# 884031984/30 | CS27R BLU C5E 4/24 U/UTP RL 3KFT

ETL Verified Category 5e U/UTP Cable, non-plenum, blue jacket, 4 pair count, 3000 ft (914 m) length, reel

#### Product Classification

Regional Availability	Asia   Australia/New Zealand   Latin America   North America
Portfolio	CommScope®
Product Type	Twisted pair cable
General Specifications	
Product Number	CS27R
ANSI/TIA Category	5e
Cable Component Type	Horizontal
Cable Type	U/UTP (unshielded)
Conductor Type, singles	Solid
Conductors, quantity	8
Jacket Color	Blue
Note	All electrical transmission tests include swept frequency measurements
Pairs, quantity	4
Transmission Standards	ANSI/TIA-568.2-D   CENELEC EN 50288-3-1   ISO/IEC 11801 Class D
Dimensions	
Cable Length	914.4 m   3000 ft
Cable Length Tolerance	±5%
Diameter Over Jacket, nominal	4.953 mm   0.195 in
Jacket Thickness	0.508 mm   0.02 in
Conductor Gauge, singles	24 AWG

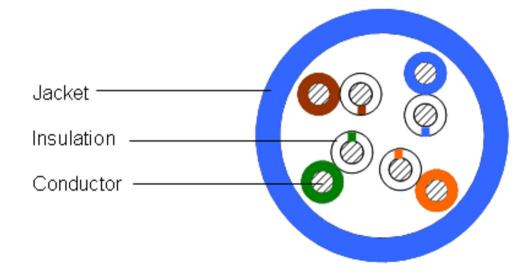
### Cross Section Drawing

Page 1 of 4

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### **Electrical Specifications**

Characteristic Impedance	100 ohm
dc Resistance Unbalance, maximum	5 %
dc Resistance, maximum	9.38 ohms/100 m   2.859 ohms/100 ft
Delay Skew, maximum	15 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	350 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

Page 2 of 4

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### Electrical Cable Performance

CS Co	ommScope		
STD Re	fers to the standard value listed under Transmission Standards in the Elec	trical Specification	ns above
TYP Ty	pical Electrical Performance		
IL Ins	sertion Loss (dB/100m)	NEXT	Near End Crosstalk (dB/100m)
ACR Att	tenuation to Crosstalk Ratio (dB/100m)	PSNEXT	Power Sum Near End Crosstalk (db/100m)
PSACR Po	ower Sum Attenuation to Crosstalk Ratio (dB/100m)	ACRF	Attenuation to Crosstalk Ratio - Far End (dB/100m)
PSACRF Po	ower Sum Attenuation to Crosstalk Ratio - Far End (dB/100m)	RL	Return Loss (dB)
TCL Tra	ansverse Conversion Loss (dB/100m)	ELTCTL	Equal Level Transverse Conversion Transfer Loss (dB/100m)

Freq.				NEXT			ACR			PSNEXT			PSACR			ACRF			PSACRF			RL		
MHz	cs	STD	түр	cs	STD	түр	cs	STD	түр	cs	STD	түр	cs	STD	түр	cs	STD	түр	cs	STD	түр	cs	STD	түр
1	2	2	1.8	70.3	65.3	85	68.3	63.3	83.1	68.3	62.3	82.6	66.3	60.3	80.8	67.8	63.8	79.8	65.8	60.8	78	20	20	34.8
4	3.9	4.1	3.7	61.3	56.3	75.9	57.3	52.2	72.2	59.3	53.3	73.4	55.3	49.2	69.7	55.8	51.8	68.1	53.8	48.8	66.3	23.3	23	35.1
8	5.6	5.8	5.3	56.8	51.8	70.8	51.2	46	65.6	54.8	48.8	68.5	49.2	43	63.3	49.7	45.7	62.2	47.7	42.7	60.5	25	24.5	35.9
10	6.2	6.5	5.9	55.3	50.3	69.7	49.1	43.8	63.8	53.3	47.3	67.4	47.1	40.8	61.5	47.8	43.8	60.3	45.8	40.8	58.5	25.5	25	36.8
16	7.9	8.2	7.6	52.2	47.2	66.3	44.3	39	58.7	50.2	44.2	64	42.3	36	56.4	43.7	39.7	56.3	41.7	36.7	54.5	25.5	25	37.9
20	8.9	9.3	8.5	50.8	45.8	64.8	41.9	36.5	56.3	48.8	42.8	62.4	39.9	33.5	53.9	41.8	37.8	54.4	39.8	34.8	52.5	25.5	25	37.6
25	10	10.4	9.5	49.3	44.3	63.3	39.3	33.9	53.8	47.3	41.3	61	37.3	30.9	51.5	39.8	35.8	52.5	37.8	32.8	50.6	24.8	24.3	37.9
31.25	11.3	11.7	10.7	47.9	42.9	61.8	36.6	31.2	51.2	45.9	39.9	59.5	34.6	28.2	48.9	37.9	33.9	50.5	35.9	30.9	48.6	24.1	23.6	37.7
62.5	16.3	17	15.3	43.4	38.4	57.3	27.1	21.4	42	41.4	35.4	55.1	25.1	18.4	39.7	31.9	27.9	44.4	29.9	24.9	42.5	22	21.5	33.5
100	21	22	19.6	40.3	35.3	54.5	19.3	13.3	34.9	38.3	32.3	52.1	17.3	10.3	32.5	27.8	23.8	40.4	25.8	20.8	38.4	20.6	20.1	31
155	26.8		24.8	37.4		51.2	10.7		26.4	35.4		49	8.7		24.1	24		36.7	22		34.7	19.3		28.9
200	30.9		28.4	35.8		48.9	4.9		20.4	33.8		46.6	2.9		18.2	21.8		34.2	19.8		32.2	18.5		28.6
250	35		32	34.3		47.4	-0.7		15.4	32.3		45.1	-2.7		13.1	19.8		32	17.8		30	17.8		28
300	38.9		35.3	33.1		45.8	-5.8		10.5	31.1		43.5	-7.8		8.2	18.3		30.1	16.3		28.2	17.3		28.1
350	42.6		38.4	32.1		44.1	-10.4		5.7	30.1		41.9	-12.4		3.5	16.9		28.4	14.9		26.5	16.8		27.4

### Material Specifications

Conductor Material	Bare copper
Insulation Material	Polyolefin
Jacket Material	PVC
Mechanical Specifications	
Pulling Tension, maximum	11.34 kg   25 lb
Environmental Specifications	
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   NEC Article 800   UL 1666   UL 444

Page 3 of 4

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### Packaging and Weights

Cable weight

27.977 kg/km | 18.8 lb/kft

Packaging Type

Reel

#### Regulatory Compliance/Certifications

#### Classification

ISO 9001:2015

Agency

Designed, manufactured and/or distributed under this quality management system

Page 4 of 4

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