



**Part Number: 9913**

Low Loss 50 Ohm, RG8, #10

## Product Description

10 AWG solid .108" bare copper conductor, semi-solid polyethylene insulation, Duobond® II, tinned copper braid shield (90% coverage), PVC jacket.

## Technical Specifications

### Product Overview

Environmental Space:	Indoor (Not Riser or Plenum)
Suitable Applications:	Low Loss RG-8 50 Ohm Wireless & Antenna

### Physical Characteristics (Overall)

#### Conductor

AWG	Stranding	Material	Nominal Diameter	No. of Coax
10	Solid	BC - Bare Copper	0.108 in	1

Conductor Count:	1
Conductor Size:	10 AWG

#### Insulation

Material	Nominal Diameter
Semi-Solid PE - Semi-Solid Polyethylene	0.286 in

#### Outer Shield Material

Type	Layer	Material	Material Trade Name	Coverage [%]
Tape	1	Aluminum/Polyester/Aluminum	Bonded Duofoil®	100 %
Braid	2	TC - Tinned Copper		90 %

#### Outer Jacket Material

Material	Nominal Diameter
PVC - Polyvinyl Chloride	0.405 in

### Electrical Characteristics

#### Conductor DCR

Nominal Conductor DCR	Nominal Outer Shield DCR	Outer Conductor DCR
0.9 Ohm/1000ft	1.8 Ohm/1000ft	1.8 Ohm/1000ft

#### Capacitance

Nom. Capacitance Conductor to Shield
24.6 pF/ft

#### Inductance

Nominal Inductance
0.059 µH/ft

#### Impedance

Nominal Characteristic Impedance
50 Ohm

### High Frequency (Nominal/Typical)

Frequency [MHz]	Nom. Insertion Loss
5 MHz	0.4 dB/100ft
10 MHz	0.5 dB/100ft
50 MHz	1 dB/100ft
100 MHz	1.4 dB/100ft
200 MHz	1.8 dB/100ft
400 MHz	2.6 dB/100ft
700 MHz	3.6 dB/100ft
900 MHz	4.1 dB/100ft
1000 MHz	4.4 dB/100ft

### Delay

Nominal Delay	Nominal Velocity of Propagation (VP) [%]
1.2 ns/ft	84 %

### Power Rating

Frequency [MHz]	Max. Power Rating [W]
5 MHz	4,021 W
10 MHz	3,217 W
50 MHz	1,609 W
100 MHz	1,149 W
200 MHz	894 W
400 MHz	619 W
700 MHz	447 W
900 MHz	393 W
1,000 MHz	366 W

### Voltage

Non-UL Voltage Rating
600 V RMS

### Temperature Range

Non-UL Temp Rating:	75°C
Operating Temp Range:	-40°C To +80°C

### Mechanical Characteristics

Bulk Cable Weight:	107 lbs/1000ft
Max Recommended Pulling Tension:	300 lbs
Min Bend Radius/Minor Axis:	4 in

### Standards

CPR Euroclass:	Eca
RG Type:	8/U Type

### 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 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

### Plenum/Non-Plenum

Plenum (Y/N):	No
Plenum Number:	89913

## Part Number

---

### Variants

Item #	Color	Footnote
9913 010100	Black	C
9913 0101000	Black	C
9913 010250	Black	C
9913 010500	Black	C
9913 0105000	Black	C

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

### Product Notes

---

Notes:	Recommend use of 7810R, 7810A, 9913F7, or 9914 for applications above 1 GHz.
--------	--

© 2019 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 here in are subject to error or omission and to change without notice, and the listing of such information and specifications does not ensure product availability.

Belden provides the information and specifications herein on an "ASIS" 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 all applicable environmental programs as listed in the data sheet. The information provided is correct to the best of Belden's knowledge, information and belief at the date of its publication. This information 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. The 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.