



Outdoor Gel Filled CAT6A U/FTP Twisted Pair Cable

CCS® M0502290 PE/NY Fca Blue CAT6A Cable

Features

- Ideal for transmissions at Category 6A / Class EA.
- Supports 10Gigabit Ethernet applications (IEEE 802.3an)
- Suitable for PoE/PoE+/PoE++ (IEEE 802.3af/at/bt)
- Termite resistant Nylon outer sheath
- Gel filled inner for moisture protection
- Tested to 500MHz

Application

U/FTP CAT. 6A CCS 4 pair cable is suitable for outdoor links in structured cabling applications and is ideal for the realization of transmission channels of Category 6A / Class EA.

It supports 10Gigabit Ethernet applications (IEEE 802.3an) and is suitable for PoE/PoE+/PoE++ (IEEE 802.3af/at/bt) and Ultra-High Band Audio Visual.

Design

This 4-pair twisted cable is shielded in pairs with Aluminium/Polyethylene Terephthalate tape. The pairs are colour coded according to TIA standards in White/Blue, White/Orange, White/Green and White/Brown. Each conductor is made of solid AWG 23 copper and insulated with a foam skin Polyethylene buffer. It contains a drain wire and is jacketed in black Polyethylene and blue Nylon. The area between the shielded cores is flooded with Gel to act as a moisture barrier.

Product Information

Conductor: Solid bare copper (AWG23)

Insulation: Foam skin Polyethylene

Sheath: LDPE

Jacket: Nylon

Drain Wire: CuSn

Shield: Aluminium/PET tape

Moisture Barrier: Gel Filled

Technical Information

Product Color	Blue
Conformance	ISO/IEC 11801 IEC 61156-5 EN 50173-1 ANSI/TIA-568.2-D EN 50575 CPR Fca AS/CA S008:2020
Temperature, Installation [°C]	0°C to +50°C
Temperature, Operation [°C]	-10°C to +60°C
Technical Notes	Electrical properties at 20°C DC loop conductor resistance: Maximum 19 Ω/100m Resistance unbalance: Maximum 5% Insulation resistance: Minimum 5 GΩ x km Mutual capacitance: 56 pF/m Capacitance unbalance: Maximum 3300 pF/km NVP nominal velocity of propagation: 74% Propagation delay: Maximum 570 ns/100m Delay skew: Maximum 45 ns/100m Characteristic impedance: 100 ± 15 Ω Dielectric strength: 1,7 kVac for 2 seconds Maximum operating voltage 10GBase-T IEEE 802.3an: -2/2 V PoE IEEE 802.3af: 44/57 V PoE+ IEEE 802.3at: 50/57 V PoE++ IEEE802.3bt: 52/57V
Reaction to Fire	CPR Fca

Technical Details

Frequency	Attenuation	NEXT	PS-NEXT	ACR	PS-ACR	ACR-F	PS-ACR-F	RL
MHz	dB/100m	dB	dB	dB@100m	dB@100m	dB@100m	dB@100m	dB
	max.*	min.*	min.*	min.*	min.*	min.*	min.*	min.*
1	2.1	75.3	72.3	73.2	70.2	68	65	-
10	5.9	60.3	57.3	54.4	51.4	48	45	25
100	19.1	45,3	42.3	26.2	23.2	28	25	20.1
200	27.6	40.8	37.8	13.2	10.2	22	19	18
250	31.1	39.9	36.3	8.3	5.3	20	17	17.3
300	34.3	38.1	35.1	3.9	0.9	18.5	15.5	16.8
400	40.1	35.3	33.3	- 4.8	- 6.8	15.8	12.8	15.9
500	45.3	33.8	31.8	-10.4	-13.4	14	11	15.2

*according to EN 50288-10-1; IEC 61156-5(2012)

Transmission Properties

Items 1

Item Name	Color	Bend Radius [mm]	Tensile Force, Installation [N]	Diameter Ø [mm]	Weight [kg/km]	Length [m]
M0502290 CAT 6A U/FTP Outdoor PE/NY Fca CCS-R6AUF4PEN23-BL	Blue	66 (Installation) 33 (Operation)	110	8.2	58	500