

Product: [9850](#) 

MIL-DTL-17, RG216, 18 AWG TC, Double Braid Shield, CMH



Product Description

RG-216, 18 awg stranded (7x26) .048" tinned copper conductor, solid polyethylene insulation, double bare copper braid shield (95% coverage), CMH, non-contaminating PVC jacket.

Technical Specifications

Physical Characteristics (Overall)

Conductor

AWG	Stranding	Material	Nominal Diameter	No. of Coax
18	7x26	TC - Tinned Copper	0.048 in	1

Conductor Count:	1
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Insulation

Material	Nominal Diameter
PE - Polyethylene	0.285 in

Outer Shield Material

Type	Layer	Material	Coverage [%]
Braid	1	Bare Copper (BC)	95%
Braid	2	Bare Copper (BC)	95%

Outer Jacket Material

Material	Nominal Diameter
PVC - Polyvinyl Chloride (Non-Contaminating)	0.425 in

Electrical Characteristics

Conductor DCR

Nominal Conductor DCR	Nominal Outer Shield DCR	Outer Conductor DCR
6.1 Ohm/1000ft	0.8 Ohm/1000ft	0.8 Ohm/1000ft

Capacitance

Nom. Capacitance Conductor to Shield
20.5 pF/ft

Inductance

Nominal Inductance
0.17 μ H/ft

Impedance

Nominal Characteristic Impedance
75 Ohm

High Frequency (Nominal/Typical)

Frequency [MHz]	Nom. Insertion Loss
1 MHz	0.2 dB/100ft

10 MHz	0.7 dB/100ft
50 MHz	1.3 dB/100ft
100 MHz	2.0 dB/100ft
200 MHz	2.9 dB/100ft
400 MHz	4.2 dB/100ft
700 MHz	5.8 dB/100ft
900 MHz	6.8 dB/100ft
1000 MHz	7.1 dB/100ft
2000 MHz	10.0 dB/100ft
3000 MHz	13.0 dB/100ft

Delay

Nominal Delay	Nominal Velocity of Propagation (VP) [%]
1.54 ns/ft	66%

Power Rating

Frequency [MHz]	Max. Power Rating [W]
100 MHz	650 W
400 MHz	270 W
1,000 MHz	150 W
2,000 MHz	90 W
3,000 MHz	70 W

Voltage

Non-UL Voltage Rating
3700 V RMS

Temperature Range

Non-UL Temp Rating:	60°C
UL Temp Rating:	80°C
Operating Temp Range:	-40°C To +80°C

Mechanical Characteristics

Bulk Cable Weight:	122 lbs/1000ft
Max. Pull Tension:	181 lbs
Min Bend Radius/Minor Axis:	4.25 in

Standards

NEC/(UL) Compliance:	CMH
CEC/C(UL) Compliance:	CMH
CPR Euroclass:	Eca
RG Type:	216/U Type
Military Compliance:	MIL-DTL-17, M17/77-RG216, QPL
Qualified Products List (QPL):	Yes

Applicable Environmental and Other Programs

Environmental Space:	Indoor Rated (Not Riser or Plenum)
EU Directive 2000/53/EC (ELV):	Yes
EU Directive 2011/65/EU (ROHS II):	Yes
EU Directive 2012/19/EU (WEEE):	Yes
EU Directive 2015/863/EU:	Yes
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)
EU RoHS Compliance Date (yyyy-mm-dd):	2005-10-01
MII Order #39 (China RoHS):	Yes

Suitability

Suitability - Aerial:	Yes - Black only, when supported by messenger wire
Suitability - Burial:	No
Suitability - Hazardous Locations:	No
Suitability - Indoor:	Yes

Suitability - Outdoor:	Yes - Black only
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Flammability, LSOH, Toxicity Testing

CSA Flammability:	FT1
IEC Flammability:	IEC 60332-1-2

Plenum/Non-Plenum

Plenum (Y/N):	No
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Part Number

Variants

Item #	Color	Putup Type	Length	UPC
9850 0101000	Black	Reel	1,000 ft	612825259688

Footnote:	C - CRATE REEL PUT-UP.
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History

Update and Revision:	Revision Number: 0.226 Revision Date: 09-30-2020
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