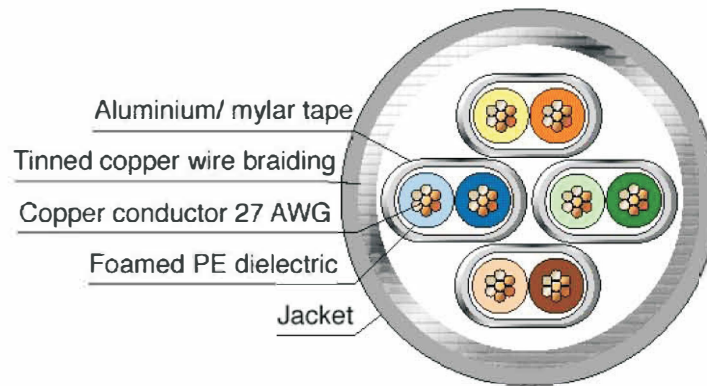


Cable: 4 Pair 27AWG Patch---LSZH

CAT6A



Reference Standards
Fire Rating

ISO/IEC 11801; IEC 61156-6; EN50173; EN50288-5-2; TIA/EIA -568B.2-1
IEC 60332-1

Construction

Conductor	Stranded anneal copper wire nom. 7x 0.142mm (AWG27)
Insulation	Foamed PE ,nom. 1.02 mm
Twisting	4 twisted pairs, 2 single conductors paired, Twisted pair color code: 1: white / blue 2: white / orange 3: white / green 4: white / brown
Cable lay up	4 pairs with different pitches stranded in circular form
Individual Shielding	A layer of aluminum-foil laminated tape will be wrapped over the twinning, the aluminum side face- out.
Shielding	Tinned copper wire braiding, normally with min. 60% coverage
Outer jacket	LSZH
Outer diameter	Nom 5.7 mm
Marking	Sterling 6a 10Gbit Cat6a PIMF 27AWG LSZH WWYY (DATE CODE)

Mechanical Properties

Bending radius	$\geq 4xOD$ without load $\geq 8xOD$ with load
Temperature range,	
during operation	-20°C up to 60°C
during installation	0°C up to 50°C

Electrical Properties (at 20°C ± 5°C)

DC resistance	max. 18.3 Ω / 100 m at 20 °C
Resistance unbalance	max. 5 % at 20 °C
Insulation resistance (500V)	min. 150 MΩ/Km at 20 °C
Mutual capacitance	nom. 4.6 nF / 100 m at 1 kHz
Capacitance unbalance (pair to ground)	max. 330 pF / 100 m at 1 kHz
Nominal velocity of propagation	78 %
Test voltage (DC, 1 min)	750V / 1 min

Cable: 4 Pair 27Awg Patch---LSZH

CAT6A

Transmission characteristics acc. to IEC 61156-6 Cat.6A (at 20 °C)

Frequency (MHz)	Impedance (Ω)	Attenuation (dB) Max.	NEXT (dB) Min.	PSNEXT (dB) Min.	ELFEXT (dB) Min.	PSELFEXT (dB) Min.
1	100 ± 15	*(3.1)	75.3	72.3	68.0	65.0
4		5.8	66.3	63.3	56.0	53.0
10		9.0	60.3	57.3	48.0	45.0
16		11.4	57.2	54.2	43.9	40.9
20		12.8	55.8	52.8	42.0	39.0
31.25		16.1	52.9	49.9	38.1	35.1
62.5	100 ±22	23.3	48.4	45.4	32.1	29.1
100		29.9	45.3	42.3	28.0	25.0
125		33.8	43.8	40.8	26.1	23.1
200		43.8	40.8	37.8	22.0	19.0
250		49.7	39.3	36.3	20.0	17.0
500	100±25	74.1	34.8	31.8	14.0	11.0

Frequency (MHz)	Return Loss (dB) Min.	Propagation Delay (ns) Max.	Delay Skew (ns) Max.
1	*(20.0)	570.0	45
4	23.0	552.0	
10	25.0	545.4	
16	25.0	543.0	
20	25.0	542.0	
31.25	23.3	540.4	
62.5	20.7	538.6	
100	19.0	537.6	
125	18.1	537.2	
200	16.4	536.5	
250	15.6	536.3	
500	15.6	535.6	

*Values shown on tables above are for reference purpose only.

CUSTOMER P/N	RAL NO.
C6A-PC-YW-500	Ref. RAL1018
C6A-PC-GR-500	Ref. RAL6032
C6A-PC-GY-500	Ref. RAL9002
C6A-PC-BL-500	Ref. RAL5015
C6A-PC-RD-500	Ref. RAL3018
C6A-PC-BK-500	Ref. RAL9004
C6A-PC-VL-500	Ref. RAL4005
C6A-PC-OR-500	Ref. RAL2003