



Part Number: 7919A

Cat 5e MSHA DataTuff®, (4 pr) 24 AWG Solid BC, PO/PVC, Foil Shld, CMR, CMX-Outdoor

# **Product Description**

Four Cat 5e 24 AWG solid bare copper conductors, twisted pairs, polyolefin insulation, overall Beldfoil® shield (100% coverage), PVC jacket.

# **Product Specifications**

### **Technical Specifications**

Suitable Applications:	Industrial Ethernet Cable, Harsh Environments, 100MHz Category 5e, Gigabit Ethernet, 100BaseTX, 100BaseVG ANYLAN, 155ATM, 622ATM, NTSC/PAL Component or Composite Video, AES/EBU Digital Audio, RS-422, CMX - Outdoor, RJ-45 Compatible, Noisy Environments	
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### **Construction and Dimensions**

#### Conductor:

AWG	Stranding	Material	No. of Pairs
24	Solid	BC - Bare Copper	4
Total Number	Total Number of Conductors:		

#### Insulation:

Material	Nominal Wall Thickness
PO - Polyolefin	0.01 in

#### Color Chart 1:

Number	Color
1	White/Blue Stripe & Blue
2	White/Orange Stripe & Orange
3	White/Green Stripe & Green
4	White/Brown Stripe & Brown

#### Outershield 1:

Туре	Material	Material Trade Name	Coverage [%]	Drainwire Material	Drainwire AWG	Drainwire Construction n x D
Таре	Aluminum Foil-Polyester Tape	Beldfoil®	100 %	TC - Tinned Copper	24	7x32 mm

## Outerjacket 1:

Material	Nominal Diameter	Ripcord
Industrial Grade PVC - Polyvinyl Chloride	0.265 in	No

# **Electrical Characteristics**

#### Conductor DCR:

Max. Conductor DCR	Max. DCR Unbalance
9.38 Ohm/1000ft	3 %

# Capacitance:

Max. Capacitance Unbalance	Nom.Mutual Capacitance				
330 pF/ft	15 pF/ft				

### Delay:

Max. Delay	Max. Delay Skew	Nominal Velocity of Propagation (VP) [%]
538 @ 100MHz ns/100m	45 ns/100m	70 %

### High Freq:

Frequency [MHz]	Max. Insertion Loss (Attenuation)	Min. NEXT [dB]	Min. PSNEXT [dB]	Min. ACR [dB]	Min. PSACR [dB]	Min. ACRF (ELFEXT) [dB]	Min. PSACRF (PSELFEXT) [dB]	Min. RL (Return Loss) [dB]	Min. SRL (Structural Return Loss)	Max./Min. Input Impedance (unFitted)	Max./Min. Fitted Impedance
1 MHz	2 db/100m	65.3 dB	62.3 dB	63 dB	60 dB	63.8 dB	60.8 dB	20 dB	23 dB	100 ± 15 Ohm	
4 MHz	4.1 db/100m	56.3 dB	53.3 dB	51 dB	49 dB	51.7 dB	48.7 dB	23 dB	23 dB	100 ± 15 Ohm	
8 MHz	5.8 db/100m	51.8 dB	48.8 dB	46 dB	43 dB	45.7 dB	42.7 dB	24.5 dB	24.5 dB	100 ± 15 Ohm	
10 MHz	6.5 db/100m	50.3 dB	47.3 dB	43 dB	41 dB	43.8 dB	40.8 dB	25 dB	25 dB	100 ± 15 Ohm	
16 MHz	8.2 db/100m	47.3 dB	44.3 dB	39 dB	36 dB	39.7 dB	36.7 dB	25 dB	25 dB	100 ± 15 Ohm	
20 MHz	9.3 db/100m	45.8 dB	42.8 dB	36.5 dB	33.5 dB	37.7 dB	34.7 dB	25 dB	25 dB	100 ± 15 Ohm	
25 MHz	10.4 db/100m	44.3 dB	41.3 dB	33.9 dB	30.9 dB	35.8 dB	32.8 dB	24.3 dB	24.3 dB	100 ± 15 Ohm	
31.25 MHz	11.7 db/100m	42.9 dB	39.9 dB	31 dB	28 dB	33.9 dB	30.9 dB	23.6 dB	23.6 dB	100 ± 15 Ohm	
62.5 MHz	17 db/100m	38.4 dB	35.4 dB	22 dB	19 dB	27.8 dB	24.8 dB	21.5 dB	21.5 dB	100 ± 15 Ohm	
100 MHz	22 db/100m	35.3 dB	32.3 dB	14 dB	11 dB	23.8 dB	20.8 dB	20.1 dB	20.1 dB	100 ± 15 Ohm	100 ± 15 Ohm
1 MHz											
4 MHz											
8 MHz											
10 MHz											
16 MHz											
20 MHz											
25 MHz											
31.25 MHz											
62.5 MHz											
100 MHz											

# Voltage:

UL Voltage Rating	
300 V RMS	

# Use

Suitability - Oil Resistance:	Yes
Suitability - Outdoor:	Yes
Suitability - Sunlight Resistance:	Yes
Max Recommended Pulling Tension:	25 lbs

# Safety

CSA Flammability:	FT4
UL Flammability:	UL1666 Riser

### **Temperature Range**

Installation Temp Range:	-25°C To +75 °C
Operating Temp Range:	-40°C To +75°C

## **Mechanical Characteristics**

Min Bend Radius/Minor Axis:	1 in

#### **Part Number**

Plenum (Y/N):	No

# Standards

ISO/IEC Compliance:	Other Standards	
Telecommunications Standards:	Telecommunications Standards	
CA Prop 65 (CJ for Wire & Cable):	CA Prop 65 (CJ for Wire & Cable)	
CEC/C(UL) Specification:	CEC/C(UL) Specification	
MII Order #39 (China RoHS):	MII Order #39 (China RoHS)	
NEC/(UL) Specification:	NEC/(UL) Specification	
Other Specification:	Other Specification	
PMSHA Specification:	PMSHA Specification	
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)	

### **History**

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Notes:	Operating temperatures are subject to length de-rating. Cable passes -40°C Cold Bend per UL 1581.

## **Product Variants**

Part Number	Color	Put-Up Type	Length
7919A 0061000	BLUE	Reel	1000 ft
7919A 0101000	BLACK	Reel	1000 ft
7919A 0102000	BLACK	Reel	2000 ft
7919A 0105000	BLACK	Reel	5000 ft

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