

## Part III. Storable Pools, Storable Spas, Storable Hot Tubs, and Storable Immersion Pools

### 680.30 General.

Electrical installations at storable pools, storable spas, storable hot tubs, or storable immersion pools shall comply with the provisions of Part I and Part III of this article.

Pools, spas, and hot tubs of any dimension with inflatable or molded polymeric walls are considered storable. Other storable units are those that can be readily disassembled and are limited to a maximum water depth of 42 inches. See the defined terms storable swimming, wading, or immersion pools; or storable/portable spas and hot tubs in 680.2. A storable pool, its associated equipment, and perimeter do not require equipotential bonding as specified in 680.26. However, the filter pump must be listed (see 680.3), be double insulated, and have an EGC that is an integral part of the flexible cord. The 3-foot-length limitation for flexible cords in 680.8 does not apply to the power cord of equipment listed for use with a storable swimming pool. According to the product standard for storable pool pump/filter units, the cord must be at least 25 feet long, to discourage the use of extension cords. All electrical equipment used with a storable pool is required to have GFCI protection for personnel. Exhibit 680.10 illustrates an inflatable swimming pool that is considered to be a storable swimming pool regardless of the water depth.

The UL marking requirement for these listed units includes the wording "Do Not Use with Permanently Installed Pools."

### EXHIBIT 680.10 Example of an inflatable swimming pool subject to the requirements in Parts I and III of Article 680.



### 680.31 Pumps.

A cord-connected pool filter pump shall incorporate an approved system of double insulation or its equivalent and shall be provided with means for the termination of an equipment grounding conductor for the connection to the internal and nonaccessible non-current-carrying metal parts of the pump.

An equipment grounding conductor run with the power-supply conductors in the flexible cord shall terminate in a grounding-type attachment plug having a fixed grounding contact member.

Cord-connected pool filter pumps shall be provided with a ground-fault circuit interrupter that is an integral part of the attachment plug or located in the power-supply cord within 12 in. of the attachment plug.

### 680.32 Ground-Fault Circuit Interrupters Required.

All electrical equipment, including power-supply cords, used with storable pools shall be protected by ground-fault circuit interrupters.

All 125-volt, 15- and 20-ampere receptacles located within 20 ft of the inside walls of a storable pool, storable spa, or storable hot tub shall be protected by a ground-fault circuit interrupter. In determining these dimensions, the distance to be measured shall be the shortest path the supply cord of an appliance connected to the receptacle would follow without piercing a floor, wall, ceiling, doorway with hinged or sliding door, window opening, or other effective permanent barrier.

### **680.34 Receptacle Locations.**

Receptacles shall not be located less than 1.83 m (6 ft) from the inside walls of a storable pool, storable spa, or storable hot tub. In determining these dimensions, the distance to be measured shall be the shortest path the supply cord of an appliance connected to the receptacle would follow without piercing a floor, wall, ceiling, doorway with hinged or sliding door, window opening, or other effective permanent barrier.

### **680.35 Storable and Portable Immersion Pools.**

Storable and portable immersion pools shall additionally comply with 680.35(A) through (G).

#### **680.35(A) Cord Connection for Self-Contained Storable and Portable Immersion Pools.**

Self-contained storable and portable packaged immersion pools with identified integral permanently attached switches and/or controls, pumps, and/or heaters, including circulation heaters, rated 120 volts and 20 amperes or less, single phase, shall be permitted to be cord-and-plug-connected with a cord not shorter than 6 ft and not longer than 15 ft, and shall be protected by a ground-fault circuit interrupter. The cord shall be minimum hard usage. If the ground-fault circuit interrupter is provided as an integral part of the cord assembly, it shall be located at the attachment plug or in the power supply cord within 12 in. of the attachment plug.

#### **680.35(B) Storable and Portable Pumps.**

A cord-connected storable or portable pump utilized with, but not built-in or permanently attached as an integral part of, a storable or portable immersion pool shall be listed, labeled, and identified for swimming pool and spa use, and shall meet the requirements of 680.31.

#### **680.45(B) Storable and Portable Pumps.**

A cord-connected storable or portable pump utilized with, but not built-in or permanently attached as an integral part of, a permanently installed immersion pool shall be identified for swimming pool and spa use. It shall incorporate an approved system of double insulation or its equivalent and shall be provided with means for grounding only the internal and nonaccessible non-current-carrying metal parts of the appliance. The means for grounding shall be an equipment grounding conductor run with the power-supply conductors in the flexible cord that is properly terminated in a grounding-type attachment plug having a fixed grounding contact member. Cord-connected pool filter pumps shall be provided with a ground-fault circuit interrupter that is an integral part of the attachment plug or located in the power-supply cord within 12 in. of the attachment plug.

Onground Storable Pool: A pool that can be disassembled for storage or transport. This includes portable pools with flexible or nonrigid walls that achieve their structural integrity by means of uniform shape, a support frame, or a combination thereof, and that can be disassembled for storage or relocation.

Residential: For purposes of this code, residential applies to detached one- and two-family dwellings and townhouses not more than three stories in height.

RESIDENTIAL SWIIMING POOL: A pool intended for use that is accessory to a residential setting and available only to the household and its guests that is capable of containing water more than 24" deep. Other pools shall be considered to be public pools for purposes of this code.

Type O. A nondiving residential pool.

Types I—V. Residential pools suitable for the installation of diving equipment by type.

**This is just a small portion of the electrical code requirements of the for all aspects of a storable pool, storable hot tub, storable spas, and storable Immersion pools. If there are any questions as to electrical code requirements, please contact the Building Department.**