



STRUCTURED CABLING SYSTEMS

DIGISOL Solid Cable, Cat6 UTP, 4 Pair, 23AWG, Armoured Outdoor Cable

**Introduction:-**

DIGISOL Cat6 4 Pair UTP armoured Cable has been designed for horizontal cabling networks for transmission of high speed data, digital and analog, voice and video signals over LANs. Supports gigabit ethernet (1000 Base-T) standard suitable for noisy environments, high EMI interference surroundings and complies to the requirement of ANSI/TIA-568-C.2 and ISO/IEC 11801. Performance verified upto 250MHz.

Key Features:-

- Better cable material properties and design
- Performance verified upto 250 MHz.
- UV resistance outer jacket sheath
- Suitable for outdoor applications
- Rugged double sheath construction cable
- ECCS Tape armouring provides excellent mechanical protection
- Packaged in a wooden reel for easier installation (305m length)

Technical Specifications:-**Construction Properties:-**

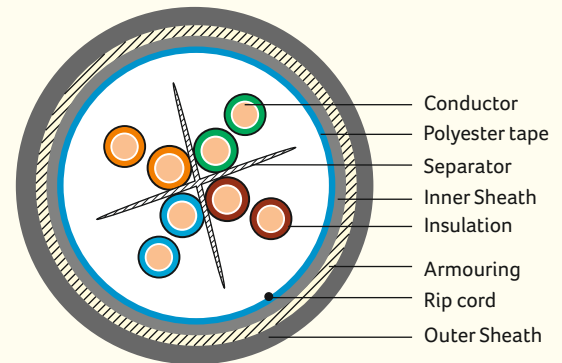
Conductor	: 23 AWG, Solid bare copper
Pairs	: 4 Pair twisted wires
Type	: U/UTP CM rated
Insulation Material	: High density polyethylene (HDPE)
Insulation Diameter	: 1.02 ± 0.01 mm
Nominal Thickness	: 0.24 mm
Central Member	: PE cross separator
Separator Dimension/Thickness	: 4.4 mm/ 0.6 mm
Separator Material	: Polyolefin / Polyethylene
Wrapping	: Polyester tape (0.025mm thickness)
Inner/Outer Jacket sheath	: FRPVC / Polyethylene
Inner/Outer Jacket Average Thickness (± 0.01mm)	: 0.75 / 1.20 mm (Min.)
Armouring	: ECCS Tape (≥ 0.125mm thickness)
Inner/Outer Jacket Diameter	: 7.0 / 10.0 (± 0.5 mm)
Rip Cord	: 1 no. (Polyester)
Jacket Colour	: Black

Mechanical Properties:-

Maximum Tensile Strength of Jacket (N/mm ²)	: 13.1
Pulling Force	: 11.5 Kg (25.35 lbs)
Bending radius	: < 12 x Cable Diameter at -20°C ± 1°C

Environmental Properties:-

Operating Temperature	: -20°C to +70°C
Installation Temperature	: -20°C to +70°C

**Electrical Properties:-**

Conductor Resistance	: ≤ 9.38 Ω/100m Max.
Mutual Capacitance	: < 5.6 nF/100m Max
Resistance Unbalance	: 5% Max
Capacitance Unbalance	: Max. 330 pF/100m
Dielectric Strength	: 2.5 KVDC for 2 seconds
Delay Skew	: < 45ns/100m
Propagation Delay @250 MHz	: 536ns/100m
Impedance	: 100 ± 15 Ω @ 100 MHz
Current Rating	: 1.5 A Max.
Operating Voltage	: 72 V
Nominal Velocity of Propagation	: 69%

Color Code:-

Pair Number	: Color
1 - 2	: White-Orange Stripe and Orange
3 - 6	: White-Green Stripe and Green
4 - 5	: White-Blue Stripe and Blue
7 - 8	: White-Brown Stripe and Brown

Standards:-

Comply to ANSI/TIA-568-C.2
ISO/IEC 11801
RoHS Compliant

Transmission Performance Parameters:- @ 250 MHz for 70m cable due to armouring

Frequency MHZ	Insertion Loss (dB/100m)	NEXT (dB/100m)	PSNEXT (dB/100m)	ACRF (dB/100m)	PSACRF (dB/100m)	Return Loss (dB/100m)
250	35.9	33.1	30.2	15.3	12.3	8.0

Ordering Information:-

Part Codes	Description
DGC-SC6A4F-3GW	DIGISOL Solid Cable, Cat6 UTP ARMD (ECCS Tape), 4 Pair, 23AWG, CM, Black, 305m

