

Cat 7 SFTP LSZH Cable

BATT Part No:	77084
Applications:	Horizontal & building backbone cable to support current and future cat 7 applications, such as 100 Base-TX, 100 Base VG AnyLan, 1000 Base-T, FDDI, 155 ATM
Conductor:	23 awg solid bare copper (0.57mm)
Insulation:	Foam skin polyolefine
Pair:	4 individually shielded twisted pairs: white & blue, white & orange, white & green, white & brown
Diameter over insulation:	1.45mm +/- 0.05mm
Cross web:	
Shield:	Tinned copper braid, coverage 40%
Ripcord:	Polyester
Sheath:	FRNC compound, grey
Overall diameter:	8.00mm +/- 0.30mm
General Characteristics	
Temperature range – operation:	-20°C to +60°C
Temperature range – installation:	0°C to +50°C
Minimum bending radius – operation:	30 mm
Minimum bending radius – installation:	60mm
Maximum pulling tension:	90N
Flame retardancy:	IEC 60332
Caloric value:	500 kJ/m
Weight	60.0 kg/km
Maximum operating voltage:	48 V rms
Max continuous current per conductor (250C):	1.4 A
Standards:	FCD ISO/IEC 11801 (Oct 2001), prEN 50288-4-1 Future standards: ISO/IEC 11801 2nd Edition, EN50173 2nd Edition



Electrical Characteristics at 20°C	
Nominal mutual capacitance at 1kHz	48 nF/km
Max conductor DCR	75 Ohm/km
Nominal Velocity of Propagation	0.75 c
Mean characteristic impedance 4-100 MHz*:	
SKEW - propagation delay difference (100MHz):	typical ≤ 15 ns/100m
Impedance 1-100 MHz:	100 +/- 15 Ohms
Impedance 100-250 MHz:	100 +/- 18 Ohms
Impedance 250-600 MHz:	100 +/- 25 Ohms

Attenuation:

Freq MHz	1	4	10	16	20	31.2	62.5	100	155	200	300	600
Spec (Min(+)* dB/100m	2	3.7	5.9	7.4	8.5	10.4	14.9	19	24	27.5	34.2	50.1
Typical dB/100m	1.9	3.5	5.4	6.9	7.6	9.6	13.6	17.4	21.7	24.7	30.5	44.6

NEXT Near end crosstalk

Freq MHz	1	4	10	16	20	31.2	62.5	100	155	200	300	600
Spec (Min(+)* dB/100m	80	80	80	80	80	80	75	72	70	68	65	61
Typical dB/100m	100	100	100	100	100	100	100	95	95	95	90	90



Power Sum NEXT

Freq MHz	1	4	10	16	20	31.2	62.5	100	155	200	300	600
Spec (Min(+)* dB/100m	77	77	77	77	77	77	72	69	67	65	62	58
Typical dB/100m	98	98	98	98	98	98	98	93	93	93	88	88

Power Sum ELFEXT

Freq MHz	1	4	10	16	20	31.2	62.5	100	155	200	300	600
Spec (Min(+)* dB/100m	75	75	71	67	65	61	55	51	47	45	41	35
Typical dB/100m	95	95	95	90	87	84	80	76	72	70	65	50

Power Sum ACR

Freq MHz	1	4	10	16	20	31.2	62.5	100	155	200	300	600
Spec (Min(+)* dB/100m	73	73	71.1	69.6	68.5	66.6	57.1	50	43	37.5	27.8	7.9
Typical dB/100m	96	94	92	91	90	88	84	75	71	68	57	43

Return Loss

Freq MHz	1	4	10	16	20	31.2	62.5	100	155	200	300	600
Spec (Min(+)* dB/100m	20	23	25	25	25	23.7	21.5	20.1	118.8	17.3	17.3	17.3
Typical dB/100m	26	30	35	35	35	34	32	31	29	29	28	28