



**Product:** <u>1213</u> ☑

Category 5E+ Cable, 4 Pair, U/UTP, CMP

# **Product Description**

Category 5E+ Premise Horizontal Cable (350MHz), 4 Pair, 24 AWG Solid Bare Copper Conductors, U/UTP, Plenum-CMP, Flamarrest® PVC-LS Jacket

# **Technical Specifications**

# **Product Overview**

Suitable Applications:	Premise Horizontal Cable, Ethernet 1000BASE-T, Ethernet 100BASE-TX, Ethernet 10BASE-T, PoE++, PoE+, PoE
Patent:	This product has one or more applicable patents. More information on patents can be found at <a href="https://www.belden.com/resources/patents">https://www.belden.com/resources/patents</a> .

#### **Construction Details**

#### Conductor

Size	Stranding	Material	Number of Pairs
24 AWG	Solid	BC - Bare Copper	4

#### Insulation

Material	Color Code
PO+FEP - Polyolefin + Fluorinated Ethylene Propylene	White/Blue Stripe & Blue, White/Orange Stripe & Orange, White/Green Stripe & Green, White/Brown Stripe & Brown

# Outer Jacket

Material	Material Trade Name	Nom. Diameter	Ripcord
PVC - Polyvinyl Chloride	Flamarrest®	0.207 in (5.26 mm)	Yes
Overall Cable Diameter (Nominal):	0.207 in (5.26 mm)		

#### **Electrical Characteristics**

#### Electricals

Max. Conductor DCR	Max. Capacitance Unbalance
89 Ohm/km	330 pF/100m

#### Delay

Frequency	Max. Delay	Max. Delay Skew	Nom. Velocity of Prop.
100 MHz	537.6 ns/100m	25 ns/100m	72%

# High Frequency

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]	Max./Min. Input Impedance (unFitted)	Max./Min. Fitted Impedance
1	2.0 dB/100m	70.3	69.3	68.3	67.3	67.8	65.8	20.0	100 ± 15 Ohm	100 ± 15 Ohm
4	4.0 dB/100m	61.3	60.3	57.3	56.3	55.8	53.8	23.0	100 ± 15 Ohm	100 ± 15 Ohm
8	5.7 dB/100m	56.8	55.8	51.1	50.1	49.7	47.7	24.5	100 ± 15 Ohm	100 ± 15 Ohm
10	6.4 dB/100m	55.3	54.3	48.9	47.9	47.8	45.8	25.0	100 ± 15 Ohm	100 ± 15 Ohm
16	8.1 dB/100m	52.2	51.2	44.1	43.1	43.7	41.7	25.0	100 ± 15 Ohm	100 ± 15 Ohm
20	9.1 dB/100m	50.8	49.8	41.7	40.7	41.8	39.8	25.0	100 ± 15 Ohm	100 ± 15 Ohm
25	10.2 dB/100m	49.3	48.3	39.1	38.1	39.8	37.8	24.3	100 ± 15 Ohm	100 ± 15 Ohm
31.25	11.4 dB/100m	47.9	46.9	36.4	35.4	37.9	35.9	23.6	100 ± 15 Ohm	100 ± 15 Ohm
62.5	16.4 dB/100m	43.4	42.4	27.0	26.0	31.9	29.9	21.5	100 ± 15 Ohm	100 ± 15 Ohm

100	21.0 dB/100m	40.3	39.3	19.3	18.3	27.8	25.8	20.1	100 ± 15 Ohm	100 ± 15 Ohm
155	26.6 dB/100m	37.4	36.4	10.9	9.9	24.0	22.0	18.8	100 ± 22 Ohm	100 ± 15 Ohm
200	30.5 dB/100m	35.8	34.8	5.3	4.3	21.8	19.8	18.0	100 ± 22 Ohm	100 ± 15 Ohm
250	34.4 dB/100m	34.3	33.3	-0.1	-1.1	19.8	17.8	17.3	100 ± 32 Ohm	100 ± 15 Ohm
300	38.0 dB/100m	33.1	32.1			18.3	16.3	14.4	100 ± 32 Ohm	100 ± 15 Ohm
350	41.4 dB/100m	32.1	31.1			16.9	14.9	13.8	100 ± 32 Ohm	100 ± 15 Ohm
400	44.6 dB/100m	31.3	30.3			15.8	13.8	13.3	100 ± 32 Ohm	100 ± 15 Ohm
450	47.7 dB/100m	30.5	29.5			14.7	12.7	12.8	100 ± 32 Ohm	100 ± 15 Ohm

# Voltage

UL Voltage Rating 300 V (CMP)

# **Mechanical Characteristics**

# Temperature

UL Temperature	Operating	Installation	Storage
90°C	-20°C To +75°C	0°C To +50°C	-20°C To +75°C

#### Bend Radius

Stationary Min.	Installa	tion Min.
2.25 in (57.2 mm)	2.75 in (6	69.9 mm)
Max. Pull Tension:	:	25 lbs (11

 Max. Pull Tension:
 25 lbs (11 kg)

 Bulk Cable Weight:
 21 lbs/1000ft (31 kg/km)

# **Standards and Compliance**

Environmental Suitability: Plenum, Indoor  Sustainability: Product Lens™, Environmental Product Declaration (EPD) Available  Flammability / Reaction to Fire: NFPA 262, UL 910 (Plenum), FT6, FT6, IEC 60332-1-2  Fire: CPR Compliance: OPR Euroclass: Eca; CPR UKCA Class: Eca  NEC / UL Compliance: Article 800, CMP  CEC / C(UL) Compliance: CMP  ICEA Compliance: S-80-661-2012  IEEE 802.38t Type 1, Type 2, Type 3  NEMA Compliance: NEMA WC-63.1  Data Category: Category 5e  TIA/EIA Compliance: ANSI/TIA-568.2-D Category 5e  TIA/EIA Compliance: ISO/IEC Campliance: SO/IEC 11801-1, IEC 61156-5  European Directive Compliance: EU CE Mark, EU Directive 2015/863/EU (RoHS 2 amendment), REACH, EU Directive 2011/65/EU (RoHS 2), EU Directive 2012/19/EU (WEEE), REACH: 2020-01-16  UK Regulation: UKCA Mark  APAC Compliance: China RoHS II (GB/T 26572-2011)		
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Non-Plenum Number: 1212	Non-Plenum Number:	1212

# **Product Notes**

Notes:	Electrical values are expected performance based on cable testing and representative performance within a typical Belden system. Values above 350 MHz are for Engineering Information Only, Print Includes Descending Footage/Meter Markings from Max. Put-Up Length to 0.
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# History

Update and Revision: Revision Number: 0.502 Revision Date: 03-08-2022

#### Variants

Item #	Color	Putup Type	Length	UPC
1213 010U1000	Black	UnReel	1,000 ft	612825061267
1213 D151000	Blue	Reel	1,000 ft	612825061274
1213 D15A1000	Blue	Reel-in-Box	1,000 ft	612825061397
1213 D15U1000	Blue	UnReel	1,000 ft	612825061298
1213 D152500	Blue	Reel	2,500 ft	612825061281
1213 008U1000	Gray	UnReel	1,000 ft	612825061335

1213 005U1000	Green	UnReel	1,000 ft	612825061304
1213 003U1000	Orange	UnReel	1,000 ft	612825061311
1213 012U1000	Pink	UnReel	1,000 ft	612825061328
1213 007U1000	Purple	UnReel	1,000 ft	612825061342
1213 0091000	White	Reel	1,000 ft	612825061373
1213 009A1000	White	Reel-in-Box	1,000 ft	612825061403
1213 009U1000	White	UnReel	1,000 ft	612825061366
1213 004U1000	Yellow	UnReel	1,000 ft	612825061380

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