

PRODUCT DATA SHEET

U/UTP Direct Burial CAT6e Twisted Pair 550 MHz Cable

Data Transmission and communication cable



Application

- For direct burial applications.
- Meets or exceeds requirements of ANSI/TIA-568.2-D Category 6e and ISO 11801 2nd Edition Class E channel standards.
- Meets or exceeds requirements of ANSI/TIA-568.2-D and IEC 61156-5 Category 6e component standards.
- Third party tested to Category 6e channel compliance.
- Meets requirements of IEEE 802.3af and IEEE 802.3at for PoE applications.
- Descending length cable markings enable easy identification of remaining cable which reduces installation time and cable scrap.
- Color Availability: Additional cable colors available.
- UL Verified.

Electrical Characteristics

- Impedance: 1-250MHz 100±15(Ohms).
- Rated Temperature: 75°C.
- DC Resistance Unbalance(%): Max 5.
- DC Resistance 20°C: 9.5(Ohms/100m).
- Pair-to-Ground Capacitance Unbalance: 330(pF/100M).
- Insulation Resistance: >5000MΩ*Km.
- Dielectric strength: DC 2500V 2S.

Water Blocking Compound

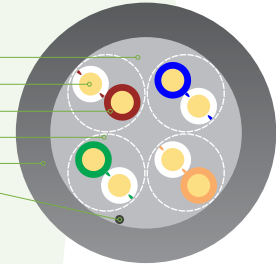
Copper Conductor

HDPE Insulation

Pair

Jacket

Rip Cord



Conductor

Conductor	Solid Bare Copper 23AWG
Insulation	HDPE
Total number of insulated conductors	8, twisted in 4 pairs
Color code	White-Blue/Blue, White-Orange/Orange, White-Green/Green, White-Brown/Brown
Individual pair shield	None
Overall shield	None
Drain wire	None

Nominal Transmission Characteristics

Frequency	RL (DB)	ATT (DB)	NEXT (DB)	PSNEXT (DB)	ELFEXT (DB)	PSELEXT (DB)
1	20.0	2.03	74.3	72.3	68.0	65.0
4.0	23.0	3.78	65.3	63.3	56.0	53.0
8.0	24.5	5.32	60.8	58.7	49.9	46.9
10.0	25.0	5.95	59.3	57.3	48.0	45.0
16.0	25.0	7.55	56.2	54.2	43.9	40.9
20.0	25.0	8.47	54.8	52.8	42.0	39.0
25.0	24.3	9.51	53.3	51.3	40.0	37.0
31.25	23.6	10.67	52.0	49.9	38.1	35.1
62.5	21.5	15.38	47.4	45.4	32.1	29.1
100	20.1	19.80	44.3	42.3	28.0	25.0
200	18.0	28.98	39.8	37.8	22.0	19.0
250	17.3	32.85	38.3	36.3	20.0	17.0
350	16.3	39.79	36.1	34.1	16.9	13.9
550	12.6	61.7	33.2	31.2	13.2	10.1

Note: The above transmission performance for the 100M, 20 ± 2°C under the conditions tested.



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ITEM Frequency	Attenuation Max (dB/100m)		NEXT Min (dB)		PS NEXT Min (dB)		ACR Min (dB)	
	Standard	NT	Standard	NT	Standard	NT	Standard	NT
1	2	1.9	74.3	80.3	72.3	76.6	72.3	78.4
4	3.8	3.7	65.3	75.6	63.3	74.2	61.5	71.9
8	5.3	5.1	60.8	66	58.8	65.1	55.5	60.9
10	6	5.8	59.3	67.6	57.3	65.9	53.3	61.8
16	7.6	7.4	56.2	70.8	54.2	67.2	48.6	63.4
20	8.5	8.2	54.8	71.9	52.8	69.1	46.3	63.7
25	9.5	9.1	53.3	62.3	51.3	60.8	43.8	53.2
31.25	10.7	9.9	51.9	68.7	49.9	67.1	41.2	58.8
62.5	15.4	15	47.4	59.6	45.4	58.3	32	44.6
100	19.8	18.8	44.3	60	42.3	58	24.5	41.2
200	29	27.4	39.8	57.5	37.8	56	10.8	30.1
250	32.8	29.4	38.3	55.8	36.3	54.1	5.5	26.4
300	36.4	33.3	37.1	54.2	35.1	53.4	0.7	20.9
400	43	38.6	35.3	53.8	33.3	52.1	---	---
500	48.9	43.9	33.8	51	31.8	49.3	---	---

ITEM Frequency	RL Min (dB)		ELFEXT Min (dB)		PS ELFEXT Min (dB)		PSACR Min (dB)	
	Standard	NT	Standard	NT	Standard	NT	Standard	NT
1	20	23.6	67.8	75.6	64.8	73.3	70.3	74.7
4	23	23.9	55.8	61.3	52.8	60.1	59.5	70.5
8	24.5	30	49.7	55.7	46.7	54.8	53.5	60
10	25	28.5	47.8	55.2	44.8	53.2	51.3	60.1
16	25	28.2	43.7	49.7	40.7	48.1	46.6	59.8
20	25	27.8	41.8	48.1	38.8	46.2	44.3	60.9
25	24.3	27.5	39.8	45.9	36.8	45	41.8	51.7
31.25	23.6	24.9	37.9	42.7	34.9	41.7	39.2	57.2
62.5	21.5	24.1	31.9	39.4	28.9	37.4	30	43.3
100	20.1	23.5	27.8	35	24.8	33.2	22.5	39.2
200	18	23.2	21.8	32.8	18.8	30.2	8.8	28.6
250	17.3	21.5	19.8	30.7	16.8	27.7	3.5	24.7
300	16.8	20.8	18.3	26.5	15.3	25.4	---	---
400	15.9	18.9	15.8	23.4	12.8	22.1	---	---
500	15.2	18.6	13.8	19.5	10.8	18.7	---	---