



Product: [7834ANH](#)

CAT 6 4P23AWG, U/UTP, LSZH Jkt, Indoor

Product Description

CAT 6 4PR x 23AWG, U/UTP, Solid Bare Copper Conductor, PO Insulation, LSZH Jacket, Indoor

Technical Specifications

Product Overview

Suitable Applications:	Premise Horizontal Cable, Gigabit Ethernet, 100BaseTX, 100BaseVG ANYLAN, 155ATM, 622ATM, NTSC/PAL Component or Composite Video, AES/EBU, Digital Video, RS-422, 250MHz Category 6 and PoE application
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Physical Characteristics (Overall)

Conductor

AWG	Stranding	Material	No. of Pairs
23	Solid	BC - Bare Copper	4

Conductor Count:	8
Total Number of Pairs:	4

Insulation

Material	
PO - Polyolefin	
Bonded-Pair:	N/A

Color Chart

Number	Color
Pair #1	Blue & White with Blue Markings
Pair #2	Orange & White with Orange Markings
Pair #3	Green & White with Green Markings
Pair #4	Brown & White with Brown Markings

Cabling

Filler	
Central Spline	

Outer Jacket

Material	Nominal Diameter	Ripcord
LSZH - Low Smoke Zero Halogen (Flame Retardant)	5.8 mm	Yes

Electrical Characteristics

Conductor DCR

Max. Conductor DCR	Max. DCR Unbalance
93.8 Ohm/km	5 %

Capacitance

Max. Capacitance Unbalance	Nom. Mutual Capacitance
330 pF/100m	56 pF/m

Impedance

Nominal Characteristic Impedance

100 Ohm

Delay

Frequency [MHz]	Max. Delay	Max. Delay Skew
100 MHz	538 ns/100m	45 ns/100m

High Frequency

Frequency [MHz]	Max. Insertion Loss (Attenuation)	Min. NEXT [dB]	Min. PSNEXT [dB]	Min. ACR [dB]	Min. PSACR [dB]	Min. ACRF (ELFEXT) [dB]	Min. PSACRF (PSELFEXT) [dB]	Min. RL (Return Loss) [dB]
1 MHz	2.0 dB/100m	74.3 dB	72.3 dB	72.3 dB	70.3 dB	67.8 dB	64.8 dB	20.0 dB
4 MHz	3.8 dB/100m	65.3 dB	63.3 dB	61.5 dB	59.5 dB	55.8 dB	52.8 dB	23.0 dB
8 MHz	5.3 dB/100m	60.8 dB	58.8 dB	55.4 dB	53.4 dB	49.7 dB	46.7 dB	24.5 dB
10 MHz	6.0 dB/100m	59.3 dB	57.3 dB	53.3 dB	51.3 dB	47.8 dB	44.8 dB	25.0 dB
16 MHz	7.6 dB/100m	56.2 dB	54.2 dB	48.7 dB	46.7 dB	43.7 dB	40.7 dB	25.0 dB
20 MHz	8.5 dB/100m	54.8 dB	52.8 dB	46.3 dB	44.3 dB	41.8 dB	38.8 dB	25.0 dB
25 MHz	9.5 dB/100m	53.3 dB	51.3 dB	43.8 dB	41.8 dB	39.8 dB	36.8 dB	24.3 dB
31.25 MHz	10.7 dB/100m	51.9 dB	49.9 dB	41.2 dB	39.2 dB	37.9 dB	34.9 dB	23.6 dB
62.5 MHz	15.4 dB/100m	47.4 dB	45.4 dB	32.0 dB	30.0 dB	31.9 dB	28.9 dB	21.5 dB
100 MHz	19.8 dB/100m	44.3 dB	42.3 dB	24.5 dB	22.5 dB	27.8 dB	24.8 dB	20.1 dB
155 MHz	25.2 dB/100m	41.4 dB	39.4 dB	16.3 dB	14.3 dB	24.0 dB	21.0 dB	18.8 dB
200 MHz	29.0 dB/100m	39.8 dB	37.8 dB	10.8 dB	8.8 dB	21.8 dB	18.8 dB	18.0 dB
250 MHz	32.8 dB/100m	38.3 dB	36.3 dB	5.5 dB	3.5 dB	19.8 dB	16.8 dB	17.3 dB

Table Notes: Jacket sequentially marked. Typical Values are for reference only.

Voltage

Voltage Rating [V]

72 Vdc

Temperature Range

Operating Temp Range: -20°C To +75°C

Mechanical Characteristics

Oil Resistance:	Yes
Bulk Cable Weight:	39 kg/km
Max. Pull Tension:	110 N
Min. Bend Radius During Installation:	24.4 mm

Standards

NEC/(UL) Compliance:	UL444
ISO/IEC Compliance:	ISO/IEC 11801
Data Category:	Category 6
TIA/EIA Compliance:	ANSI/TIA-568-D.2 Category 6
IEEE Compliance:	IEEE 802.3bt Type1,Type2,Type3,Type4

Applicable Environmental and Other Programs

Environmental Space:	LSZH
EU Directive 2011/65/EU (RoHS 2):	Yes
EU Directive Compliance:	Yes
MII Order #39 (China RoHS):	Yes

Suitability

Suitability - Indoor:	Yes
Suitability - Non-Halogenated:	Yes
Suitability - Oil Resistance:	Yes

Flammability, LS0H, Toxicity Testing

IEC Flammability:	IEC 60332-1
Smoke Density Min Transmittance:	Min. 60% as per IEC 61034-2

IEC 60754-2 - Halogen Acid Gas Amount - Max. Conductivity:	10 μ S/mm
IEC 60754-2 - Halogen Acid Gas Amount - Min. pH:	4.3

Part Number

Variants

Item #	Color	Put-Up Type	Length
7834ANH 006A1000	Blue	Reel in Box	1,000 ft
7834ANH 006U1000	Blue	Unreel	1,000 ft
7834ANH 008A1000	Grey	Reel in Box	1,000 ft
7834ANH 008U1000	Grey	Unreel	1,000 ft

History

Update and Revision:	Revision Number: 0.49 Revision Date: 11-01-2021
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