



Part Number: 1505F

Serial Digital Coax, RG59, Flexible 22 AWG Stranded BC, Double TC Braid, CM PVC Jacket

Product Description

Low Loss Serial Digital Coax, RG-59/U Type, CM-Rated, 22 AWG stranded bare compacted copper conductor, foam HDPE core, double 95% tinned copper braid, flexible PVC jacket

Technical Specifications

Product Overview

Environmental Space:	Indoor (Not Riser or Plenum)
----------------------	------------------------------

Physical Characteristics (Overall)

Conductor

AWG	Stranding	Material	Nominal Diameter	No. of Coax
22	7x29	BCC - Bare Compacted Copper	0.032 in	1

Conductor Count:	1
------------------	---

Insulation

Material	Nominal Diameter
Gas-injected FHDPE - Foam High Density Polyethylene	0.145 in

Outer Shield Material

Type	Layer	Material	Coverage [%]
Braid	1	TC - Tinned Copper	95 %
Braid	2	TC - Tinned Copper	95 %

Outer Jacket Material

Material	Nominal Diameter
PVC - Polyvinyl Chloride	0.242 in

Electrical Characteristics

Conductor DCR

Nominal Conductor DCR	Nominal Outer Shield DCR	Outer Conductor DCR
12.2 Ohm/1000ft	2.4 Ohm/1000ft	2.4 Ohm/1000ft

Capacitance

Nom. Capacitance Conductor to Shield
17 pF/ft

Inductance

Nominal Inductance
0.094 μ H/ft

Impedance

Nominal Characteristic Impedance
75 Ohm

Return Loss (RL)

Frequency [MHz]	Minimum Return (RL)
5 - 850 MHz	20 dB
850 - 6000 MHz	15 dB

High Frequency (Nominal/Typical)

Frequency [MHz]	Nom. Insertion Loss
1 MHz	0.2 dB/100ft
3.6 MHz	0.5 dB/100ft
5 MHz	0.6 dB/100ft
6 MHz	0.67 dB/100ft
7 MHz	0.73 dB/100ft
10 MHz	0.9 dB/100ft
12 MHz	0.98 dB/100ft
25 MHz	1.44 dB/100ft
55 MHz	2.2 dB/100ft
67.5 MHz	2.4 dB/100ft
71.5 MHz	2.5 dB/100ft
88.5 MHz	2.8 dB/100ft
100 MHz	3 dB/100ft
135 MHz	3.5 dB/100ft
143 MHz	3.6 dB/100ft
180 MHz	4.1 dB/100ft
270 MHz	5.1 dB/100ft
360 MHz	6 dB/100ft
540 MHz	7.5 dB/100ft
720 MHz	8.9 dB/100ft
750 MHz	9.1 dB/100ft
1000 MHz	10.8 dB/100ft
1500 MHz	13.6 dB/100ft
2000 MHz	16.1 dB/100ft
2250 MHz	17.3 dB/100ft
3000 MHz	20.7 dB/100ft
4500 MHz	26.7 dB/100ft
6000 MHz	32.2 dB/100ft

Delay

Nominal Delay	Nominal Velocity of Propagation (VP) [%]
1.3 ns/ft	80 %

Voltage

UL Voltage Rating
300 V RMS

Temperature Range

Non-UL Temp Rating:	75°C
UL Temp Rating:	60°C
Operating Temp Range:	-35°C To +75°C

Mechanical Characteristics

Bulk Cable Weight:	42 lbs/1000ft
Max Recommended Pulling Tension:	73 lbs
Min Bend Radius/Minor Axis:	2.5 in

Standards

NEC/(UL) Specification:	CM
CEC/C(UL) Specification:	CM
RG Type:	59/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 2015/863/EU:	Yes
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)
EU CE Mark:	Yes
EU RoHS Compliance Date (yyyy-mm-dd):	2005-01-01
CA Prop 65 (CJ for Wire & Cable):	Yes
MII Order #39 (China RoHS):	Yes

Suitability

Suitability - Indoor:	Yes
-----------------------	-----

Flammability, LS0H, Toxicity Testing

UL Flammability:	UL1685 UL Loading
UL voltage rating:	300 V RMS

Plenum/Non-Plenum

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

Part Number

Variants

Item #	Color	UPC	Length	Footnote
1505F B591000	Black, Matte	612825356295	1,000 ft	C
1505F G7X1000	Blue, Matte	612825356417	1,000 ft	C
1505F G7W1000	Green, Matte	612825358367	1,000 ft	C
1505F G8L1000	Orange, Matte	612825356509	1,000 ft	C
1505F G7V1000	Red, Matte	612825356288	1,000 ft	C
1505F Z4B1000	Violet Z4B	612825356493	1,000 ft	
1505F G7Y1000	White, Matte	612825356363	1,000 ft	C
1505F 0041000	Yellow	612825356486	1,000 ft	C

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

History

Update and Revision:	Revision Number: 0.277 Revision Date: 08-22-2019
----------------------	--

© 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.