

1-2171015-0 | TE610R-ORII: CMR UTP 4/23 C6



ETL Verified 6 U/UTP Cable, non-plenum, orange jacket, 4 pair count, 1000 ft (305 m) length, CommPak

OBSOLETE

Replaced By:

UN884021014/10 CS34R ETL Verified Category 6 U/UTP Cable, non-plenum, orange jacket, 4 pair count, CS34R ORG C6 4/23 U/UTP CPK 1KFT 1000 ft (305 m) length, CommPak

Product Classification

Regional Availability	Asia Australia/New Zealand Latin America North America
Portfolio	NETCONNECT®
Product Type	Twisted pair cable

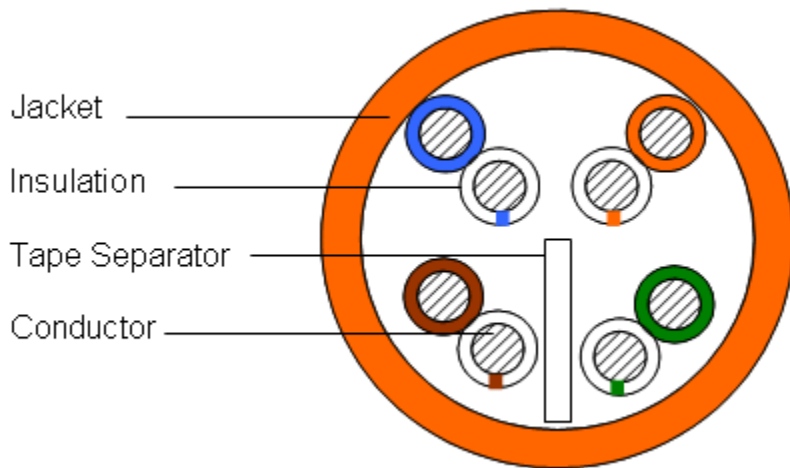
General Specifications

Product Number	610R
ANSI/TIA Category	6
Cable Component Type	Horizontal
Cable Type	U/UTP (unshielded)
Conductor Type, singles	Solid
Conductors, quantity	8
Jacket Color	Orange
Note	All electrical transmission tests include swept frequency measurements
Pairs, quantity	4
Separator Type	Tape separator
Transmission Standards	ANSI/TIA-568.2-D CENELEC EN 50288-6-1 ISO/IEC 11801 Class E

Dimensions

Cable Length	304.8 m 1000 ft
Diameter Over Jacket, nominal	5.537 mm 0.218 in
Jacket Thickness	0.508 mm 0.02 in
Conductor Gauge, singles	23 AWG

Cross Section Drawing



Electrical Specifications

Characteristic Impedance	100 ohm
dc Resistance Unbalance, maximum	5 %
dc Resistance, maximum	6.66 ohms/100 m 2.03 ohms/100 ft
Delay Skew, maximum	30 ns
Dielectric Strength, minimum	1500 Vac 2500 Vdc
Mutual Capacitance at Frequency	5.6 nF/100 m @ 1 kHz
Nominal Velocity of Propagation (NVP)	69 %
Operating Frequency, maximum	250 MHz
Operating Voltage, maximum	80 V
Remote Powering	Fully complies with the recommendations set forth by IEEE 802.3bt (Type 4) for the safe delivery of power over LAN cable when installed according to ISO/IEC 14763-2, CENELEC EN 50174-1, CENELEC EN 50174-2 or TIA TSB-184-A
Safety Voltage Rating	300 V

Electrical Cable Performance

CS	CommScope	NEXT	Near End Crosstalk (dB/100m)
STD	Refers to the standard value listed under Transmission Standards in the Electrical Specifications above	PSNEXT	Power Sum Near End Crosstalk (db/100m)
TYP	Typical Electrical Performance	ACRF	Attenuation to Crosstalk Ratio - Far End (dB/100m)
IL	Insertion Loss (dB/100m)	RL	Return Loss (dB)
ACR	Attenuation to Crosstalk Ratio (dB/100m)	ELTCTL	Equal Level Transverse Conversion Transfer Loss (dB/100m)
PSACR	Power Sum Attenuation to Crosstalk Ratio (dB/100m)		
PSACRF	Power Sum Attenuation to Crosstalk Ratio - Far End (dB/100m)		
TCL	Transverse Conversion Loss (dB/100m)		

Freq. MHz	IL			NEXT			ACR			PSNEXT			PSACR			ACRF			PSACRF			RL			TCL		ELTCTL	
	CS	STD	TYP	CS	STD	TYP	CS	STD	TYP	CS	STD	TYP	CS	STD	TYP	CS	STD	TYP	CS	STD	TYP	CS	STD	TYP	CS	STD	CS	STD
1	2	2	1.8	74.3	74.3	89.3	72.3	72.3	87.6	72.3	72.3	87	70.3	70.3	85.3	67.8	67.8	84.3	64.8	64.8	82.4	20	20	34	40	40	35	35
4	3.8	3.8	3.5	65.3	65.3	80	61.5	61.5	76.5	63.3	63.3	77.7	59.5	59.5	74.1	55.8	55.8	72.6	52.8	52.8	70.8	23	23	33.9	40	40	23	23
8	5.3	5.3	5	60.8	60.8	75.5	55.4	55.4	70.5	58.8	58.8	73.2	53.4	53.4	68.2	49.7	49.7	66.8	46.7	46.7	64.9	24.5	24.5	35.5	40	40	16.9	16.9
10	6	6	5.6	59.3	59.3	73.9	53.3	53.3	68.3	57.3	57.3	71.5	51.3	51.3	65.9	47.8	47.8	64.9	44.8	44.8	63	25	25	36.5	40	40	15	15
16	7.6	7.6	7.2	56.2	56.2	70.6	48.7	48.7	63.4	54.2	54.2	68.3	46.7	46.7	61.1	43.7	43.7	60.8	40.7	40.7	58.9	25	25	37.6	38	38	10.9	10.9
20	8.5	8.5	8.1	54.8	54.8	69.2	46.3	46.3	61.2	52.8	52.8	66.9	44.3	44.3	58.8	41.8	41.8	58.9	38.8	38.8	56.9	25	25	38.2	37	37	9	9
25	9.5	9.5	9	53.3	53.3	67.6	43.8	43.8	58.6	51.3	51.3	65.3	41.8	41.8	56.2	39.8	39.8	57	36.8	36.8	55	24.3	24.3	38.2	36	36	7	7
31.25	10.7	10.7	10.1	51.9	51.9	66.3	41.2	41.2	56.1	49.9	49.9	63.9	39.2	39.2	53.8	37.9	37.9	55	34.9	34.9	53	23.6	23.6	38.3	35.1	35.1		
62.5	15.4	15.4	14.5	47.4	47.4	61.4	32	32	46.9	45.4	45.4	59	30	30	44.5	31.9	31.9	48.9	28.9	28.9	46.9	21.5	21.5	34.7	32	32		
100	19.8	19.8	18.6	44.3	44.3	58.1	24.5	24.5	39.5	42.3	42.3	55.7	22.5	22.5	37.1	27.8	27.8	44.7	24.8	24.8	42.8	20.1	20.1	31.6	30	30		
155	25.2	25.2	23.5	41.4	41.4	55.7	16.3	16.3	32.2	39.4	39.4	53	14.3	14.3	29.5	24	24	41	21	21	39	18.8	18.8	29.6	28.1	28.1		
200	29	29	26.9	39.8	39.8	52.6	10.8	10.8	25.7	37.8	37.8	50.4	8.8	8.8	23.4	21.8	21.8	38.6	18.8	18.8	36.7	18	18	29.3	27	27		
250	32.8	32.8	30.3	38.3	38.3	50.8	5.5	5.5	20.5	36.3	36.3	48.6	3.5	3.5	18.3	19.8	19.8	36.5	16.8	16.8	34.7	17.3	17.3	28.8	26	26		
300			33.5			49			15.6			46.8			13.4			34.5			32.6			28.9				
350			36.4			47.6			11.2			45.4			9			33			31			29				
400			39			46.3			7.3			44.1			5.1			31.3			29.3			30.3				
500			44.3			43.2			-1.1			41.2			-3.1			27.3			25.5			31				
550			44.6			43.1			-0.5			41.2			-2.5			27.4			25.5			31				
650			51.3			40.2			-11.1			38.4			-12.9			22.3			20.4			25				

Material Specifications

Conductor Material	Bare copper
Insulation Material	Polyolefin
Jacket Material	PVC
Separator Material	Polyolefin

Mechanical Specifications

Pulling Tension, maximum 11.34 kg | 25 lb

Environmental Specifications

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Installation temperature	0 °C to +60 °C (+32 °F to +140 °F)
Operating Temperature	-20 °C to +60 °C (-4 °F to +140 °F)
Environmental Space	Non-plenum
Flame Test Method	CMR UL 1666

Packaging and Weights

Cable weight	35.136 kg/km 23.61 lb/kft
Packaging Type	CommPak® box

Regulatory Compliance/Certifications

Agency	Classification
CHINA-ROHS	Below maximum concentration value
ISO 9001:2015	Designed, manufactured and/or distributed under this quality management system
REACH-SVHC	Compliant as per SVHC revision on www.commscope.com/ProductCompliance
ROHS	Compliant
UK-ROHS	Compliant

