

3076F Multi-Conductor - DataBus® ISA/SP-50 FOUNDATION Fieldbus or PROFIBUS Cable


 For more Information
 please call

1-800-Belden1

**Description:**

1 pair 18 AWG stranded (7x26) tinned copper conductors, polyolefin insulation, polyolefin filler, Beldfoil® shield (100% coverage), tinned copper drain wire, binder, PVC jacket. Fieldbus Foundation Registered Product.

Physical Characteristics (Overall)**Conductor****AWG:**

# Pairs	AWG	Stranding	Conductor Material	Dia. (in.)
1	18	7x26	TC - Tinned Copper	0.046

Insulation**Insulation Material:**

Insulation Material
PO - Polyolefin

Outer Shield**Outer Shield Material:**

Outer Shield Trade Name	Type	Outer Shield Material	Coverage (%)
Beldfoil®	Tape	Aluminum Foil-Polyester Tape	100

Outer Shield Drain Wire AWG:

AWG	Stranding	Drain Wire Conductor Material
20	7x28	TC - Tinned Copper

Outer Jacket**Outer Jacket Material:**

Outer Jacket Material
PVC - Polyvinyl Chloride

Outer Jacket Diameter:

Nom. Dia. (in.)
0.292

Overall Cabling

Overall Cabling Fillers: Polypropylene

Overall Cabling Lay Length & Direction:

Length (in.)	Twists (ft.)
2.250	5.300

Overall Nominal Diameter: 0.280 in.

Mechanical Characteristics (Overall)

Operating Temperature Range: -40°C To +105°C

UL Temperature Rating: 105°C

Bulk Cable Weight: 38 lbs/1000 ft.

Max. Recommended Pulling Tension: 60 lbs.

Min. Bend Radius (Install)/Minor Axis: 2.500 in.

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Applicable Specifications and Agency Compliance (Overall)

Applicable Standards & Environmental Programs

NEC/(UL) Specification:	CMR, PLTC-ER
NEC Articles:	725, 727, 800
CEC/C(UL) Specification:	CMG
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
Other Specification:	ITC-ER

Flame Test

UL Flame Test:	UL1666 Riser
C(UL) Flame Test:	FT4

Suitability

Suitability - Indoor:	Yes
Suitability - Outdoor:	Yes
Suitability - Burial:	Yes - UL
Sunlight Resistance:	Yes
Oil Resistance:	Yes

Plenum/Non-Plenum

Plenum (Y/N):	No
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Electrical Characteristics (Overall)

Unaveraged Impedance:

Freq. (MHz)	Impedance (Ohm)
0.031	100.000

Nom. Inductance:

Inductance (μH/ft)
.19

Nom. Capacitance Conductor to Shield:

Capacitance (pF/ft)
45.0

Nom. Mutual Capacitance:

Capacitance (pF/ft)
24.0

Maximum Capacitance Unbalance:

Capacitance (pF/ft)
1.200

Nominal Velocity of Propagation:

VP (%)
66

Nom. Conductor DC Resistance:

DCR @ 20°C (Ohm/1000 ft)

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5.86

Nominal Outer Shield DC Resistance:**DCR @ 20°C (Ohm/1000 ft)**

7.500

Nom. Attenuation:**Freq. (MHz) Attenuation (dB/100 ft.)**

0.039 0.080

Max. Attenuation:**() Freq. (MHz) Attenuation (dB/100 ft.)**

.091 0.039 0.091

Max. Operating Voltage - UL:**Voltage**

300 V RMS

Max. Recommended Current:**Description Current**

Per Conductor 5.2 Amps

Other Electrical Characteristic 1: Max Propagation Delay Change From 7.812 kHz to 39.06 kHz: 518 pS/ft**Other Electrical Characteristic 2:** 31.25 KBits/sec**Notes (Overall)****Notes:** Fieldbus: Orange jacket. Profibus PA: Intrinsically Safe Blue jacket. Jacket diameter tolerance: +/- .010**Related Documents:**[FieldbusCertificate-3076F.pdf](#) - This is a Foundation H1 Cable Registration Certification for 3076F.**Put Ups and Colors:**

Item #	Putup	Ship Weight	Color	Notes	Item Desc
3076F 0031000	1,000 FT	48.000 LB	ORANGE	C	TW PR #18 PP FS PVC
3076F 003250	250 FT	14.000 LB	ORANGE	C	TW PR #18 PP FS PVC
3076F 0032500	2,500 FT	120.000 LB	ORANGE	C	TW PR #18 PP FS PVC
3076F 003500	500 FT	25.500 LB	ORANGE	C	TW PR #18 PP FS PVC
3076F 0035000	5,000 FT	240.000 LB	ORANGE	C N	TW PR #18 PP FS PVC
3076F 0061000	1,000 FT	48.000 LB	BLUE, LIGHT	C	TW PR #18 PP FS PVC

Notes:

C = CRATE REEL PUT-UP.

N = FINAL PUT-UP LENGTH MAY VARY -0% TO +10% FROM LENGTH SHOWN.

Revision Number: 5 Revision Date: 06-16-2011

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