



Product: [29722C](#)

VFD, 3C #12 Str BC XLPE Ins + #12 Symm. Seg. Gnd (3 of #16) Str BC, CTS, Bk PVC Jkt, 2000V TC-ER 90C Dry/Wet 1000V CSA AWM I/II A/B

Product Description

Belden Basics VFD, 3 Conductor 12AWG (7x20) Bare Copper XLPE Insulation M4 Color Code + 12AWG Symmetrical Segmented Ground (3 of 16AWG) Bare Copper Stranded, Overall Dual Copper Tapes Helically Applied Shield, Black PVC Outer Jacket, 2000V TC-ER 90C Dry/Wet 1000V CSA AWM I/II A/B SUN RES DIR BUR Oil Resistant

Technical Specifications

Product Overview

| | |
|------------------------|--|
| Suitable Applications: | Variable Frequency Drives (VFD); AC Motor and Drive Systems; High voltage requirements |
|------------------------|--|

Construction Details

Conductor

| Element | Number of Element | Size | Stranding | Material | Notes |
|--------------|-------------------|--------|-----------|------------------|-------------------|
| Conductor(s) | 3 | 12 AWG | 7x20 | BC - Bare Copper | |
| Ground | 3 | 16 AWG | 7x24 | BC - Bare Copper | Segmented Grounds |

Insulation

| Element | Material | Nom. Thickness | Nom. Insulation Diameter | Color Code |
|--------------|--|-------------------|--------------------------|--------------------|
| Conductor(s) | XLPE - Cross-Linked Polyethylene (Thermoset) | 0.063 in (1.6 mm) | 0.219 in (5.56 mm) | Black and Numbered |
| Ground | No Insulation | | | |

Outer Shield

| Shield Type | Material | Coverage |
|--------------|------------------|----------|
| Helical Tape | Bare Copper (BC) | 100% |
| Helical Tape | Bare Copper (BC) | 100% |

Outer Jacket

| Material | Nom. Thickness | Nom. Diameter | Ripcord |
|--------------------------|-------------------|--------------------|---------|
| PVC - Polyvinyl Chloride | 0.063 in (1.6 mm) | 0.610 in (15.5 mm) | Yes |

| | |
|-----------------------------------|--------------------|
| Overall Cable Diameter (Nominal): | 0.610 in (15.5 mm) |
|-----------------------------------|--------------------|

Electrical Characteristics

Electricals

| Element | Nom. Conductor DCR | Nom. Capacitance Cond-to-Cond | Nom. Capacitance Cond-to-Other (Conds + Shield) | Nom. Characteristic Impedance | Nom. Velocity of Prop. | Max. Current |
|--------------|-------------------------------|-------------------------------|---|-------------------------------|------------------------|-------------------------------|
| Conductor(s) | 1.42 Ohm/1000ft (4.66 Ohm/km) | 40 pF/ft (130 pF/m) | 72 pF/ft (240 pF/m) | 46 Ohm | 55% | 30 Amps per Conductor at 30°C |

Voltage

| UL Voltage Rating |
|--|
| 2000 V (TC), 1000 V (CSA AWM I/II A/B) |

Mechanical Characteristics

Temperature

| UL Temperature | Operating |
|----------------|-----------|
| | |

90°C Dry, 90°C Wet -40°C To +90°C

Bend Radius

| Stationary Min. | Installation Min. |
|-----------------|-------------------|
| 7.3 in (190 mm) | 7.3 in (190 mm) |

| | |
|--------------------|----------------------------|
| Max. Pull Tension: | 367 lbs |
| Bulk Cable Weight: | 237 lbs/1000ft (353 kg/km) |

Standards and Compliance

| | |
|----------------------------------|---|
| Environmental Suitability: | Indoor, Outdoor, Sunlight Resistance, Oil Resistance, Burial |
| Sustainability: | CA Prop 65 |
| Flammability / Reaction to Fire: | UL1685 UL Loading, FT4, 1202, 383 Vertical Tray Flame Test (70,000 BTU) |
| NEC / UL Compliance: | Article 336, TC-ER, RHW-2 |
| AWM Compliance: | I/II A/B |
| ICEA Compliance: | S-95-658 |
| European Directive Compliance: | EU CE Mark, EU Directive 2015/863/EU (RoHS 2 amendment), EU Directive 2011/65/EU (RoHS 2), EU Directive 2012/19/EU (WEEE) |
| APAC Compliance: | China RoHS II (GB/T 26572-2011) |
| Other Standard Compliance(s): | P-07-KA070003-MSHA |

History

| | |
|----------------------|---|
| Update and Revision: | Revision Number: 0.60 Revision Date: 10-11-2021 |
|----------------------|---|

Variants

| Item # | Putup Type | UPC |
|----------------|------------|--------------|
| 29722C 0102500 | Reel | 612825445456 |
| 29722C 0105000 | Reel | 612825445463 |

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