



Product: [4505R](#)

4K UHD Coax for 12G-SDI, 75 Ohm, RG-59, 20 AWG Solid SC, Foil + 95% TC Braid, PVC Jkt, CMR

Product Description

75 Ohm SDI Coax, RG-59, 20 AWG Solid Silvered Copper Conductor, PE Insulation, Foil + 95% Tinned Copper Braid Shield, PVC Jacket, CMR

Technical Specifications

Product Overview

Suitable Applications:	Ultra-High Definition Digital Video, 4K Single-link 12 Gb/s UHDTV, 4K D-Cinema, 8K Quad-link UHDTV, HD-SDI 1080p
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Construction Details

RG Type:	59
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Conductor

AWG	Stranding	Nom. Diameter	Material
20	Solid	0.032 in	SC - Silvered Copper

Insulation

Material	Nom. Diameter
PE - Polyethylene (Foam)	0.145 in

Outer Shield Material

Layer	Outer Shield Type	Material	Material Trade Name	Coverage
1	Tape	Tri-Laminate (Alum+Poly+Alum)	Duobond® II	100%
2	Braid	Tinned Copper (TC)		95%

Outer Jacket Material

Material	Nom. Diameter
PVC - Polyvinyl Chloride	0.233 in

Electrical Characteristics

Return Loss (RL)

Frequency [MHz]	Min. Return Loss [dB]
5 - 1600 MHz	23 dB
1600 - 4500 MHz	21 dB
4500 - 12000 MHz	15 dB

Attenuation

Frequency	Nom. Attenuation [dB/100ft]
1 MHz	0.30 dB/100ft
3.58 MHz	0.60 dB/100ft
5 MHz	0.63 dB/100ft
6 MHz	0.69 dB/100ft
7 MHz	0.74 dB/100ft
10 MHz	0.90 dB/100ft
12 MHz	0.91 dB/100ft
25 MHz	1.30 dB/100ft

55 MHz	1.98 dB/100ft
67.5 MHz	2.05 dB/100ft
71.5 MHz	2.1 dB/100ft
88.5 MHz	2.2 dB/100ft
100 MHz	2.3 dB/100ft
135 MHz	2.7 dB/100ft
143 MHz	2.8 dB/100ft
180 MHz	3.1 dB/100ft
270 MHz	3.8 dB/100ft
360 MHz	4.4 dB/100ft
540 MHz	5.5 dB/100ft
720 MHz	6.4 dB/100ft
750 MHz	6.5 dB/100ft
1000 MHz	7.6 dB/100ft
1500 MHz	9.3 dB/100ft
2000 MHz	10.8 dB/100ft
2250 MHz	11.5 dB/100ft
3000 MHz	13.4 dB/100ft
4500 MHz	16.7 dB/100ft
6000 MHz	19.7 dB/100ft
12000 MHz	28.7 dB/100ft

Electricals

Nom. Conductor DCR	Nom. Outer Shield DCR	Nom. Capacitance Cond-to-Shield	Nom. Impedence	Nom. Velocity
10.1 Ohm/1000ft	3.4 Ohm/1000ft	16.1 pF/ft	75 Ohm	83%

Voltage

UL Voltage Rating
300 V (CMR, CMG)

Mechanical Characteristics

Temperature

UL Rating	Operating
60°C	-20°C to +75°C

Bend Radius

Installation Min.
2.3 in

Bulk Cable Weight:	31 lbs/1000ft
Max. Pull Tension:	52 lbs

Standards and Compliance

Environmental Suitability:	Indoor - Riser, Indoor, UV Resistance
Sustainability:	CA Prop 65
Flammability / Fire Resistance:	UL1666 Vertical Shaft, FT4
NEC / UL Compliance:	CMR
CEC / C(UL) Compliance:	CMG
European Directive Compliance:	EU CE Mark, EU Directive 2015/863/EU (RoHS 2 amendment), EU Directive 2011/65/EU (RoHS 2), EU Directive 2012/19/EU (WEEE)
APAC Compliance:	China RoHS II (GB/T 26572-2011)
Non-Plenum Number:	4505P

History

Update and Revision:	Revision Number: 0.279 Revision Date: 05-26-2021
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