



TECHNICAL SERVICES DEPARTMENT

BULLETIN

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Drain Openings in Boxes and Conduit Bodies Listed for Damp or Wet Locations

NEC[®] Section 314.15 was amended in 2014 to add the following:

"Approved drainage openings not larger than 6 mm (1/4 in.) shall be permitted to be installed in the field in boxes or conduit bodies listed for use in damp or wet locations. For installations of listed drain fittings, larger openings are permitted to be installed in the field in accordance with manufacturer's instructions."

This change recognized a common field practice found necessary to address accumulation of moisture due to condensation effects.

The following are general guidelines for field drilling for a drainage opening as permitted by *NEC* Section 314.15:

1. Only a single drainage opening, not larger than 6 mm (1/4 in.), is to be drilled in a box or conduit body unless instructed by the manufacturer. Where a box is divided by tightly fitted partitions, one drainage opening may be drilled in each partitioned section.
2. A drainage opening should only be drilled in a surface mounted, pedestal mounted or pendant mounted box that is listed for a damp or wet location. A drainage hole should not be drilled in a flush mounted box.
3. A drainage opening should only be drilled in the underside and at the lowest point of a box or conduit body when mounted for use. Openings should not be drilled within 6 mm (1/4 in.) of an edge or corner of a box or conduit body, or a knockout or formed conduit hub, or any formed screw boss or raised area inside the box or conduit body.
4. A drainage opening should never be drilled in a box or conduit body classified for use in a hazardous (classified) location.
5. A drainage opening should never be drilled in a box or conduit body where such an opening could jeopardize Enclosure Type ratings for which the box or conduit body is rated.

Important:

Boxes and conduit bodies marked as Type 3R and 3RX enclosures must comply with the following requirements of NEMA Standard 250 and UL Standard UL 50E:

"Drainage openings shall not be less than 3.2 mm in diameter (1/8 inch in diameter) or more than 6.4 mm in diameter (1/4 inch in diameter) unless baffled or provided with a drainage fitting."

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