Detailed Specifications & Technical Data





7810WB Coax - RG-8 Type



For more Information please call

1-800-Belden1



General Description:

RG-8 type, 10 AWG solid .108" bare copper-covered aluminum conductor, gas-injected foam HDPE insulation, Duobond® II + tinned copper braid shield (95% coverage), flooded water-resistant polyethylene jacket.

Dhusical Characteristics (Quarall)	
Physical Characteristics (Overall) Conductor	
AWG:	
# Coax AWG Stranding Conductor Material	Dia. (mm)
1 10 Solid BCCA - Bare Copper Covered Aluminur	n 2.7432
Total Number of Conductors:	1
Insulation	
Insulation Material: Insulation Material Dia. (mm	
Gas-injected FHDPE - Foam High Density Polyethylene 7.239	
Outer Shield Outer Shield Material:	
Layer # Outer Shield Trade Name Type Outer Shield Material	Coverage (%)
	Polyester Tape-Aluminum Foil 100
2 Braid TC - Tinned Copper	95
Outer Shield Flooding Grease:	PO - Polyolefin
Outer Jacket	
Outer Jacket Material Outer Jacket Material	
PE - Polyethylene	
Overall Cable	
Overall Nominal Diameter:	10.236 mm
Mechanical Characteristics (Overall)	
Operating Temperature Range:	-40°C To +75°C
Non-UL Temperature Rating:	0°08
Bulk Cable Weight:	108.639 Kg/Km
Max. Recommended Pulling Tension:	667.230 N
Min. Bend Radius/Minor Axis:	101.600 mm
Applicable Specifications and Agency Compliance (Overall)
Applicable Standards & Environmental Programs	
EU Directive 2011/65/EU (ROHS II):	Yes
EU CE Mark:	No
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
RG Type:	8/U
Series Type:	RF 400

Detailed Specifications & Technical Data

METRIC MEASUREMENT VERSION



7810WB Coax - RG-8 Type

uitability Suitability		
	/ - Outdoor:	
Suitability		
Suitability - Aerial:		
Suitability - Burial:		
lenum/Non-		
Plenum (Y	Y/N):	
ectrical Cl	haracteristics (Ov	
	eristic Impedance:	
Impedance	(Ohm)	
50		
om. Inductane		
0.19686	(µm/m)	
	Ince Conductor to Shiel	
Capacitance		
75.463		
ominal Veloci	ity of Propagation:	
VP (%)		
86		
ominal Delay:	:	
Delay (ns/m	ו)	
3.83877		
	or DC Resistance:	
	C (Ohm/km)	
4.39654		
	Shield DC Resistance:	
DCR @ 20°0	C (Ohm/km)	
6.562		
aximum VSW		
Description	Freq. (MHz) Start Free 5	
om. Attenuati		
om. Attenuati		
	ion:	
Freq. (MHz)	ion: Attenuation (dB/100m)	
Freq. (MHz) 30	ion: Attenuation (dB/100m) 2.2967	
Freq. (MHz)	ion: Attenuation (dB/100m)	
Freq. (MHz) 30 50	ion: Attenuation (dB/100m) 2.2967 2.9529	
Freq. (MHz) 30 50 150	ion: Attenuation (dB/100m) 2.2967 2.9529 4.9215	
Freq. (MHz) 30 50 150 220 450 900	ion: Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678	
Freq. (MHz) 30 50 150 220 450 900 1500	ion: Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331	
Freq. (MHz) 30 50 150 220 450 900 1500 1800	ion: Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736	
Freq. (MHz) 30 50 150 220 450 900 1500 1800 2000	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686	
Freq. (MHz) 30 50 150 220 450 900 1500 1800 2000 2500	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827	
Freq. (MHz) 30 50 150 220 450 900 1500 1800 2000 2500 3000	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686	
Freq. (MHz) 30 50 150 220 450 900 1500 1800 2000 2500	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075	
Freq. (MHz) 30 50 150 220 450 900 1500 1800 2000 2500 3000 3500	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695	
Freq. (MHz) 30 50 150 220 450 900 1500 1800 2500 2500 3000 3500 4500	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500 5800 6000	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500 5800 6000 ax. Power Ra Freq. (MHz) 30	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500 5800 6000 ax. Power Ra Freq. (MHz) 30 50	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034 ating: Rating (W) 3427 2588	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500 5800 6000 ax. Power Ra Freq. (MHz) 30 50 150	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034 ating: Rating (W) 3427 2588 1428	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500 5800 6000 ax. Power Ra Freq. (MHz) 30 50 150 220	Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034 ating: Rating (W) 3427 2588 1428 1195	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500 5800 6000 ax. Power Ra Freq. (MHz) 30 50 150 220 450	ion: Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034 atting: Rating (W) 3427 2588 1428 1195 817	
Freq. (MHz) 30 50 150 220 450 900 1500 2500 3000 3500 4500 5800 6000 ax. Power Ra Freq. (MHz) 30 50 150 220 450 900	ion: Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034 atting: Rating (W) 3427 2588 1428 1195 817 575	
Freq. (MHz) 30 50 150 220 450 900 1500 1800 2000 2500 3000 3500 4500 5800 6000 x. Power Ra Freq. (MHz) 30 50 150 220 450	ion: Attenuation (dB/100m) 2.2967 2.9529 4.9215 5.9058 8.8587 12.4678 16.7331 18.3736 19.686 21.9827 24.6075 26.9042 31.1695 36.4191 37.4034 atting: Rating (W) 3427 2588 1428 1195 817	

Detailed Specifications & Technical Data

METRIC MEASUREMENT VERSION



7810WB Coax - RG-8 Type

3500	282
4500	247
5800	217
6000	213

Max. Operating Voltage - Non-UL:

Voltage 300 V RMS

Sweep Test Sweep Testing:

100% Sweep tested to 6 GHz.

Misc. Information (Overall)

Notes (Overall)

Notes: 100% Sweep tested. 6 GHz. Belden® The Wire in Wireless®

Put Ups and Colors:

Item #	Putup	Ship Weight	Color	Notes	Item Desc
7810WB 0101000	1,000 FT	82.000 LB	BLACK	С	RF400 WIRELESS 50 OHM COAX WB
7810WB 010500	500 FT	40.500 LB	BLACK	С	RF400 WIRELESS 50 OHM COAX WB

Notes:

C = CRATE REEL PUT-UP.

Revision Number: 4 Revision Date: 10-17-2012

© 2015 Belden, Inc All Rights Reserved

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. 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-Lan-2003). Material manufactured prior to the compliance date may be in stock at Belden facilities and in our Distributor's inventory. The information, and belief at the date of its publication. The information provided in this 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 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.