

32 M.R.S. §§ 1153 and 1153-A

EFFECTIVE DATE:

February 16, 1986 - filing 86-45

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January 10, 1988 – filing 88-2
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August 28, 2002 – filing 2002-329
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September 1, 2008 – filing 2008-361
July 19, 2011 – filing 2011-239
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November 6, 2017 – filing 2017-170

REPEALED AND REPLACED:

July 2, 2021 – filing 2021-136