

## 8428 Multi-Conductor - Two-Conductor, Low-Impedance Cable



For more Information  
please call

1-800-Belden1



### General Description:

18 AWG stranded (41x34) High-conductivity TC conductors, EPDM rubber insulation, rayon braid, TC braid shield (85% coverage), cotton wrap, CPE jacket.

### Physical Characteristics (Overall)

#### Conductor

AWG:

# Conductors	AWG	Stranding	Conductor Material	Dia. (mm)
2	18	41x34	High Conductivity TC - Tinned Copper	1.1938

Total Number of Conductors: 2

#### Insulation

Insulation Material:

Insulation Material	Dia. (mm)
EPDM - Ethylene Propylene Diene Monomer Rubber	2.540

#### Outer Shield

Outer Shield Material:

Type	Outer Shield Material	Coverage (%)
Braid	TC - Tinned Copper	85

Outer Shield Separator Material: Cotton Wrap

#### Outer Jacket

Outer Jacket Material:

Outer Jacket Material
CPE

#### Overall Cable

Overall Cabling Color Code Chart:

Number	Color
1	White
2	Black

Overall Cabling Separator Material: Rayon Braid

Overall Nominal Diameter: 7.366 mm

### Mechanical Characteristics (Overall)

Operating Temperature Range: -30°C To +60°C

Non-UL Temperature Rating: 60°C

Bulk Cable Weight: 80.363 Kg/Km

Max. Recommended Pulling Tension: 613.852 N

Min. Bend Radius/Minor Axis: 76.200 mm

### Applicable Specifications and Agency Compliance (Overall)

#### Applicable Standards & Environmental Programs

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

EU CE Mark: Yes

## 8428 Multi-Conductor - Two-Conductor, Low-Impedance Cable

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

### Plenum/Non-Plenum

Plenum (Y/N):	No
---------------	----

### Electrical Characteristics (Overall)

#### Nom. Characteristic Impedance:

Impedance (Ohm)

50

#### Nom. Inductance:

Inductance (µH/m)

0.62339

#### Nom. Capacitance Conductor to Conductor:

Capacitance (pF/m)

114.835

#### Nom. Capacitance Cond. to Other Conductor & Shield:

Capacitance (pF/m)

196.86

#### Nom. Conductor DC Resistance:

DCR @ 20°C (Ohm/km)

22.3108

#### Nominal Outer Shield DC Resistance:

DCR @ 20°C (Ohm/km)

8.8587

#### Max. Operating Voltage - Non-UL:

Voltage

600 V RMS

#### Max. Recommended Current:

Current

5.2 Amps per conductor @ 25°C

### Put Ups and Colors:

Item #	Putup	Ship Weight	Color	Notes	Item Desc
8428 010U500	152 MT	12.927 KG	BLACK		2 #18 EPDM BRD CPE
8428 010100	30 MT	2.812 KG	BLACK		2 #18 EPDM BRD CPE
8428 0101000	305 MT	26.308 KG	BLACK	C	2 #18 EPDM BRD CPE
8428 010500	152 MT	13.154 KG	BLACK	C	2 #18 EPDM BRD CPE

#### Notes:

C = CRATE REEL PUT-UP.

Revision Number: 2    Revision Date: 09-24-2012

© 2013 Belden, Inc  
All Rights Reserved.

Although Belden makes every reasonable effort to ensure their accuracy at the time of this publication, information and specifications described herein are subject to error or omission and to change without notice, and the listing of such information and specifications does not ensure product availability.

## 8428 Multi-Conductor - Two-Conductor, Low-Impedance Cable

Belden provides the information and specifications herein on an "AS IS" basis, with no representations or warranties, whether express, statutory or implied. In no event will Belden be liable for any damages (including consequential, indirect, incidental, special, punitive, or exemplary damages) whatsoever, even if Belden has been advised of the possibility of such damages, whether in an action under contract, negligence or any other theory, arising out of or in connection with the use, or inability to use, the information or specifications described herein.

All sales of Belden products are subject to Belden's standard terms and conditions of sale. Belden believes this product to be in compliance with EU RoHS (Directive 2002/95/EC, 27-Jan-2003). Material manufactured prior to the compliance date may be in stock at Belden facilities and in our Distributor's inventory. The information provided in this Product Disclosure, and the identification of materials listed as reportable or restricted within the Product Disclosure, is correct to the best of Belden's knowledge, information, and belief at the date of its publication. The information provided in this Product Disclosure is designed only as a general guide for the safe handling, storage, and any other operation of the product itself or the one that it becomes a part of. This Product Disclosure is not to be considered a warranty or quality specification. Regulatory information is for guidance purposes only. Product users are responsible for determining the applicability of legislation and regulations based on their individual usage of the product. Belden declares this product to be in compliance with EU LVD (Low Voltage Directive 73/23/EEC), as amended by directive 93/68/EEC.