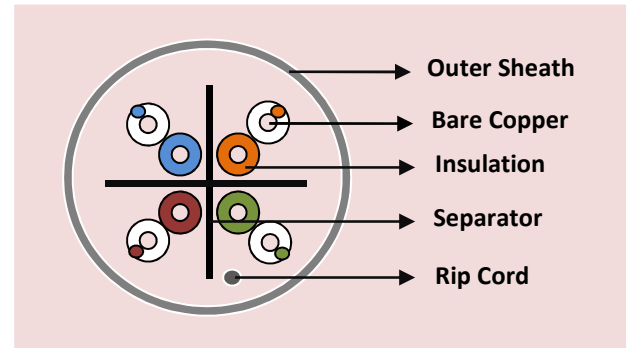


FINOLEX CABLES LTD. PUNE, INDIA

GENERAL TECHNICAL PARTICULARS OF CAT6 U/UTP

LAN Cables

The Cable Construction and Electrical Performance of 4 Pair 23 AWG CAT-6 U/UTP LAN cable as per ANSI/TIA-568-C.2 and ISO/IEC 11801 Standard.



● Construction

1. **Conductor** : Annealed Bare Copper, 23AWG
2. **Insulation** : High Density Polyethylene (HDPE)
3. **Separator** : Polyethylene Central Cross filler
4. **Rip Cord** : Nylon Rip Cord under Sheath
5. **Sheath** : PVC
Diameter : 6.0 ± 0.3mm
Colour : Yellow
Note: Sheath material & Colour: As per requirement of customer
6. **Colour code :**

Pair	Colour
1	Blue-White/Blue
2	Orange-White/Orange
3	Green-White/Green
4	Brown-White/Brown

7. **Packaging** : 305m Tangle free coil in Corrugated Box

● Technical data

➤ Mechanical Properties

1. **Temperature range** : -10°C to + 60°C
2. **Minimum bend radius** : 8 x Cable Diameter
3. **Pulling Force** : 11.5 kg Minimum

➤ Electrical Properties at 20°C

Characteristics	Specification
Characteristic Impedance	100 Ω ± 15Ω
Conductor Resistance	9.38 Ω/100m Max
Resistance Unbalance	5% Max
Mutual Capacitance	5.6 nF/100 m Max
Capacitance Unbalance	Max. 330 pF/100m
Delay skew	<45 nS

- **Standard Approvals** : UL approved and ETL Verified

❖ High Frequency Performance

Frequency (MHz)	Insertion Loss (ATTN) dB/100m	RETURN LOSS dB	NEXT dB	PS NEXT dB	ELFEXT dB/100	PS ELFEXT dB/100m	ACR-N dB
1.00	2.0	20.0	74.3	72.3	67.8	64.8	72.3
4.00	3.8	23.0	65.3	63.3	55.8	52.8	61.5
8.00	5.3	24.5	60.8	58.8	49.7	46.7	55.5
10.00	6.0	25.0	59.3	57.3	47.8	44.8	53.3
16.00	7.6	25.0	56.2	54.2	43.7	40.7	48.6
20.00	8.5	25.0	54.8	52.8	41.8	38.8	46.3
25.00	9.5	24.3	53.3	51.3	39.8	36.8	43.8
31.25	10.7	23.6	51.9	49.9	37.9	34.9	41.2
62.50	15.4	21.5	47.4	45.4	31.9	28.9	32.0
100.0	19.8	20.1	44.3	42.3	27.8	24.8	24.5
200.0	29.0	18.0	39.8	37.8	21.8	18.8	10.8
250.0	32.8	17.3	38.3	36.3	19.8	16.8	5.5

LAN Cables

● **Application**

Cable applied in structured cabling system of Class E for high speed data and voice transmission, secondary (vertical) and tertiary (horizontal) level.

Cable used in following types of network:

- ✚ ISDN
- ✚ IEEE 802.3 10Base-T Ethernet 10Mb/s
- ✚ IEEE 802.3u 100Base-T Fast Ethernet 100Mb/s
- ✚ IEEE 802.3ab 1000Base-T Gigabit Ethernet 1000Mb/s
- ✚ Data center I/O consolidation
- ✚ Parallel processing and High speed computing

