

Part Number: 8451

Audio & Instrumentation, 1 Pair 22 AWG, TC, O/A Foil, CM



Product Description

1 Pair 22 AWG stranded (7x30) TC conductors, polypropylene insulation, paper wrap, twisted pair, overall Beldfoil® shield (100% coverage), 22 AWG stranded TC drain wire, PVC jacket.

Technical Specifications

Product Overview

| | |
|----------------------|----------------|
| Environmental Space: | Indoor - Riser |
|----------------------|----------------|

Physical Characteristics (Overall)

Conductor

| AWG | Stranding | Material | No. of Pairs |
|-----|-----------|--------------------|--------------|
| 22 | 7x30 | TC - Tinned Copper | 1 |

| | |
|------------------------|--------|
| Conductor Count: | 2 |
| Total Number of Pairs: | 1 |
| Conductor Size: | 22 AWG |

Insulation

| Material | Nominal Wall Thickness |
|--------------------|------------------------|
| PP - Polypropylene | 0.008 in |

Color Chart

| Number | Color |
|--------|-------------|
| 1 | Black & Red |

Outer Shield Material

| Type | Material | Material Trade Name | Coverage [%] | Drainwire Material | Drainwire AWG | Drainwire Construction n x D |
|------|--------------------|---------------------|--------------|--------------------|---------------|------------------------------|
| Tape | Aluminum/Polyester | Beldfoil® (Z-Fold®) | 100 % | TC - Tinned Copper | 22 | 7x30 mm |

Outer Jacket Material

| Material | Nominal Diameter |
|--------------------------|------------------|
| PVC - Polyvinyl Chloride | 0.138 in |

Electrical Characteristics

Conductor DCR

| Nominal Conductor DCR | Nominal Outer Shield DCR |
|-----------------------|--------------------------|
| 14.5 Ohm/1000ft | 14.1 Ohm/1000ft |

Capacitance

| Nom. Capacitance Conductor to Conductor | Nom. Capacitance Conductor to Other Conductor to Shield |
|---|---|
| 34 pF/ft | 67 pF/ft |

Inductance

| Nominal Inductance |
|--------------------|
| 0.17 µH/ft |

Impedance

Nominal Characteristic Impedance

45 Ohm

Delay

Nominal Delay Nominal Velocity of Propagation (VP) [%]

1.5 ns/ft 66 %

Current

Max. Recommended Current [A]

2.9 Amps per conductor @ 25°C

Voltage

UL Voltage Rating

300 V RMS

Temperature Range

Operating Temp Range: -20°C To +75°C

Mechanical Characteristics

Bulk Cable Weight: 15 lbs/1000ft

Max Recommended Pulling Tension: 27 lbs

Min Bend Radius/Minor Axis: 1.5 in

Standards

NEC/(UL) Specification: CMR

CEC/C(UL) Specification: CMG

CPR Euroclass: Eca

Applicable Environmental and Other Programs

EU Directive 2000/53/EC (ELV): Yes

EU Directive 2003/96/EC (BFR): Yes

EU Directive 2011/65/EU (ROHS II): Yes

EU Directive 2012/19/EU (WEEE): Yes

EU Directive 2015/863/EU: Yes

EU Directive Compliance: EU Directive 2003/11/EC (BFR)

EU CE Mark: Yes

EU RoHS Compliance Date (yyyy-mm-dd): 2004-01-01

CA Prop 65 (CJ for Wire & Cable): Yes

MII Order #39 (China RoHS): Yes

Suitability

Suitability - Indoor: Yes

Flammability, LSOH, Toxicity Testing

UL Flammability: UL1666 Vertical Shaft

CSA Flammability: FT4

UL voltage rating: 300 V RMS

Plenum/Non-Plenum

Plenum (Y/N): No

Part Number

Variants

| Item # | Color | Footnote |
|---------------|-------|----------|
| 8451 010100 | Black | |
| 8451 0101000 | Black | C |
| 8451 01010000 | Black | |
| 8451 01015000 | Black | |

| | | |
|---------------|-------|---|
| 8451 010500 | Black | |
| 8451 010500 | Black | |
| 8451 010U1000 | Black | |
| 8451 010U500 | Black | |
| 8451.01305 | Black | |
| 8451 010Z1000 | Black | |
| 8451 010Z1000 | Black | |
| 8451 0081000 | Gray | C |
| 8451 008500 | Gray | |
| 8451 008U1000 | Gray | |
| 8451 008U500 | Gray | |
| 8451 008Z1000 | Gray | |
| 8451 008Z1000 | Gray | |

| | |
|-----------|------------------------|
| Footnote: | C - CRATE REEL PUT-UP. |
|-----------|------------------------|

Product Notes

| | |
|--------|--|
| Notes: | Unique paper separator facilitates jacket stripping. |
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