

a 30-ampere, 125-volt weather-resistant receptacle conforming to Figure 551.46(C)(1). This supply shall be permitted to include additional receptacle configurations conforming to 551.81. The remainder of all recreational vehicle sites with electrical supply shall be equipped with one or more of the receptacle configurations conforming to 551.81.

- Δ (C) **50-Ampere.** A minimum of 20 percent of existing and 40 percent of all new recreational vehicle sites with electrical supply, shall each be equipped with a 50-ampere, 125/250-volt weather-resistant receptacle conforming to the configuration as identified in Figure 551.46(C)(1). Every recreational vehicle site equipped with a 50-ampere receptacle shall also be equipped with a 30-ampere, 125-volt receptacle conforming to Figure 551.46(C)(1). These electrical supplies shall be permitted to include additional receptacles that have configurations in accordance with 551.81. The weather-resistant requirement for 50-ampere, 125/250-volt receptacles shall become effective January 1, 2026.

Informational Note: The percentage of 50 ampere sites required by 551.71 could be inadequate for seasonal recreational vehicle sites serving a higher percentage of recreational vehicles with 50-ampere electrical systems. In that type of recreational vehicle park, the percentage of 50-ampere sites could approach 100 percent.

At least one 20-ampere, 125-volt receptacle must be installed at each RV campsite. Many RVs require a 30-ampere connection, and 70 percent of sites must also provide a 30-ampere receptacle.

Some RVs have a 50-ampere, 120/240-volt supply installed, and 20 percent of existing and 40 percent of new RV sites must be provided with a 50-ampere receptacle to accommodate the larger electrical system. This receptacle is in addition to the 20- and 30-ampere receptacles required for the site. This requirement increases the load capacity for RV park services and feeders.

See also

Figure 551.46(C)(1), which shows receptacle configurations 551.81, which provides receptacle ratings

(D) **Tent Sites.** Dedicated tent sites with a 15- or 20-ampere electrical supply shall be permitted to be excluded when determining the percentage of recreational vehicle sites with 30- or 50-ampere receptacles.

(E) **Additional Receptacles.** Additional receptacles shall be permitted for the connection of electrical equipment outside the recreational vehicle within the recreational vehicle park.

Δ (F) GFCI Protection.

- N (1) **Receptacles Installed in Other Than Recreational Vehicle Site Equipment.** Ground-fault circuit-interrupter protection shall be provided as required in 210.8(B).

- N (2) **Receptacles Installed in Recreational Vehicle Site Equipment.** Ground-fault circuit-interrupter protection shall

only be required for 125-volt, single-phase, 15- and 20-ampere receptacles.

Informational Note No. 1: Appliances used within the recreational vehicle can create leakage current levels at the supply receptacle(s) that could exceed the limits of a Class A GFCI device.

Informational Note No. 2: The definition of *Feeder Assembly* clarifies that the power supply cord to a recreational vehicle is considered a feeder.

551.72 Distribution System.

- Δ (A) **Systems.** Distribution systems shall provide the voltage and have a capacity for the receptacles provided in the recreational vehicle (RV) site supply equipment as calculated according to 551.73 and shall have an ampacity not less than 30 amperes. Systems permitted include single-phase 120 volts, single-phase 120/240 volts, or single-phase 120/208 volts — two ungrounded and one neutral conductor taken from a 208Y/120-volt system.

(B) **Three-Phase Systems.** Feeders from 208Y/120-volt, 3-phase systems shall be permitted to include two ungrounded conductors and shall include one grounded conductor and one equipment grounding conductor. So far as practicable, the loads shall be equally distributed on the 3-phase system.

- Δ (C) **Receptacles.** Receptacles rated at 50 amperes shall be supplied from a circuit of the voltage class and rating of the receptacle. Other recreational vehicle sites with 125-volt, 20- and 30-ampere receptacles shall be permitted to be derived from any grounded distribution system that supplies 120-volt, single-phase power.

- Δ (D) **Neutral Conductors.** Neutral conductors shall be permitted to be reduced in size below the minimum required size of the ungrounded conductors for 240-volt, line-to-line, permanently connected loads only. The neutral conductors shall not be reduced in size below the size of the ungrounded conductors for the site distribution.

Informational Note: Due to the long circuit lengths typical in most recreational vehicle parks, feeder conductor sizes found in the ampacity tables of Article 310 could be inadequate to maintain the voltage regulation suggested in 215.2(A), Informational Note No. 2. Total circuit voltage drop is a sum of the voltage drops of each serial circuit segment, where the load for each segment is calculated using the load that segment sees and the demand factors shown in Table 551.73(A).

- Δ (E) **Connected Devices.** The use of listed surge protective devices shall be permitted.

Informational Note: Use of multiple autotransformers on the load side of RV pedestals, supplied by a single feeder, can result in increased current on the RV park or campground distribution system.

(F) **Connection to Recreational Vehicle Site Equipment.** Each recreational vehicle shall be powered by only one 30-ampere or one 50-ampere external power supply cord.