



Part Number: 7921A

Cat 5e Heavy Shielded DataTuff®, (4 pr) 24 AWG Solid BC, PO/PVC, Foil+TC Braid Shld, CMR, CMX-Outdoor

### **Product Description**

Four Cat 5e 24 AWG Bonded-Pairs solid bare copper conductors, polyolefin insulation, overall Beldfoil® (100%coverage) plus tinned copper braid shield (70% coverage), PVC jacket.

### **Product Specifications**

#### **AG.Filter Attributes**

Total Number of Conductors:	8

# **Application**

Suitable Applications:	Industrial Ethemet Cable, Harsh Environments, Category 5e, Gigabit Ethemet, 100BaseTX, 100BaseVG ANYLAN, 155ATM, 622ATM, NTSC/PAL Component or Composite Video, AES/EBU Digital Audio, AES51, RS-422, Noisy Environments, CMX - Outdoor, EtherNet/IP™
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# **Technical Specifications**

#### **AG 0401**

UL Flammability:	UL1666 Vertical Riser						
CSA Flammability:	FT4						

#### **APAC Standard**

MII Order #39 (China RoHS):	Yes

### **Applicable Patents**

Patent:	http://www.belden.com/p
Bend Radius	
Min Bend Radius/Minor Axis:	1.32 in
CCB-Sub-Part Number	
Plenum (Y/N):	No
Contact Information	
PHONE_NUM:	1-800-Belden1
Ell Dive ethics	
EU Directive	
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)
Global Standard	
Telecommunications Standards:	Telecommunications Standards
ISO/IEC Compliance:	Other Standards
North Arraniana Otanaland	
North American Standard	
CA Prop 65 (CJ for Wire & Cable):	Yes
CEC/C(UL) Specification:	CMR
NEC/(UL) Specification:	CMR, CMX-Outdoor
Other Specification:	Other Specification
Harrage A Attributes	
Unused Attributes	
Notes:	US Patent #'s 5606151; 5734126. EtherNet/IP is a trademark of ControlNet International, Ltd. under license by Open DeviceNet Vendor Association, Inc. Operating temperatures are subject to length de-rating. Cable passes -40C Cold Bend per UL 1581.
Use	
Suitability - Oil Resistance:	Yes
Suitability - Outdoor:	Yes
Suitability - Sunlight Resistance:	Yes
Max Recommended Pulling Tension:	75 lbs

### **Conductor DCR:**

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

### **Color Chart 1:**

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

### Delay:

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

# Voltage:

UL Voltage Rating	
300 V RMS V	

# High Freq:

Frequenc [MHz]	y Max. Insertion Loss (Attenuation)	Min. Min. NEXT PSNE [dB] [dB]		PSACR [dB]	Min. ACRF (ELFEXT) [dB]	Min. PSACRF (PSELFEXT [dB]	Min. RL (Return ) Loss) [dl	Min. SRL (Structura 3] Return Lo	l Impe	/Min. Input dance tted)	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	20 dB	100 ± 15 OI	nm
4 MHz	4.1 dB/100m	56.3 dB	53.3 dB	51 dB	49 dB	51.7 dB	48.7 dB	23.6 dB	23.6 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	25.4 dB	25.4 dB	100 ± 15 (	Ohm
10 MHz	6.5 dB/100m	50.3 dB	47.3 dB	43 d	B 41 dE	3 43.8 dB	40.8 dE	3 26 dB	26 dB	100 ± 15 C	)hm
16 MHz	8.2 dB/100m	47.3 dB	44.3 dB	39 d	B 36 dE	39.7 dB	36.7 dE	3 26 dB	26 dB	100 ± 15 C	)hm
20 MHz	9.3 dB/100m	45.8 dB	42.8 dB	36.5 dl	33.5	dB 37.7	dB 34.7	dB 26 dE	26 dB	100 ± 15 (	Ohm
25 MHz	10.4 dB/100m	44.3 dB	41.3 dB	33.9 dB	30.9 dl	B 35.8 dB	32.8 dB	25.5 dB	25.5 dB	100 ± 15	Ohm
31.25 MHz	11.7 dB/100	Om 42.9	) dB 39.9	9 dB 3	31 dB 28	33.9	dB 30.9	dB 25 dE	3 25 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	23.5 dB	23.5 dB	100 ± 15	Ohm
100 MHz	22 dB/100m	35.3 dB 32	.3 dB 14	dB 11 d	B 23.8 dl	B 20.8 dB	22.5 dB	22.5 dB	100 ± 15 Oh	ım 95-1	07 Ohm
1 MHz											
4 MHz		-									

8 MHz										
10 MHz										
16 MHz										
20 MHz								T		
25 MHz						T	T	T	Т	
31.25 MHz										$\overline{\square}$
62.5 MHz		T	T		Ī	T				$\overline{\square}$
100 MHz			T	T	T	Ť		$\overline{\top}$	T	$\overline{\Box}$

### Capacitance:

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

#### Insulation:

Material	Nominal Diameter	Nominal Wall Thickness	
PO - Polyolefin		0.046 in	0.012 in

# Outerjacket 1:

Material	Nominal Diameter	Nominal Wall Thickness	
Industrial Grade F	PVC - Polyvinyl Chloride	0.33 in 0.03 in	

#### **Conductor:**

AWG	Stranding	Material	No. of Pairs	
24	Solid	BC - Bare Copper		4

#### Outershield 1:

Туре	Layer	Material	Material Trade Name	Coverage	[%]	Orainwire	e Material	Drainwire AWG	Drainwire (	Constru	ction n x D
Tape	1 Alu	minum Foil	-Polyester Tape		Beldfoil	®	100 %	TC - Tinned Copper		26 S	olid mm
Braid		2	TC - Tinned Copper						70 %		

#### **Product Variants**

Part Number	Color	Put-Up Type	Length
7921A			
7921A	RED	Reel	305 m
7921A 0021000	RED	Reel	1000 ft
7921A			
7921A	BLUE, LIGHT	Reel	305 m
7921A 0061000	BLUE	Reel	1000 ft
7921A			
7921A	BLACK	Reel	305 m
7921A 0101000	BLACK	Reel	1000 ft
7921A			
7921A	BLACK	Reel	610 m
7921A 0102000	BLACK	Reel	2000 ft
7921A	BLACK	Reel	1524 m
7921A			
7921A	TEAL 1NH	Reel	305 m
7921A 1NH1000	TEAL	Reel	1000 ft
7921A			

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