



**Product:** [9913F7](#)

Low Loss 52 Ohm, RG8, Flexible 10 AWG Stranded BC, Foil + Braid, Belflex® Jacket

## Product Description

Low Loss, RG-8/U type, 10 AWG stranded (7x19) .108" bare copper conductor, gas-injected foam HDPE insulation, Duobond® II, tinned copper braid shield (95% coverage), Belflex® jacket.

## Technical Specifications

### Physical Characteristics (Overall)

#### Conductor

AWG	Stranding	Material	Nominal Diameter	No. of Coax
10	7x19	BC - Bare Copper	0.108 in	1

Conductor Count:	1
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#### Insulation

Material	Nominal Diameter
PE - Polyethylene (Foam)	0.285 in

Insulation, Table Note:	Gas Injected
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#### Outer Shield Material

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

#### Outer Jacket Material

Material	Material Trade Name	Nominal Diameter
PVC - Polyvinyl Chloride	Belflex®	0.405 in

### Electrical Characteristics

#### Conductor DCR

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

#### Capacitance

Nom. Capacitance Conductor to Shield
22.5 pF/ft

#### Inductance

Nominal Inductance
0.059 µH/ft

#### Impedance

Nominal Characteristic Impedance
52 Ohm

#### High Frequency (Nominal/Typical)

Frequency [MHz]	Nom. Insertion Loss
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10 MHz	0.6 dB/100ft
50 MHz	1.1 dB/100ft
100 MHz	1.5 dB/100ft
200 MHz	2 dB/100ft
400 MHz	3 dB/100ft
700 MHz	4 dB/100ft
900 MHz	4.7 dB/100ft
1000 MHz	5 dB/100ft
2000 MHz	7.5 dB/100ft
2250 MHz	8 dB/100ft
3000 MHz	9.8 dB/100ft
4000 MHz	12.1 dB/100ft

#### Delay

Nominal Delay	Nominal Velocity of Propagation (VP) [%]
1.2 ns/ft	85 %

#### High Freq

Frequency [MHz]	Max. Insertion Loss (Attenuation)
10 MHz	0.7 dB/100ft
50 MHz	1.3 dB/100ft
100 MHz	1.8 dB/100ft
200 MHz	2.4 dB/100ft
400 MHz	3.4 dB/100ft
700 MHz	4.6 dB/100ft
900 MHz	5.3 dB/100ft
1000 MHz	5.6 dB/100ft
2000 MHz	8.2 dB/100ft
2250 MHz	8.9 dB/100ft
3000 MHz	10.9 dB/100ft
4000 MHz	13.6 dB/100ft

#### Power Rating

Frequency [MHz]	Max. Power Rating [W]	Nominal Power Rating [W]
5 MHz	3,217 W	3,217 W
10 MHz	2,681 W	2,681 W
50 MHz	1,463 W	1,463 W
100 MHz	1,073 W	1,073 W
200 MHz	805 W	805 W
400 MHz	575 W	575 W
700 MHz	424 W	424 W
1,000 MHz	350 W	366 W
1,500 MHz	278 W	350 W
2,000 MHz	237 W	278 W
3,000 MHz	188 W	252 W
4,000 MHz	157 W	237 W
2,500 MHz		210 W
3,000 MHz		188 W
4,000 MHz		157 W

#### Voltage

Non-UL Voltage Rating
300 V RMS

#### VSWR

Frequency [MHz]
5-2250 MHz

Electrical Characteristics Notes: Actual Impedance specification is 51.5 +/- 2 ohms.

#### Temperature Range

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

## Mechanical Characteristics

Bulk Cable Weight:	94 lbs/1000ft
Max Recommended Pulling Tension:	210 lbs
Min Bend Radius/Minor Axis:	3 in

## Standards

RG Type:	8/U Type
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## Applicable Environmental and Other Programs

Environmental Space:	Indoor (Not Riser or Plenum)
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:	No
EU RoHS Compliance Date (yyyy-mm-dd):	2004-01-01
MII Order #39 (China RoHS):	Yes

## Suitability

Suitability - Indoor:	Yes
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## Plenum/Non-Plenum

Plenum (Y/N):	No
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## Part Number

### Variants

Item #	Color	Putup Type	Length	UPC
9913F7 B59100	Black, Matte	Reel	100 ft	612825261728
9913F7 B59250	Black, Matte	Reel	250 ft	612825261742
9913F7 B59500	Black, Matte	Reel	500 ft	612825261773
9913F7 B591000	Black, Matte	Reel	1,000 ft	612825261735

Footnote:	C - CRATE REEL PUT-UP.
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## Product Notes

Notes:	Low Loss, High Flex
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## History

Update and Revision:	Revision Number: 0.285 Revision Date: 04-28-2020
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