

TECHNICAL UPDATE - TU-5005

SUBJECT: Conduit Boxes used in the 1548-XXXX Series Power Connection Kit

The conduit box used in Dekoron/Unitherm's power connection and termination kits is a little understood and often overlooked component in the system. The conduit box provides a transition from the heating element to the customer conduit, or from one bundle to the next, and provides isolation from the power leads to the outside world.

Our standard connection kits contain a copper-free aluminum box with associated cadmium plated hardware, gasket and cover.

The size and type of box were chosen for many reasons, including:

1. This connection box had a long, successful history of use in the chemical industry, notably in corrosion prone areas along the Gulf of Mexico.
2. The box provided a compact connection point while meeting the minimum wiring volume required by the National Electric Code.
3. It is a standard electrical construction component, insuring plentiful supply at a reasonable price
4. It is familiar throughout the industry, which aids in proper installation.

The hardware and bracket used with this box were also chosen with consideration for the rigors of use in a chemical processing facility.

Components are either fabricated from corrosion resistant materials or plated to retard corrosion. The kit can be assembled without the need for special tools or fixtures. Components can be assembled in any weather conditions without fear of cracking, and are resistant to a wide range of environmental conditions.

This system provides a rugged, compact, and inexpensive method to connect Furon electrical heating elements.

