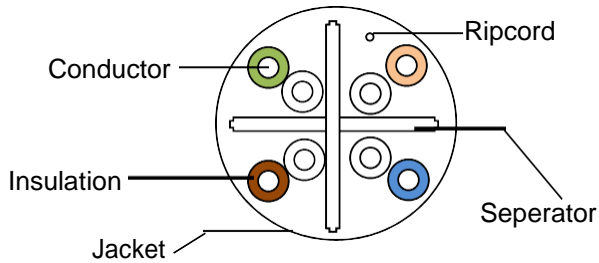


# HYBRID INDOOR/OUTDOOR NETWORK CABLE



## SPECIFICATIONS

- 4 Pairs Unshielded Twisted Pair (UTP) Cable
- Conductor material: Solid Bare Copper
- Conductor Diameter: 0.51mm Nominal
- Insulation Material: HD-PE
- Insulation Diameter:  $0.98 \pm 0.05$ mm Nominal
- PE Central Cross separator
- Jacket Material: PVC, UV stabilized indoor/outdoor
- Cable Diameter:  $6.0 \pm 0.2$ mm Nominal
- Color Dark Grey
- Packaged as reel-in-box.

## APPLICATION

SIMPLIFI Category 6 (CAT6) cables exceed TIA/EIA-568-B.2-1, TIA/EIA 568-C and ISO/IEC 11801 performance requirement, it reduces crosstalk and system noise. They can transmit data at 1000 Mbps (~1Gigabit per second) with a frequency of 250 MHz and suitable for 10BASE-T, 100BASE-TX Fast Ethernet and 1000BASE-T 1000BASE-TX (Gigabit Ethernet).

## Standard

Reference standard: UL 4444, UL 1581  
RoHS Complied PVC, PE

## TECHNICAL DETAILS

- Mutual Capacitance: 5.6nF/100m nominal
- Characteristic Impedance:  $100 \pm 15\%$
- Nominal Velocity of Propagation: 69%
- Characteristic Impedance:  $100 \pm 15$
- Conductor Resistance:  $< 9.38 / 100$ m
- Mutual Capacitance:  $< 5.6$ nF/100m
- Resistance Unbalance: 5% Max
- Capacitance Unbalance: 330pF/100m
- Delay Skew:  $< 45$ nS
- Bending Radius:  $< 4 \times$  Cable Diameter at  $-20^\circ\text{C} \pm 1^\circ\text{C}$
- Pulling Force: 11.5Kg
- Temperature Range:  $-20^\circ$  to  $+75^\circ\text{C}$

## TRANSMISSION CHARACTERISTICS PER 100M

Frequency (MHz)	Insertion Loss (dB/100 m)	RL (dB)	NEXT (dB)	PSNEXT (dB)	ELFEXT (dB)	PSELFEXT (dB)	ACR (dB)	PSACR (dB)
1	2.0	20.0	74.3	72.3	67.8	64.8	72.3	70.3
4	3.8	23.0	65.3	63.3	55.8	52.8	61.5	59.5
8	5.3	24.5	60.8	58.8	49.7	46.7	55.5	53.5
10	6.0	25.0	59.3	57.3	47.8	44.8	53.3	51.3
16	7.6	25.0	56.2	54.2	43.7	40.7	48.6	46.6
20	8.5	25.0	54.8	52.8	41.8	38.8	46.3	44.3
25	9.5	24.3	53.3	51.3	39.8	36.8	43.8	41.8
31.25	10.7	23.6	51.9	49.9	37.9	34.9	41.2	39.2
62.5	15.4	21.5	47.4	45.4	31.9	28.9	32.0	30.0
100	19.8	20.1	44.3	42.3	27.8	24.8	24.5	22.5
200	29.0	18.0	39.8	37.8	21.8	18.8	10.8	8.8
250	32.8	17.3	38.3	36.3	19.8	16.8	5.5	3.5
350	39.8	16.3	36.1	34.1	16.9	13.9	-1.8	-3.8
400	43.0	15.9	35.3	33.7	15.7	12.7	-5.7	-7.7
450	46.3	15.5	34.5	32.5	14.7	11.7	-9.5	-11.5
500	48.9	15.2	33.8	31.8	13.8	10.8	-13.1	-15.1
550	51.8	14.9	33.2	31.2	12.9	9.9	-16.4	-18.4



## CAT6 UTP CABLE

<http://simplifinetworks.com>