Detailed Specifications & Technical Data

ENGLISH MEASUREMENT VERSION



1694F Coax - Low Loss Serial Digital Coax



For more Information please call

1-800-Belden1



General Description:

19 AWG stranded (7x27) bare copper conductor, gas-injected foam HDPE insulation, double tinned copper braid shield (95% coverage), PVC jacket.

Physical Characteristics (Overall) Conductor AWG: # Coax AWG Stranding Conductor Material Dia. (in.) 19 7x27 BC - Bare Copper .040 **Total Number of Conductors:** 1 Insulation Insulation Material: **Insulation Material** Dia. (in.) Gas-injected FHDPE - Foam High Density Polyethylene | .180 **Outer Shield** Outer Shield Material: Layer # Type Outer Shield Material Coverage (%) Braid | TC - Tinned Copper | 95.000 Braid TC - Tinned Copper **Outer Jacket Outer Jacket Material:**

Outer Jacket Material
PVC - Polyvinyl Chloride

Overall Cable

Overall Nominal Diameter: 0.276 in.

Me	Mechanical Characteristics (Overall)			
	Operating Temperature Range:	-30°C To +75°C		
	UL Temperature Rating:	75°C		
	Bulk Cable Weight:	50 lbs/1000 ft.		
	Max. Recommended Pulling Tension:	116 lbs.		
	Min. Bend Radius/Minor Axis:	2.750 in.		

Applicable Specifications and Agency Compliance (Overall)

Applicable Standards & Environmental Programs

NEC/(UL) Specification:	CMR
CEC/C(UL) Specification:	CMG
EU Directive 2011/65/EU (ROHS II):	Yes
EU CE Mark:	Yes
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:	6/U

Page 1 of 3 01-09-2015

Detailed Specifications & Technical Data

ENGLISH MEASUREMENT VERSION



1694F Coax - Low Loss Serial Digital Coax

Flame Test					
UL Flame Test:	UL1666 Vertical Shaft				
Suitability					
Suitability - Indoor:	Yes				
Plenum/Non-Plenum					
Plenum (Y/N):	No				
Plenum Number:	1695A				
Electrical Characteristics (Overall)					
Nom. Characteristic Impedance:					
Impedance (Ohm)					
75	75				
Nom. Inductance:					
Inductance (μH/ft) 0.106					
Nom. Capacitance Conductor to Shield:					
Capacitance (pF/ft) 16.2					
Nominal Velocity of Propagation:					
VP (%) 81					
Nominal Delay:					
Delay (ns/ft) 1.25					
Nom. Conductor DC Resistance:					
DCR @ 20°C (Ohm/1000 ft)					

No	om. At	tenuati	on:		
	Fred	(MHz)	Attenuation	(dB/100	ft 1

Nominal Outer Shield DC Resistance: DCR @ 20°C (Ohm/1000 ft)

Freq. (MHz)	Attenuation (dB/100 ft.)
1.000	0.240
3.580	0.450
5.000	0.540
6.000	0.550
7.000	0.620
10.000	0.720
12.000	0.830
25.000	1.180
67.500	1.900
71.500	2.000
88.500	2.200
100.000	2.400
135.000	2.800
143.000	2.900
180.000	3.300
270.000	4.000
360.000	4.700
540.000	5.900
720.000	6.900
750.000	7.000
1000.000	8.200
1500.000	10.400
2000.000	12.300
2250.000	13.200
3000.000	15.600
4500.000	19.800

Max. Operating Voltage - UL:



Max. Operating Voltage - Non-UL:

Page 2 of 3

Detailed Specifications & Technical Data

ENGLISH MEASUREMENT VERSION



1694F Coax - Low Loss Serial Digital Coax

Voltage 300 V RMS

> Other Electrical Characteristic 1: Impedance tested in accordance with ASTM D-4566 paragraph 43.2, option 2 using a 75 Ohm fixed bridge

and termination. 75 +/- 1.5 Ohms

Other Electrical Characteristic 2: Return Loss tested in accordance with ASTM D-4566 paragraph 45.3, using a 75 Ohm fixed bridge and

Minimum Return Loss:

Start Freq. (MHz)	Stop Freq. (MHz)	Min. RL (dB)
5	850	20
850	4500	15

Sweep Test

Sweep Testing: 100% Sweep tested 5 MHz to 4.5 GHz.

Put Ups and Colors:

Item #	Putup	Ship Weight	Color	Notes	Item Desc
1694F B59N1000	1,000 FT	53.000 LB	BLACK, MATTE		#19 GIFHDLDPE DBLB FRPVC
1694F B591000	1,000 FT	54.000 LB	BLACK, MATTE	С	#19 GIFHDLDPE DBLB FRPVC
1694F G7V1000	1,000 FT	54.000 LB	RED, MATTE	С	#19 GIFHDLDPE DBLB FRPVC
1694F G7W1000	1,000 FT	54.000 LB	GREEN, MATTE	С	#19 GIFHDLDPE DBLB FRPVC
1694F G7X1000	1,000 FT	54.000 LB	BLUE, MATTE	С	#19 GIFHDLDPE DBLB FRPVC
1694F G7Y1000	1,000 FT	54.000 LB	WHITE, MATTE	С	#19 GIFHDLDPE DBLB FRPVC
1694F G8L1000	1,000 FT	54.000 LB	ORANGE, MATTE	С	#19 GIFHDLDPE DBLB FRPVC
1694F G8M1000	1,000 FT	54.000 LB	YELLOW, MATTE	С	#19 GIFHDLDPE DBLB FRPVC
1694F Z4B1000	1,000 FT	54.000 LB	VIO Z4B	С	#19 GIFHDLDPE DBLB FRPVC

Notes:

C = CRATE REEL PUT-UP.

Revision Number: 11 Revision Date: 08-01-2013

© 2015 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 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-Jan-2003). Material manufactured prior to the compliance date may be in stock at Belden facilities and in our Distributor's inventory. 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 designed only as a general guide for the safe handling, storage, and any other operation of the product users are responsible for determining the applicability of legislation and regulations based on their individual usage of the product

product.
Belden declares this product to be in compliance with EU LVD (Low Voltage Directive 73/23/EEC), as amended by directive 93/68/EEC.

Page 3 of 3