# **Detailed Specifications & Technical Data**



ENGLISH MEASUREMENT VERSION

### 1694A Coax - Low Loss Serial Digital Coax



For more Information please call

1-800-Belden1



### **General Description:**

RG-6/U Type, 18 AWG solid .040" bare copper conductor, gas-injected foam HDPE insulation, Duofoil® + tinned copper braid shield (95% coverage), PVC jacket.

Dhusiaalu	Characteristics (Over		
Conducto	Characteristics (Over	all)	
AWG:	-		
	AWG Stranding Conduct		
1	18 Solid BC - Bare	e Copper .040	
Total N	Number of Conductors:		1
Insulation	n n Material:		
	ation Material	Dia. (in.)	
Gas-in	njected FHDPE - Foam High D		
Outer Shi	eld		
	nield Material:		
Layer	r # Outer Shield Trade Name Duofoil®	Type         Outer Shield Material           Tape         Aluminum Foil-Polyester	Coverage (%)
2		Braid TC - Tinned Copper	95
Outer Jac		<u>1 1</u>	
	cket Material:		
	Jacket Material		
PVC -	- Polyvinyl Chloride		
Overall Ca			
Overal	II Nominal Diameter:		0.274 in.
Mechanic	cal Characteristics (O	verall)	
Operat	ting Temperature Range:		-30°C To +75°C
Bulk C	Cable Weight:		41 lbs/1000 ft.
Max. R	Recommended Pulling Tensio	on:	69 lbs.
Min. B	end Radius/Minor Axis:		2.750 in.
Applicabl	le Specifications and	Agency Compliance (O	Dverall)
	e Standards & Environm		
NEC/(L	UL) Specification:		CMR
CEC/C	C(UL) Specification:		CMG
EU Dir	rective 2011/65/EU (ROHS II):		Yes
EU CE	Mark:		Yes
EU Dir	rective 2000/53/EC (ELV):		Yes
EU Dir	rective 2002/95/EC (RoHS):		Yes
EU Ro	HS Compliance Date (mm/do	i/yyyy):	01/01/2004
EU Dir	rective 2002/96/EC (WEEE):		Yes
EU Dir	rective 2003/11/EC (BFR):		Yes
CA Pro	op 65 (CJ for Wire & Cable):		Yes
MII Oro	der #39 (China RoHS):		Yes
RG Ty	pe:		6/U
Elamo Tos	ot.		

Flame Test

UL1666 Vertical Shaft

# **Detailed Specifications & Technical Data**





## 1694A Coax - Low Loss Serial Digital Coax

CSA Flam	e Test:		FT4
itability			
Suitability	- Indoor:		Yes
Suitability	- Outdoor:		Yes - Black only.
Suitability			Yes - Black only, when supported by messenger wire.
Suitability			No
enum/Non-	-Plenum		
Plenum (Y	(/N):		No
Plenum N	umber:		1695A
	haracteristics (Ove	rall)	
	ristic Impedance:		
Impedance 75	(Onm)		
m. Inductan			
Inductance	(µH/ft)		
0.106			
•	nce Conductor to Shield		
Capacitance	e (pF/ft)		
16.2			
minal Veloci	ity of Propagation:		
VP (%)			
82			
minal Delay:	:		
Delay (ns/ft)	_		
1.24			
	or DC Resistance:		
m. Conducto			
m. Conducto DCR @ 20°0	or DC Resistance: C (Ohm/1000 ft)		
m. Conducto DCR @ 20°0 6.4	C (Ohm/1000 ft)		
m. Conducto DCR @ 20°0 6.4 minal Outer	C (Ohm/1000 ft) Shield DC Resistance:		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C	C (Ohm/1000 ft)		
m. Conducto DCR @ 20°0 6.4 minal Outer	C (Ohm/1000 ft) Shield DC Resistance:		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion:		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz)	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.)		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.) 0.240		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000 3.580	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.) 0.240 0.440		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000 3.580 5.000	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.) 0.240 0.440 0.520		
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m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000 3.580 5.000 6.000 7.000	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.) 0.240 0.440 0.520 0.570 0.610		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000 3.580 5.000 6.000 7.000 10.000	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.) 0.240 0.440 0.520 0.570 0.610 0.710		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000 3.580 5.000 6.000 7.000 10.000 12.000	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.) 0.240 0.240 0.440 0.520 0.570 0.610 0.710 0.780		
m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000 3.580 5.000 6.000 7.000 10.000 12.000 25.000	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) ion: Attenuation (dB/100 ft.) 0.240 0.240 0.440 0.520 0.570 0.610 0.710 0.780 1.080		
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m. Conducto DCR @ 20°C 6.4 minal Outer DCR @ 20°C 2.8 m. Attenuati Freq. (MHz) 1.000 3.580 5.000 6.000 7.000 10.000 12.000 125.000 67.500 71.500 88.500 100.000 135.000 135.000 143.000 135.000 270.000 360.000 540.000 720.000 750.000 1500.000 2000.000	C (Ohm/1000 ft) Shield DC Resistance: C (Ohm/1000 ft) 0.240 0.440 0.440 0.520 0.570 0.610 0.710 0.780 1.080 1.080 1.650 2.240 2.240 2.240 2.240 2.240 2.240 2.570 3.170 3.690 4.600 5.380 5.500 6.420 7.990 9.370		

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### 1694A Coax - Low Loss Serial Digital Coax

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
	termination.

Minimum Return Loss:

Start Freq. (MHz)	Stop Freq. (MHz)	Min. RL (dB)
5.000	1600.000	23.000
1600.000	4500.000	21.000

Sweep Test

Sweep Testing:

100% Sweep tested 5 MHz to 4.5 GHz.

#### Misc. Information (Overall)

#### Notes (Overall)

Notes: Also available in bundled versions. See 7710A through 7713A.

#### Put Ups and Colors:

Item #	Putup	Ship Weight	Color	Notes	Item Desc
1694A N3UN1000	1,000 FT	45.000 LB	GREEN, MIL		#18 PE/GIFHDPE SH FR PVC
1694A N3U1000	1,000 FT	45.000 LB	GREEN, MIL	С	#18 PE/GIFHDPE SH FR PVC
1694A N3U5000	5,000 FT	225.000 LB	GREEN, MIL	CN	#18 PE/GIFHDPE SH FR PVC
1694A 0011000	1,000 FT	45.000 LB	BROWN	С	#18 PE/GIFHDPE SH FR PVC
1694A 0015000	5,000 FT	225.000 LB	BROWN	CN	#18 PE/GIFHDPE SH FR PVC
1694A 0021000	1,000 FT	45.000 LB	RED	С	#18 PE/GIFHDPE SH FR PVC
1694A 0025000	5,000 FT	225.000 LB	RED	CN	#18 PE/GIFHDPE SH FR PVC
1694A 0031000	1,000 FT	45.000 LB	ORANGE	С	#18 PE/GIFHDPE SH FR PVC
1694A 004N1000	1,000 FT	45.000 LB	YELLOW		#18 PE/GIFHDPE SH FR PVC
1694A 0041000	1,000 FT	45.000 LB	YELLOW	С	#18 PE/GIFHDPE SH FR PVC
1694A 0061000	1,000 FT	45.000 LB	BLUE, LIGHT	С	#18 PE/GIFHDPE SH FR PVC
1694A 0065000	5,000 FT	225.000 LB	BLUE, LIGHT	CN	#18 PE/GIFHDPE SH FR PVC
1694A 0071000	1,000 FT	45.000 LB	VIOLET	С	#18 PE/GIFHDPE SH FR PVC
1694A 0075000	5,000 FT	225.000 LB	VIOLET	CN	#18 PE/GIFHDPE SH FR PVC
1694A 0081000	1,000 FT	45.000 LB	GRAY	С	#18 PE/GIFHDPE SH FR PVC
1694A 0085000	5,000 FT	225.000 LB	GRAY	CN	#18 PE/GIFHDPE SH FR PVC
1694A 009N1000	1,000 FT	45.000 LB	WHITE		#18 PE/GIFHDPE SH FR PVC
1694A 0091000	1,000 FT	45.000 LB	WHITE	С	#18 PE/GIFHDPE SH FR PVC
1694A 010N1000	1,000 FT	45.000 LB	BLACK		#18 PE/GIFHDPE SH FR PVC
1694A 0101000	1,000 FT	45.000 LB	BLACK	С	#18 PE/GIFHDPE SH FR PVC
1694A 010500	500 FT	22.500 LB	BLACK	С	#18 PE/GIFHDPE SH FR PVC
1694A 0105000	5,000 FT	225.000 LB	BLACK	CN	#18 PE/GIFHDPE SH FR PVC

#### Notes:

C = CRATE REEL PUT-UP.

N = FINAL PUT-UP LENGTH MAY VARY -0% TO +10% FROM LENGTH SHOWN.

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