

MulitCAT7 - 4 x (4 x 2 x AWG23/1) S/FTP - 600 MHz - PVC

- 4 x 2 x 0.57 mm (AWG 23/1) low loss solid conductors
- S/FTP (overall braid shield + foil shielded twisted pairs)
- 10GBase-T links up to 100 m
- analog and digital audio signals
- digital media over IP
- CPR class Fca

CAT 7 | CPR F CA | PVC

The C7SFEY04 multiCAT7 cable for data transmission in installations and in protected mobile operation is designed for a frequency of 600 MHz and is therefore suitable for data transmission rates of up to 10 Gbit/s up to 100 m link length. It is primarily used for data transmission in Ethernet applications 1000Base-T and 10GBase-T. The four data lines with a characteristic impedance of 100 ohms each have four stranded pairs with AWG 23/1 solid conductors. Double shielding (S/FTP) reliably prevents electromagnetic interference. We recommend the Telegärtner metal MFP8 IE series as a suitable plug connector, available from us with article number RJ45SAT-FS. The MultiCAT7 multicore cable is available both as bulk cable and as premade cable with and without cable drum. Ideal for the following possible applications such as digital media: SMPTE 2110, AVB, NDI, BLULink or audio: analog (MIC,LINE) AES/EBU, AES67, RAVENNA, Dante, AES50, AVB, MILAN, MADI, GigaACE, Ethersound, RockNet and many other multimedia applications.

design

conductor	solid bare copper wire, Ø 0.57 mm (AWG 23/1)
core insulation	foam-skin PE, Ø 1.4 mm
core stranding	2 cores twisted to a pair
cable stranding	4 data cables stranded together
element jacket	PVC, black, numbered, Ø 7.5 mm
twisting	4 shielded pairs twisted together
pair shielding	AL/PET foil
overall shield	tinned copper braid
outer jacket	PUR, black
overall diameter	22.1 mm

further properties

min. bending radius	10x overall diameter
flame retardancy	acc. to IEC 60332-1-2

maximum transmission range (device-to-device)

100Base-T (100 Mbit Ethernet)	100 m
1000Base-T (Gbit Ethernet)	100 m
10GBase-T (10 Gbit Ethernet)	100 m

electric

conductor resistance	< 80 Ω/km
mutual capacitance	43 pF/m
characteristic impedance	100 Ω ± 15%
signal speed	0.77 c
propagation delay	480 ns/100m

frequency [MHz]	attenuation [dB/100m]		PS NEXT [dB]		PS ACR-N [dB] @ 100 m		PS ACR-F [dB] @ 100m		RL [dB]	
	typical	CAT7 MAX	typical	CAT7 MIN	typical	CAT7 MIN	typical	CAT7 MIN	typical	CAT7 MIN
1	1.9	2.0	> 95	75	93.1	73	> 85	75	30	20.0
10	5.6	5.9	> 95	75	> 89.6	69.1	> 85	71.0	33	25
100	18.2	19.0	85	69.4	66.8	50.4	74.0	51.0	26	20.1
250	28.9	31.0	80	63.4	51.1	32.5	60.0	43	25	17.3
500	41.7	45.3	76	58.9	34.3	13.7	51.0	37	23	17.3
600	45.9	50.1	74	57.7	28.1	7.6	46.0	35.4	22	17.3

order code	type	outer jacket	cable color	weight kg/m	standard lengths m
C7SFEY04	S/FTP	PVC	black	0.51	50 / 100

technical specifications are subject to change

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