

Cat.6 UTP Booted Cables Series

Technical Data Sheet

CableMAX Model No. **CM-1007XXXXBSTK**

Digi-Key Series: **CM-10076U**

Rev 250619

Length	Black	Blue	Grey	Green	Orange	Red	White	Yellow	Purple
0.5ft.	CM-100716BKBSTK	CM-100716BLBSTK	CM-100716GYBSTK	CM-100716GNBSTK	CM-100716ORBSTK	CM-100716RDBSTK	CM-100716WTBSTK	CM-100716YWBSTK	CM-100716PUBSTK
1ft.	CM-100701BKBSTK	CM-100701BLBSTK	CM-100701GYBSTK	CM-100701GNBSTK	CM-100701ORBSTK	CM-100701RDBSTK	CM-100701WTBSTK	CM-100701YWBSTK	CM-100701PUBSTK
1.5ft.	CM-100717BKBSTK	CM-100717BLBSTK	CM-100717GYBSTK	CM-100717GNBSTK	CM-100717ORBSTK	CM-100717RDBSTK	CM-100717WTBSTK	CM-100717YWBSTK	CM-100717PUBSTK
2ft.	CM-100702BKBSTK	CM-100702BLBSTK	CM-100702GYBSTK	CM-100702GNBSTK	CM-100702ORBSTK	CM-100702RDBSTK	CM-100702WTBSTK	CM-100702YWBSTK	CM-100702PUBSTK
3ft.	CM-100703BKBSTK	CM-100703BLBSTK	CM-100703GYBSTK	CM-100703GNBSTK	CM-100703ORBSTK	CM-100703RDBSTK	CM-100703WTBSTK	CM-100703YWBSTK	CM-100703PUBSTK
4ft.	CM-100700BKBSTK	CM-100700BLBSTK	CM-100700GYBSTK	CM-100700GNBSTK	CM-100700ORBSTK	CM-100700RDBSTK	CM-100700WTBSTK	CM-100700YWBSTK	CM-100700PUBSTK
5ft.	CM-100704BKBSTK	CM-100704BLBSTK	CM-100704GYBSTK	CM-100704GNBSTK	CM-100704ORBSTK	CM-100704RDBSTK	CM-100704WTBSTK	CM-100704YWBSTK	CM-100704PUBSTK
6ft.	CM-100713BKBSTK	CM-100713BLBSTK	CM-100713GYBSTK	CM-100713GNBSTK	CM-100713ORBSTK	CM-100713RDBSTK	CM-100713WTBSTK	CM-100713YWBSTK	CM-100713PUBSTK
7ft.	CM-100705BKBSTK	CM-100705BLBSTK	CM-100705GYBSTK	CM-100705GNBSTK	CM-100705ORBSTK	CM-100705RDBSTK	CM-100705WTBSTK	CM-100705YWBSTK	CM-100705PUBSTK
8ft.	CM-100748BKBSTK	CM-100748BLBSTK	CM-100748GYBSTK	CM-100748GNBSTK	CM-100748ORBSTK	CM-100748RDBSTK	CM-100748WTBSTK	CM-100748YWBSTK	CM-100748PUBSTK
9ft.	CM-100749BKBSTK	CM-100749BLBSTK	CM-100749GYBSTK	CM-100749GNBSTK	CM-100749ORBSTK	CM-100749RDBSTK	CM-100749WTBSTK	CM-100749YWBSTK	CM-100749PUBSTK
10ft.	CM-100706BKBSTK	CM-100706BLBSTK	CM-100706GYBSTK	CM-100706GNBSTK	CM-100706ORBSTK	CM-100706RDBSTK	CM-100706WTBSTK	CM-100706YWBSTK	CM-100706PUBSTK
12ft.	CM-100747BKBSTK	CM-100747BLBSTK	CM-100747GYBSTK	CM-100747GNBSTK	CM-100747ORBSTK	CM-100747RDBSTK	CM-100747WTBSTK	CM-100747YWBSTK	CM-100747PUBSTK
15ft.	CM-100707BKBSTK	CM-100707BLBSTK	CM-100707GYBSTK	CM-100707GNBSTK	CM-100707ORBSTK	CM-100707RDBSTK	CM-100707WTBSTK	CM-100707YWBSTK	CM-100707PUBSTK
20ft.	CM-100714BKBSTK	CM-100714BLBSTK	CM-100714GYBSTK	CM-100714GNBSTK	CM-100714ORBSTK	CM-100714RDBSTK	CM-100714WTBSTK	CM-100714YWBSTK	CM-100714PUBSTK
25ft.	CM-100708BKBSTK	CM-100708BLBSTK	CM-100708GYBSTK	CM-100708GNBSTK	CM-100708ORBSTK	CM-100708RDBSTK	CM-100708WTBSTK	CM-100708YWBSTK	CM-100708PUBSTK
30ft.	CM-100719BKBSTK	CM-100719BLBSTK	CM-100719GYBSTK	CM-100719GNBSTK	CM-100719ORBSTK	CM-100719RDBSTK	CM-100719WTBSTK	CM-100719YWBSTK	CM-100719PUBSTK
35ft.	CM-100718BKBSTK	CM-100718BLBSTK	CM-100718GYBSTK	CM-100718GNBSTK	CM-100718ORBSTK	CM-100718RDBSTK	CM-100718WTBSTK	CM-100718YWBSTK	CM-100718PUBSTK
40ft.	CM-100720BKBSTK	CM-100720BLBSTK	CM-100720GYBSTK	CM-100720GNBSTK	CM-100720ORBSTK	CM-100720RDBSTK	CM-100720WTBSTK	CM-100720YWBSTK	CM-100720PUBSTK
50ft.	CM-100709BKBSTK	CM-100709BLBSTK	CM-100709GYBSTK	CM-100709GNBSTK	CM-100709ORBSTK	CM-100709RDBSTK	CM-100709WTBSTK	CM-100709YWBSTK	CM-100709PUBSTK
75ft.	CM-100710BKBSTK	CM-100710BLBSTK	CM-100710GYBSTK	CM-100710GNBSTK	CM-100710ORBSTK	CM-100710RDBSTK	CM-100710WTBSTK	CM-100710YWBSTK	CM-100710PUBSTK
100ft.	CM-100711BKBSTK	CM-100711BLBSTK	CM-100711GYBSTK	CM-100711GNBSTK	CM-100711ORBSTK	CM-100711RDBSTK	CM-100711WTBSTK	CM-100711YWBSTK	CM-100711PUBSTK
125ft.	CM-100790BKBSTK	CM-100790BLBSTK	CM-100790GYBSTK	CM-100790GNBSTK	CM-100790ORBSTK	CM-100790RDBSTK	CM-100790WTBSTK	CM-100790YWBSTK	CM-100790PUBSTK
150ft.	CM-100712BKBSTK	CM-100712BLBSTK	CM-100712GYBSTK	CM-100712GNBSTK	CM-100712ORBSTK	CM-100712RDBSTK	CM-100712WTBSTK	CM-100712YWBSTK	CM-100712PUBSTK
175ft.	CM-100791BKBSTK	CM-100791BLBSTK	CM-100791GYBSTK	CM-100791GNBSTK	CM-100791ORBSTK	CM-100791RDBSTK	CM-100791WTBSTK	CM-100791YWBSTK	CM-100791PUBSTK
200ft.	CM-100715BKBSTK	CM-100715BLBSTK	CM-100715GYBSTK	CM-100715GNBSTK	CM-100715ORBSTK	CM-100715RDBSTK	CM-100715WTBSTK	CM-100715YWBSTK	CM-100715PUBSTK

Specifications

* Information listed represents all cables within this series

Cable Specifications:

CAT6 UTP 4 X 1P[24AWG(7/0.175mm±0.008mm BC)]
CM PVC JACKET OD: 5.3±0.20mm

Standard Reference:

- All Category 6 Requirements as Per ANSI/TIA, ISO/IEC, and CENELEC EN Standards
- ANSI/TIA-5682-D Cat.6
- ISO/IEC 3rd Edition 11801 Class E
- We Implemented RoHS Compliance for the Requirement of European Union Issued Directive 2011/65/EU

Physical characteristic

- Rated temperature: 75°C
- Installation temperature: -20-60°C
- Operating temperature: -20-75°C
- Min bending radius:15xOD in Operation:10xOD after operation

Application

- 1000BASE-T Gigabit Ethernet
- 10BASE-T, 100BASE-TX Fast Ethernet (IEEE 802.3)
- 100 VG - AnyLAN(IEEE802.12)
- 250MHz Broadband Video Voice, T1, ISDN

Compliance

Compliant with TIA/EIA standard by UL & ETL; RoHS Compliant



Electrical Performance

CABLE CONSTRUCTION		
Conductor	Material	Stranded Bare Copper
	Nom.O.D (mm)	7/0.175±0.008mm 24AWGx4P
Insulation HDPE	Average Thickness(mm)	0.2
	Insulation Dia.(±0.05mm)	0.75
	Unaged Elongation	Min. 300%
	Unaged Tensile Strength	Min.1.683 Kgf/mm ²
Code Color	1 Blue/Blue*White	2 Orange/Orange*White
	3 Green/Green*White	4 Brown/Brown*White
Jacket CM PVC	Average Thickness (mm)	0.6
	Outer Dia.(±0.20mm)	5.3
	Unaged Elongation	Min. 100%
	Unaged Tensile Strength	Min.1.407 Kgf/mm ²
	Aging at 100°C for 168Hrs	Min. elongation retention:50% Min. tensile strength retention:75%
Marking	YFC CAT.6 UTP ISO/IEC 11801 & EN 50288 & ANSI/TIA-568.2-D ETL/3P VERIFIED ▲ 24AWGX4P PATCH TYPE CM(UL) E164469-B3	

CHARACTERISTICS	
Dielectric Strength of Insulation	1500 V dc / 1 minute
Insulation Resistance Test	Min. 5000 MΩ·Km
Conductor Resistance	Max. 11.25 Ω/100m at 20°C
Resistance Unbalance	Max. 2%
Capacitance Unbalance	Max. 220 pF/100m

TECHNICAL PERFORMANCE				
TIA Cat 6 Channel Test				
Frequency (MHz)	Insertion Loss	RL Min (dB)	NEXT Min (dB)	
1	3.0	19.0	65.0	
4	4.0	19.0	63.0	
8	5.7	19.0	58.2	
10	6.3	19.0	56.6	
16	8.0	18.0	53.2	
20	9.0	17.5	51.6	
25	10.1	10.1	50.0	
31.25	11.4	16.5	48.4	
62.25	16.5	14.0	43.4	
100	21.3	12.0	39.9	
200	31.5	9.0	34.8	
250	35.9	8.0	33.1	
Frequency (MHz)	PSNEXT (dB/100m)	ACR-F (dB/100m)	PS ACR-F (dB/100m)	Impedance (Ohms)
1	62.0	63.3	60.3	100±15
4	60.5	51.2	48.2	
8	55.6	45.2	42.2	
10	54.0	43.3	40.3	
16	50.6	39.2	36.3	
20	59.0	37.2	34.2	
25	47.3	35.3	32.3	
31.25	45.7	33.4	30.4	
62.25	40.6	27.3	24.3	
100	37.1	23.3	20.3	
200	31.9	17.2	14.2	
250	30.2	15.3	12.3	

Configuration

Cable Cross-Section Structure

