



Description:

18 AWG solid .040" bare copper-covered steel conductor, gas-injected foam polyethylene insulation, Duobond® III + aluminum braid shield (77% coverage), PVC jacket.

Physical Characteristics (Overall)

Conductor

AWG:

# Coax	AWG	Stranding	Conductor Material	Dia. (in.)
1	18	Solid	BCCS - Bare Copper Covered Steel	.040

Insulation

Insulation Material:

Insulation Material	Dia. (in.)
Gas-injected FPE - Foam Polyethylene	.180

Outer Shield

Outer Shield Material:

Layer #	Outer Shield Trade Name	Type	Outer Shield Material	Coverage (%)
1	Bonded Duofoil®	Tape	Bonded Aluminum Foil-Polyester Tape-Aluminum Foil	100
2		Braid	AL - Aluminum	77
3	Duofoil®	Tape	Aluminum Foil-Polyester Tape-Aluminum Foil	100

Outer Jacket

Outer Jacket Material:

Outer Jacket Material
PVC - Polyvinyl Chloride

Overall Cabling

Overall Nominal Diameter: 0.275 in.

Mechanical Characteristics (Overall)

Operating Temperature Range: -40°C To +80°C

UL Temperature Rating: 80°C

Bulk Cable Weight: 30 lbs/1000 ft.

Max. Recommended Pulling Tension: 138 lbs.

Min. Bend Radius (Install)/Minor Axis: 3 in.

Applicable Specifications and Agency Compliance (Overall)

Applicable Standards & Environmental Programs

NEC/(UL) Specification: CATV, CM

CEC/C(UL) Specification: CM

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

Series Type: Series 6

Flame Test

UL Flame Test: UL1685 UL Loading

Plenum/Non-Plenum

Plenum (Y/N): No

Electrical Characteristics (Overall)

Nom. Characteristic Impedance:

Impedance (Ohm)	Tolerance (Ohms)
75	± 3

Nom. Inductance:

Inductance (µH/ft)
.097

Nom. Capacitance Conductor to Shield:

Capacitance (pF/ft)
16.2

Nominal Velocity of Propagation:

VP (%)
83

Nominal Delay:

Delay (ns/ft)
1.2

Nom. Conductor DC Resistance:

DCR @ 20°C (Ohm/1000 ft)
28.0

Nominal Outer Shield DC Resistance:

DCR @ 20°C (Ohm/1000 ft)
5.6

Max. Attenuation:

Freq. (MHz)	Attenuation (dB/100 ft.)
5	0.67
55	1.60
211	2.87
270	3.24
300	3.43
350	3.72
400	4.00
450	4.26
550	4.71
750	5.59
870	6.00
1000	6.54

Max. Operating Voltage - UL:

Voltage
300 V RMS

Minimum Structural Return Loss:

Description	Freq. (MHz)	Start Freq. (MHz)	Stop Freq. (MHz)	Min. SRL (dB)
		5	1000	20

Sweep Test

Sweep Testing: 5 MHz to 1 GHz

Put Ups and Colors:

Item #	Putup	Ship Weight	Color	Notes	Item Desc
1613A Q5HU1000	1,000 FT	30.000 LB	WHITE, NEUTRAL		#18 GIFHLDPE SH FS PVC
1613A 009B700	700 FT	19.600 LB	WHITE		#18 GIFHLDPE SH FS PVC
1613A 009U1000	1,000 FT	30.000 LB	WHITE		#18 GIFHLDPE SH FS PVC
1613A 010B700	7,000 FT	196.000 LB	BLACK		#18 GIFHLDPE SH FS PVC
1613A 010U1000	1,000 FT	30.000 LB	BLACK		#18 GIFHLDPE SH FS PVC
1613A 0101000	1,000 FT	30.000 LB	BLACK		#18 GIFHLDPE SH FS PVC

Broadband Coax

CATV Cables

Series 6

Description	Part No.	UL NEC/ C(UL) CEC Type	Standard Lengths		Standard Unit Weight		Conductor (stranding) Diameter Nom. DCR	Nominal Core OD		Shielding Materials Nom. DCR	Nominal OD		Nom. Imp. (Ω)	Nom. Vel. of Prop.	Nominal Capacitance		Nominal Attenuation		
			Ft.	m	Lbs.	kg		Inch	mm		Inch	mm			pF/Ft.	pF/m	MHz	dB/100 Ft.	dB/100m

Series 6 • 18 AWG Solid .040" Bare Copper-covered Steel Conductor(s) • Duobond® III + Aluminum Braid Shield (77% Coverage)

Gas-injected Foam Polyethylene Insulation • Black PVC Jacket

80°C	1613A	NEC: B-700 [▲] CATV U-1000 [▲] CM 1000 CEC: U-304.8 CM 304.8	B-213.0	19.6	8.9	18 AWG (solid) .040"	.180	4.57	Duobond III* + 77% Aluminum Braid	.278	7.06	75	83%	16.2	53.1	See Chart on page 6.92		
			U-304.8	31.0	14.1	28.0Ω/M' 91.9Ω/km			5.6Ω/M' 18.4Ω/km									

[▲]B-700 also available in White. U-1000 ft. also available in White and White Neutral.

80°C	1615AM	—	1000	304.8	44.0	20.0	18 AWG (solid) .040"	.180	4.57	Duobond III* + 77% Aluminum Braid	.275 x	6.99 x	75	83%	16.2	53.1	See Chart on page 6.92		
							28.0Ω/M' 91.9Ω/km			.416	10.57								

Sweep tested 5 MHz to 1 GHz.

.051" (1.3mm) galvanized steel messenger.

80°C	1616AM	—	1000	304.8	45.0	20.4	18 AWG (solid) .040"	.180	4.57	Duobond III* + 77% Aluminum Braid	.275 x	6.99 x	75	83%	16.2	53.1	See Chart on page 6.92		
							28.0Ω/M' 91.9Ω/km			.416	10.57								

CoreGuard®
Min. bend radius for minor axis only.

.051" (1.3mm) galvanized steel messenger.

Gas-injected Foam Polyethylene Insulation • Polyethylene Jacket (Black or Orange)

Burial 80°C	1614A	—	1000	304.8	27.0	12.3	18 AWG (solid) .040"	.180	4.57	Duobond III* + 77% Aluminum Braid	.275	6.99	75	83%	16.2	53.1	See Chart on page 6.92		
							28.0Ω/M' 91.9Ω/km			5.6Ω/M' 18.4Ω/km									

CoreGuard®

BCCS = Bare Copper-covered Steel • DCR = DC Resistance

*Duobond III = Bonded Duofoil® (100% coverage) + aluminum braid (67% coverage) + Duofoil (100% coverage).

Technical Information**Attenuation vs. Frequency for Belden® Broadband Coaxial Products**

Frequency Point (MHz)	Series 59				Series 6				Series 11			
	Nominal dB/100 Ft.	Nominal dB/100m	Maximum dB/100 Ft.	Maximum dB/100m	Nominal dB/100 Ft.	Nominal dB/100m	Maximum dB/100 Ft.	Maximum dB/100m	Nominal dB/100 Ft.	Nominal dB/100m	Maximum dB/100 Ft.	Maximum dB/100m
5	.75	2.46	.89	2.92	.54	1.77	.67	2.20	.34	1.12	.38	1.25
55	1.84	6.04	1.95	6.40	1.45	4.76	1.60	5.25	.91	2.99	.97	3.18
211	3.36	11.02	3.59	11.78	2.64	8.66	2.87	9.42	1.68	5.51	1.81	5.94
216	3.41	11.19	3.69	12.11	2.67	8.76	2.95	9.68	1.70	5.58	1.84	6.04
240	3.57	11.71	3.87	12.70	2.80	9.19	3.09	10.14	1.78	5.84	1.94	6.36
270	3.79	12.43	4.05	13.29	2.97	9.74	3.24	10.63	1.89	6.20	2.05	6.73
300	3.99	13.09	4.27	14.01	3.13	10.27	3.43	11.25	1.99	6.53	2.15	7.05
325	4.16	13.65	4.50	14.76	3.26	10.70	3.59	11.78	2.07	6.79	2.24	7.35
350	4.33	14.21	4.64	15.22	3.39	11.12	3.72	12.20	2.15	7.05	2.32	7.61
375	4.49	14.73	4.84	15.88	3.52	11.55	3.87	12.70	2.22	7.28	2.40	7.87
400	4.66	15.29	4.88	16.01	3.65	11.97	4.00	13.12	2.30	7.55	2.47	8.10
450	4.96	16.27	5.30	17.39	3.88	12.73	4.26	13.98	2.45	8.04	2.65	8.69
500	5.22	17.13	5.50	18.04	4.09	13.42	4.48	14.70	2.59	8.50	2.85	9.35
550	5.48	17.98	5.90	19.36	4.30	14.11	4.71	15.45	2.73	8.96	2.94	9.65
600	5.75	18.86	6.18	20.28	4.51	14.80	4.94	16.21	2.85	9.35	3.08	10.10
650	6.03	19.78	6.52	21.39	4.72	15.49	5.18	16.99	2.98	9.78	3.22	10.56
700	6.28	20.60	6.83	22.41	4.92	16.14	5.45	17.88	3.10	10.17	3.37	11.06
750	6.51	21.36	6.96	22.83	5.11	16.76	5.59	18.34	3.21	10.53	3.50	11.48
800	6.71	22.01	7.30	23.95	5.27	17.29	5.75	18.86	3.32	10.89	3.65	11.97
862	6.97	22.87	7.50	24.61	5.47	17.95	5.98	19.62	3.46	11.35	3.82	12.53
870	7.00	22.97	7.54	24.74	5.49	18.01	6.00	19.68	3.48	11.42	3.84	12.60
900	7.14	23.42	7.79	25.56	5.60	18.37	6.11	20.05	3.55	11.65	3.96	12.99
950	7.39	24.25	7.90	25.92	5.79	19.00	6.35	20.83	3.66	12.01	4.10	13.45
1000	7.68	25.20	8.09	26.54	5.99	19.65	6.54	21.46	3.77	12.37	4.23	13.88
1450	—	—	—	—	7.80	25.60	8.00	26.20	5.00	16.41	5.50	18.10
1800	—	—	—	—	8.60	28.20	8.80	28.90	5.70	18.70	6.27	20.60
2250	—	—	—	—	9.80	32.20	10.00	32.80	6.50	21.33	7.15	23.50
3000	—	—	—	—	11.30	37.10	11.90	39.00	8.00	26.25	8.80	28.90