## CX3460006 | 150T135QR860JCASS COEX

#### ConQuest® Cable in Conduit, 1 1/2 in, SDR 13.5, terracotta, QR 860 JCASS



 \*Product complies with the Build America, Buy America Act (BABAA) requirements of the Infrastructure Investment and Jobs Act of 2021 (Pub. L. 117- 58, §§ 70901-70953), or is the subject of a waiver approved by the Secretary of Commerce or designee. Compliance requirements and waiver applicability vary based on government funding program. Check the laws and regulations for your specific program.

#### **Product Classification**

Regional Availability North America

Product Type Coaxial cable-in-conduit

Product Brand ConQuest®
Product Series 860 Series

**Government Funding**Build America Buy America (BABA) compliant\*

### General Specifications

Cable Type860 SeriesCable-In-Conduit TypeQR® in ductColorTerracottaConduit TypeNon-toneableWall TypeSmooth

**Dimensions** 

**Length** 822.96 m | 2700 ft

Wall Thickness Designation SDR 13.5

Nominal Size 1-1/2 in

#### Packaging and Weights

**Weight, net** 831.884 kg/km | 559 lb/kft

Included Products

5543802 – 75 Ohm QR® Trunk and Distribution Cable, black PE jacket, flooded for underground

QR® 860 JCASS



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CX3499999 150T135 EMPTY DUCT COEX ConQuest® Empty Conduit, 1 1/2 in, SDR 13.5, terracotta



## 5543802 | QR® 860 JCASS

75 Ohm QR® Trunk and Distribution Cable, black PE jacket, flooded for underground



#### **Product Classification**

Product Type Coaxial hardline cable

Product Brand QR®

General Specifications

Cable Type860 SeriesConstruction TypeWeldedJacket ColorBlack

**Short Description** QR 860 JCASS SM PR2171

**Dimensions** 

Cable Length2950 ft | 899.16 mDiameter Over Center Conductor, nominal0.203 in | 5.156 mmDiameter Over Dielectric, nominal0.828 in | 21.031 mmDiameter Over Jacket, nominal0.96 in | 24.384 mmDiameter Over Outer Conductor, nominal0.86 in | 21.844 mmJacket Thickness, nominal0.045 in | 1.143 mmOuter Conductor Thickness, nominal0.016 in | 0.406 mm

## **Electrical Specifications**

**Capacitance** 15.3 pF/ft | 50.197 pF/m

Capacitance Tolerance±1.0 pF/ftCharacteristic Impedance75 ohmCharacteristic Impedance Tolerance±2 ohm

dc Resistance Note Nominal values based on a standard condition of 20 °C (68 °F)



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dc Resistance, Inner Conductor, nominal 0.41 ohms/kft | 1.345 ohms/km

dc Resistance, Loop, nominal0.73 ohms/kft | 2.395 ohms/km

**dc Resistance, Outer Conductor, nominal** 0.32 ohms/kft | 1.05 ohms/km

Jacket Spark Test Voltage 5000 Vac

Nominal Velocity of Propagation (NVP) 88 %

Operating Frequency Band 5-3000 MHz

**Structural Return Loss** 24 dB @ 1003-1218 MHz | 24 dB @ 1219-1794 MHz | 30 dB @ 5-1002

MHz

**Structural Return Loss, Grade N** ≥24 dB @ 1003−1218 MHz | ≥24 dB @ 1219−1794 MHz | ≥30 dB @ 5−1002

MHz

### Attenuation

| 5.00.30.0955.01.050.3285.01.310.4204.02.070.63211.02.10.64250.02.30.7300.02.490.76350.02.720.83400.02.890.88450.03.120.95500.03.281550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.871794.06.862.09 | Frequency (MHz) | Attenuation (dB/100 m) | Attenuation (dB/100 ft) |
|--|-----------------|------------------------|-------------------------|
| 85.01.310.4204.02.070.63211.02.10.64250.02.30.7300.02.490.76350.02.720.83400.02.890.88450.03.120.95500.03.281550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87                                     | 5.0             | 0.3                    | 0.09                    |
| 204.02.070.63211.02.10.64250.02.30.7300.02.490.76350.02.720.83400.02.890.88450.03.120.95500.03.281.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87  | 55.0            | 1.05                   | 0.32                    |
| 211.02.10.64250.02.30.7300.02.490.76350.02.720.83400.02.890.88450.03.120.95500.03.281550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87   | 85.0            | 1.31                   | 0.4                     |
| 250.02.30.7300.02.490.76350.02.720.83400.02.890.88450.03.120.95500.03.281.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87   | 204.0           | 2.07                   | 0.63                    |
| 300.02.490.76350.02.720.83400.02.890.95500.03.281550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87   | 211.0           | 2.1                    | 0.64                    |
| 350.02.720.83400.02.890.95500.03.281550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87  | 250.0           | 2.3                    | 0.7                     |
| 400.02.890.88450.03.120.95500.03.281.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87  | 300.0           | 2.49                   | 0.76                    |
| 450.03.120.95500.03.281.06550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87  | 350.0           | 2.72                   | 0.83                    |
| 500.03.281550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87  | 400.0           | 2.89                   | 0.88                    |
| 550.03.481.06600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87  | 450.0           | 3.12                   | 0.95                    |
| 600.03.611.1750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.01.87   | 500.0           | 3.28                   | 1                       |
| 750.04.071.24865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87   | 550.0           | 3.48                   | 1.06                    |
| 865.04.361.331000.04.721.441002.04.751.451218.05.281.611500.06.121.87  | 600.0           | 3.61                   | 1.1                     |
| 1000.04.721.441002.04.751.451218.05.281.611500.06.121.87   | 750.0           | 4.07                   | 1.24                    |
| 1002.04.751.451218.05.281.611500.06.121.87   | 865.0           | 4.36                   | 1.33                    |
| 1218.05.281.611500.06.121.87   | 1000.0          | 4.72                   | 1.44                    |
| <b>1500.0</b> 6.12 1.87  | 1002.0          | 4.75                   | 1.45                    |
|  | 1218.0          | 5.28                   | 1.61                    |
| <b>1794.0</b> 6.86 2.09  | 1500.0          | 6.12                   | 1.87                    |
|  | 1794.0          | 6.86                   | 2.09                    |
| <b>1800.0</b> 6.87 2.1   | 1800.0          | 6.87                   | 2.1                     |
| <b>2000.0</b> 7.36 2.24  | 2000.0          | 7.36                   | 2.24                    |

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| 2200.0 | 7.83 | 2.39 |
|--------|------|------|
| 2500.0 | 8.51 | 2.59 |
| 2700.0 | 8.96 | 2.73 |
| 3000.0 | 9.61 | 2.93 |

## Material Specifications

Center Conductor Material Copper-clad aluminum

**Dielectric Material** Foam PE

Jacket Material PE

Outer Conductor Material Aluminum

Mechanical Specifications

Minimum Bend Radius, bonded7 in | 177.8 mmPulling Tension, maximum450 lb | 204.117 kg

### **Environmental Specifications**

Corrosion Protection Migraheal®

Environmental Space Buried

Packaging and Weights

Packaging Type Reel

**Weight, gross** 292 lb/kft | 434.544 kg/km

### Regulatory Compliance/Certifications

#### Agency Classification

ISO 9001:2015 Designed, manufactured and/or distributed under this quality management system



## CX3499999 | 150T135 EMPTY DUCT COEX



#### ConQuest® Empty Conduit, 1 1/2 in, SDR 13.5, terracotta

#### **Product Classification**

Product TypeEmpty conduitProduct BrandConQuest®

#### General Specifications

ColorTerracottaConduit TypeNon-toneableDensity Test MethodASTM D792A

 Density, maximum
 0.955 g/cm³ | 0.035 lb/in³

 Density, minimum
 0.941 g/cm³ | 0.034 lb/in³

**Design Standard** ASTM D3350-05

Wall Type Smooth

#### **Dimensions**

 Length
 914.4 m | 3000 ft

 Inner Diameter, nominal
 40.589 mm | 1.598 in

 Outer Diameter, nominal
 48.26 mm | 1.9 in

Wall Thickness Designation SDR 13.5

Wall Thickness, minimum 3.581 mm | 0.141 in

Nominal Size 1-1/2 in

### Material Specifications

Flexural Modulus, minimum 551.581 N/mm<sup>2</sup> | 80000 psi

Flexural Property Test Method ASTM D790

**Hydrostatic Design Basis**Not pressure rated

**Hydrostatic Design Test Method**ASTM D2837

Material Type High density polyethylene (HDPE)

Melt Flow Rate Test Method ASTM D1238

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## CX3499999 | 150T135 EMPTY DUCT COEX

Melt Flow Rate, maximum 0.39 g/10 min

Mechanical Specifications

Minimum Bend Radius, unsupported 508 mm | 20 in

Tensile Property Test Method ASTM D638

**Tensile Strength at yield, minimum** 20.684 N/mm<sup>2</sup> | 3000 psi

**Pulling Tension, maximum** 659.977 kg | 1455 lb

**Environmental Specifications** 

**Environmental Stress Crack Resistance** Failure rate of 10% within 96 hours

**Environmental Stress Test Method** ASTM D1693, ESCR Condition B

Packaging and Weights

**Weight, net** 511.928 kg/km | 344 lb/kft

Regulatory Compliance/Certifications

Agency Classification

ISO 9001:2015 Designed, manufactured and/or distributed under this quality management system



#### \* Footnotes

Environmental Stress Crack Resistance ESCR—Environmental Stress Crack Resistence

