# DuraLife® II Dual Rated CIC/CI Free Air
## UL 2196 2-Hour Fire Resistive Cable
## FPLR Shielded / Unshielded 105°C/300V

# SPECIFICATIONS

Certified to the harsh requirements of the UL2196 Test for Fire Resistive Cables, the DuraLife II Dual Rated CIC /CI cables ensure two-hour operation of critical systems in the event of a fire. The dual rating design offers the most versatility in meeting code survivability requirements in both in-conduit and free air installation scenarios.

Description: Dual Rated CI/CIC Cable. UL/CAN (ULC) 2196 Certified/UL 1424 Listed. FHIT/FHIT7 (ULC) System No. 28C. Low smoke, zero halogen design (LSZH).

Sizes Available: 2 conductor, 18-12 AWG unshielded; 18-14 AWG shielded.

## CONSTRUCTION:

- **Conductor:** Oxygen-free bare copper (OFHC), solid and/or stranded
- **Insulation:** Proprietary ceramifiable silicone rubber
- **Assembly:** Color-coded black/red leads, 3 twists/foot
- **Jacket:** Red low smoke/zero halogen FRPE with sequential footage markers (custom colors available/special order mins apply)

## APPLICATIONS:

- Hospitals & Healthcare Facilities
- High Rise & Mix use buildings
- Universities & College Campuses
- Stadiums, Casinos, places of assembly
- Transit bridges, tunnels and subways
- Government Facilities

## CRITICAL SYSTEMS:

- Fire Alarm and EVAC Systems
- Smoke evacuation and control
- Fan & Pressurization systems
- Strobes & notification appliances
- Area of Refuge Systems
- Emergency lighting

- UL 1424 Listed FPLR/FPLR-CI (dual-rated) for Power-Limited Fire Alarm Circuits. Riser Rated. 300V/105°C classified.
- UL/CAN (ULC formerly S-139) Certified to UL 2196 2-hour fire rating in FHIT/FHIT7 28C
- CSA Certified FAS90; CSA Std. C22.2 No. 208-14 FT4-ST1
- UL Certified 2-hour fire rating as FPLR-CI for Free Air installed per NEC code
- UL 444 Listed "CMR/CMR-CI" as Communications Cable
- Fire alarm circuit integrity, emergency systems, and healthcare facilities (NEC Articles 760, 700 & 517)
- Meets National Fire Protection Code (NFPA 70 & 72) fire alarm survivability circuit requirements
- Meets National Fire Protection Code (NFPA 130 & 502) fire alarm survivability circuit requirements
- Compliance tested to UL 1424 as suitable for use in applications requiring wet rating
- Meets UL1685 and FT4/IEEE 1202 requirements
- Tested for Sunlight Resistance in compliance with UL 2556 requirements
- Suitable for 2-hour certified fire-resistive applications in EMT, IMC, or Phenolic conduit systems
- UL Listed File No. E-241484. UL Fire Directory R-21213.
- Splice Allowance
- Performance testing of cables, cold bend test of complete cable per defined testing parameters and UL 1424
- NYC certified

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DURALIFE®
Survivable Cable Solutions

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## HARDWARE & ACCESSORIES CERTIFIED: (Refer to DuraLife® II Installation Instructions/Phenolic Addendum for details)

- **EMT/IMC Conduit:** Wheatland/Western Tube
- **EMT/IMC Conduit:** Allied/Columbia (*EMT: E-Z Pull Brand*)
- **Phenolic Conduit:** Champion Fiberglass
- **EMT/IMC Compression Couplings:** Hubbell/Raco
- **EMT/IMC Set-Screw Coupling:** Hubbell/Raco
- **Phenolic Coupling:** Champion Fiberglass
- **NEMA 1 Splice Enclosure/Pull Box:** Eaton/Cooper (system use only)
- Standard UL listed steel 4/S Utility Box (CI only)
- **Expansion Couplers:** Bridgeport fittings (EMT/IMC)
- **Box Fittings:** *Compression* – Cooper Crouse-Hinds (EMT); Hubbell/Raco (EMT/IMC)
  *Set Screw* - Hubbell/Raco (EMT/IMC)
  *Phenolic* - Champion Fiberglass
- **Conduit Clamps:** Erico (Phenolic conduit only)
- **Splice Connector:** 3M Butt-Type Crimp Terminals
- **Splice Tapes – 1":** 3M Silicone; St. Gobain Fiberglass Tape
- **Pulling Lubricant:** Polywater LZ

**UNSHIELDED:**

| RADIX P/N | #COND | AWG | SOLID OR STRANDED | NOMINAL O.D. (INCH) | NET WEIGHT (LBS PER MFT) | RESISTANCE (OHMs/MFT) | NOMINAL CAPACITANCE (pF/FT) |
|---|---|---|---|---|---|---|---|
| CTU18A0102 | 2 | 18 | Solid | .305 | 53 | 6.48 | 14.4 |
| CTU16A0102 | 2 | 16 | Solid | .335 | 62 | 3.99 | 15.3 |
| CTU14A0102 | 2 | 14 | Solid | .344 | 77 | 2.57 | 17.1 |
| CTU14A0702 | 2 | 14 | Stranded | .350 | 77 | 2.60 | 17.3 |
| CTU12A0702 | 2 | 12 | Stranded | .392 | 98 | 1.64 | 17.6 |

**SHIELDED:**

| RADIX P/N | #COND | AWG | SOLID OR STRANDED | NOMINAL O.D. (INCH) | NET WEIGHT (LBS PER MFT) | RESISTANCE (OHMs/MFT) | NOMINAL CAPACITANCE (pF/FT) |
|---|---|---|---|---|---|---|---|
| CTS18A0102 | 2 | 18 | Solid | .335 | 55 | 6.48 | 18.4 |
| CTS16A0102 | 2 | 16 | Solid | .360 | 65 | 3.99 | 19.1 |
| CTS14A0102 | 2 | 14 | Solid | .390 | 79 | 2.57 | 21.4 |
| CTS14A0702 | 2 | 14 | Stranded | .393 | 79 | 2.60 | 21.7 |

*Min-Max Spec Range ± .020

### System Fill Allowances (EMT - ½" to 2"; IMC - ¾" to 2")

| EMT/IMC | ½" | ¾" | 1" | 1 ¼" | 1 ½" | 2" |
|---|---|---|---|---|---|---|
| Part No. | No. of Cables Max Fill | | | | | |
| CTU18A0102 | 1 | 2 | 4 | 6 | 10 | N/A |
| CTU16A0102 | 1 | 1 | 3 | 5 | 7 | 10 |
| CTU14A0102* | 1 | 1 | 3 | 5 | 7 | 10 |
| CTU12A0702 | 1 | 1 | 2 | 4 | 5 | 10V/9H |
| | | | | | | |
| CTS18A0102 | 1 | 1 | 3 | 5 | 8 | N/A |
| CTS16A0102 | 1 | 1 | 3 | 5 | 7 | 10 |
| CTS14A0102* | N/A | 1 | 2 | 4 | 6 | 10 |

*System fill allowances same for stranded version.

### System Fill Allowances (Phenolic Conduit - 1" to 2")

| PHENOLIC | 1" | 1 ¼" | 1 ½" | 2" |
|---|---|---|---|---|
| Part No. | No. of Cables Max Fill | | | |
| CTU18A0102 | 3 | 6 | 9 | N/A |
| CTU16A0102 | 2 | 4 | 6 | 10 |
| CTU14A0102* | 3 | 5 | 7 | 10 |
| CTU12A0702 | 2 | 4 | 5 | 10V/9H |
| | | | | |
| CTS18A0102 | 3 | 5 | 7 | N/A |
| CTS16A0102 | 2 | 4 | 6 | 10 |
| CTS14A0102* | 2 | 4 | 6 | 10 |

*System fill allowances same for stranded version.

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