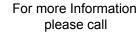
# **Detailed Specifications & Technical Data**

### **ENGLISH MEASUREMENT VERSION**



## 9451 Multi-Conductor - Single-Pair Cables



1-800-Belden1



# **General Description:**

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

## **Physical Characteristics (Overall)**

#### Conductor

#### AWG:

# Pairs	AWG	Stranding	Conductor Material
1	22	7x30	TC - Tinned Copper

Total Number of Conductors: 2

#### Insulation

#### **Insulation Material:**

Insulation Material	Wall Thickness (in.)
PP - Polypropylene	.008

#### **Outer Shield**

### **Outer Shield Material:**

Outer Shield Trade Name	Type	Outer Shield Material	Coverage (%)
Beldfoil®	Tape	Aluminum Foil-Polyester Tape	100

#### **Outer Shield Drain Wire AWG:**

	Stranding	<b>Drain Wire Conductor Material</b>
22	7x30	TC - Tinned Copper

## **Outer Jacket**

#### **Outer Jacket Material:**

Outer Jacket Material	Nom. Wall Thickness (in.)
PVC - Polyvinyl Chloride	.020

#### **Overall Cable**

Overall Nominal Diameter: 0.135 in.

#### Pair

#### **Pair Color Code Chart:**

Number	Color
1	Black & Red

# **Mechanical Characteristics (Overall)**

Operating Temperature Range:	-20°C To +75°C
UL Temperature Rating:	60°C
Bulk Cable Weight:	14 lbs/1000 ft.
Max. Recommended Pulling Tension:	27 lbs.
Min. Bend Radius/Minor Axis:	1.500 in.

# Applicable Specifications and Agency Compliance (Overall)

## **Applicable Standards & Environmental Programs**

NEC/(	UL) S	Specification:	CMR
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# **Detailed Specifications & Technical Data**

### **ENGLISH MEASUREMENT VERSION**



## 9451 Multi-Conductor - Single-Pair Cables

CEC/C(UL) Specification:	CMG
EU Directive 2011/65/EU (ROHS II):	Yes
EU CE Mark:	Yes
EU Directive 2000/53/EC (ELV):	Yes
EU Directive 2002/95/EC (RoHS):	Yes
EU RoHS Compliance Date (mm/dd/yyyy):	01/01/2004
EU Directive 2002/96/EC (WEEE):	Yes
EU Directive 2003/11/EC (BFR):	Yes
CA Prop 65 (CJ for Wire & Cable):	Yes
MII Order #39 (China RoHS):	Yes
Flame Test	
UL Flame Test:	UL1666 Vertical Shaft
CSA Flame Test:	FT4
Plenum/Non-Plenum	
Plenum (Y/N):	No

## **Electrical Characteristics (Overall)**

Nom. Characteristic Impedance:

Impedance (Ohm)
45

Nom. Inductance:



Nom. Capacitance Conductor to Conductor:



Nom. Capacitance Cond. to Other Conductor & Shield:



Nominal Velocity of Propagation:



**Nominal Delay:** 



Nom. Conductor DC Resistance:



Nominal Outer Shield DC Resistance:

DCR @ 20°C	(Ohm/1000 ft)
14.3	

Max. Operating Voltage - UL:

Voltage 300 V RMS

Max. Recommended Current:

Current
2.9 Amps per conductor @ 25°C

## **Notes (Overall)**

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# **Detailed Specifications & Technical Data**





## 9451 Multi-Conductor - Single-Pair Cables

**Notes:** The jacket and shield are bonded so both can be removed on automatic stripping equipment. Drain wire is inside foil shield. For cross-connect use with 1814R (et. al.) Snake Cables.

## **Put Ups and Colors:**

Item #	Putup	Ship Weight	Color	Notes	Item Desc
9451 N3UU1000	1,000 FT	16.000 LB	GREEN, MIL		2 #22 PP FS PVC FR
9451 N3U5000	5,000 FT	70.000 LB	GREEN, MIL	CN	2 #22 PP FS PVC FR
9451 001U1000	1,000 FT	16.000 LB	BROWN		2 #22 PP FS PVC FR
9451 0015000	5,000 FT	70.000 LB	BROWN	CN	2 #22 PP FS PVC FR
9451 002U1000	1,000 FT	16.000 LB	RED		2 #22 PP FS PVC FR
9451 0025000	5,000 FT	75.000 LB	RED	CN	2 #22 PP FS PVC FR
9451 003U1000	1,000 FT	16.000 LB	ORANGE		2 #22 PP FS PVC FR
9451 0035000	5,000 FT	75.000 LB	ORANGE	CN	2 #22 PP FS PVC FR
9451 004U1000	1,000 FT	16.000 LB	YELLOW		2 #22 PP FS PVC FR
9451 0045000	5,000 FT	75.000 LB	YELLOW	CN	2 #22 PP FS PVC FR
9451 006U1000	1,000 FT	16.000 LB	BLUE, LIGHT		2 #22 PP FS PVC FR
9451 0065000	5,000 FT	75.000 LB	BLUE, LIGHT	CN	2 #22 PP FS PVC FR
9451 007U1000	1,000 FT	16.000 LB	VIOLET		2 #22 PP FS PVC FR
9451 0075000	5,000 FT	75.000 LB	VIOLET	CN	2 #22 PP FS PVC FR
9451 008T1000	1,000 FT	16.000 LB	GRAY		2 #22 PP FS PVC FR
9451 008U1000	1,000 FT	16.000 LB	GRAY		2 #22 PP FS PVC FR
9451 008U500	500 FT	8.500 LB	GRAY		2 #22 PP FS PVC FR
9451 008500	500 FT	8.000 LB	GRAY		2 #22 PP FS PVC FR
9451 0085000	5,000 FT	75.000 LB	GRAY	CN	2 #22 PP FS PVC FR
9451 009U1000	1,000 FT	16.000 LB	WHITE		2 #22 PP FS PVC FR
9451 0095000	5,000 FT	75.000 LB	WHITE	CN	2 #22 PP FS PVC FR
9451 010U1000	1,000 FT	16.000 LB	BLACK		2 #22 PP FS PVC FR
9451 0101000	1,000 FT	16.000 LB	BLACK		2 #22 PP FS PVC FR
9451 0105000	5,000 FT	75.000 LB	BLACK	CN	2 #22 PP FS PVC FR

#### Notes:

C = CRATE REEL PUT-UP.

N = FINAL PUT-UP LENGTH MAY VARY -0% TO +10% FROM LENGTH SHOWN.

Revision Number: 1 Revision Date: 08-08-2012

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