Detailed Specifications & Technical Data

ENGLISH MEASUREMENT VERSION



4855R Coax - Sub-Miniature

For more Information please call

1-800-Belden1



General Description:

12 GHz, 4K UHD Precision Video Cable, 75 Ohm, 23 AWG solid .023" silver plated copper conductor, gas-injected foam HDPE insulation, Duofoil® bonded to the core + tinned copper braid shield (95% coverage), PVC jacket.

Usage (Overall)

Suitable Applications: SMPTE 2082-1 12 Gb/s UHDTV, SMPTE 2081-1 6 Gb/s UHDTV, SMPTE 424M 3 Gb/s HD-SDI 1080p

Physical Characteristics (Overall)

Conductor

AWG:

# Coax	AWG	Stranding	Conductor Material	Dia. (in.)
1	23	Solid	SPC - Silver Plated Copper	0.023

Total Number of Conductors:

Insulation

Insulation Material:

Insulation Material	Dia. (in.)
Gas-injected FHDPE - Foam High Density Polyethylene	.102

Outer Shield

Outer Shield Material:

Layer #	Outer Shield Trade Name	Type	Outer Shield Material	Coverage (%)
1	Bonded Duofoil®	Таре	Aluminum Foil-Polyester Tape-Aluminum Foil	100.000
2		Braid	TC - Tinned Copper	95.000

Outer Jacket

Outer Jacket Material:

Outer Jacket Material
PVC - Polyvinyl Chloride

Overall Cable

Overall Nominal Diameter: 0.159 in.

Mechanical Characteristics (Overall)

Operating Temperature Range:	-30°C To +75°C
Bulk Cable Weight:	17 lbs/1000 ft.
Max. Recommended Pulling Tension:	40 lbs.
Min. Bend Radius/Minor Axis:	1.600 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):	11/08/2016
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

Page 1 of 3 03-13-2017

Detailed Specifications & Technical Data





4855R Coax - Sub-Miniature

RG Type:	Sub-miniature 59/U		
Flame Test			
UL Flame Test:	UL1666 Vertical Shaft		
CSA Flame Test:	FT4		
Suitability			
Suitability - Indoor:	Yes		
Suitability - Outdoor:	Yes - Black only.		
Suitability - Aerial:	Yes - Black only, when supported by messenger wire.		
Suitability - Burial:	No		
Plenum/Non-Plenum			
Plenum (Y/N):	No		

Electrical Characteristics (Overall)

Nom. Characteristic Impedance:



Nom. Inductance:



Nom. Capacitance Conductor to Shield:



Nominal Velocity of Propagation:



Nominal Delay:



Nom. Conductor DC Resistance:

DCR @ 20°C (Ohm/1000 ft) 19.700

Nominal Outer Shield DC Resistance:

DCR @ 20°C (Ohm/1000 ft) 3.900

Nom. Attenuation:

Freq. (MHz)	Attenuation (dB/100 ft.)
1.000	0.390
3.580	0.780
5.000	0.920
6.000	1.000
7.000	1.080
10.000	1.200
12.000	1.300
25.000	1.800
55.000	2.600
67.500	2.830
71.500	2.930
88.500	3.220
100.000	3.390
135.000	3.840
143.000	4.000
180.000	4.410
270.000	5.440
360.000	6.340
540.000	7.850
720.000	9.090
750.000	9.280
1000.000	10.800
1500.000	13.200
2000.000	15.300
2250.000	16.300

Page 2 of 3 03-13-2017

Detailed Specifications & Technical Data

ENGLISH MEASUREMENT VERSION



4855R Coax - Sub-Miniature

3000.000	19.000
4500.000	23.600
6000.000	27.700
12000.000	41.200

Max. Operating Voltage - UL:

Voltage 300 V RMS

Minimum Return Loss:

Start Freq. (MHz)	Stop Freq. (MHz)	Min. RL (dB)
5.000	1600.000	23.000
1600.000	4500.000	21.000
4500.000	12000.000	15.000

Sweep Test

Sweep Testing: Sweep tested 5 MHz to 12 GHz.

Notes (Overall)

Notes: Print legend includes sequential footage marks

Put Ups and Colors:

Item #	Putup	Ship Weight	Color	Notes	Item Desc
4855R N3U1000	1,000 FT	19.000 LB	GREEN, MIL		#23 PE/GIFHDPE SH PVC
4855R 0021000	1,000 FT	19.000 LB	RED		#23 PE/GIFHDPE SH PVC
4855R 0031000	1,000 FT	19.000 LB	ORANGE		#23 PE/GIFHDPE SH PVC
4855R 0041000	1,000 FT	19.000 LB	YELLOW		#23 PE/GIFHDPE SH PVC
4855R 0061000	1,000 FT	19.000 LB	BLUE, LIGHT		#23 PE/GIFHDPE SH PVC
4855R 0071000	1,000 FT	19.000 LB	VIOLET		#23 PE/GIFHDPE SH PVC
4855R 0101000	1,000 FT	19.000 LB	BLACK		#23 PE/GIFHDPE SH PVC
4855R 0105000	5,000 FT	90.000 LB	BLACK	CZ	#23 PE/GIFHDPE SH PVC

Notes:

C = CRATE REEL PUT-UP.

Z = FINAL PUT-UP LENGTH MAY VARY (+ OR -) 10% FOR SPOOLS OR REELS AND(+ OR -) 5% FOR UNREEL CARTONS FROM LENGTH SHOWN.

Revision Number: 1 Revision Date: 03-10-2017

© 2017 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 sales 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 bublication. 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.

Belden declares this product to be in compliance with EU LVD (Low Voltage Directive 2014/35/EU).

Page 3 of 3