Fire Resistive, Fire Resistant and Circuit Integrity Cables: Update

On September 26, 2012, Edward Smith, Director of the Division of Codes and Standards, sent a letter to all Construction Officials and Electrical Subcode Officials providing initial guidance on Underwriter Laboratories' withdrawal of its listing for specific cables. Director Smith committed to updating the guidance as additional information was made available. This article is such an update and is intended to provide clarity as to which cables cannot be used; it is based on the Underwriter Laboratories (UL) press release.

In its most recent guidance UL has made it clear that it is no longer authorizing manufacturers to place the UL mark or ULC mark on the following categories of cables:

1. UL Classified Fire Resistive Cable (FHJR);

2. ULC Listed Fire Resistant Cable (FHJRC); and

3. UL Listed Cable with "-CI" Suffix (Circuit Integrity).

These categories of fire resistive and cable integrity cables no longer consistently achieve a *fire-resistive rating* when subjected to the standard Fire Endurance Test of UL2196 or ULC-S139. However, Electrical Subcode Officials and Fire Protection Subcode Officials may approve the use of these cables where other alternative methods (e.g. automatic fire suppression system, 2-hour rated assembly, embedded in 2 inches of concrete, etc.) are used to obtain the required fire-resistive rating.

In addition, UL is not the only testing laboratory that provides ratings for fire-resistive cable. If cable marked by another testing laboratory meets the two-hour fire-resistive rating, it may be approved/used.

Finally, the Department has learned that some code officials have denied the use of UL1424 listed cable types FPLP, FPLR and FPL and UL1425 listed cable types NPLF, NPLFR and NPLFP. The listings for these cable types have not been withdrawn and these cables (including cables with a CI designation) may continue to be approved for use where no fire resistive rating is required.

If you have any questions, please feel free to call us at (609) 984-7609.

Source:    Michael E. Whalen and Rob Austin
           Code Assistance Unit