

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
Conductor Size:	22 AWG

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 µH/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	Footnote
1505F B591000	Black, Matte	C
1505F G7X1000	Blue, Matte	C
1505F G7W1000	Green, Matte	C
1505F G8L1000	Orange, Matte	C
1505F G7V1000	Red, Matte	C
1505F Z4B1000	Violet Z4B	
1505F G7Y1000	White, Matte	C
1505F 0041000	Yellow	C

Footnote:	C - CRATE REEL PUT-UP.

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