

Legrand cabling system LCS²

Compliance of the LCS² systems with standards and certifications

LCS² systems and components (de-embedded) conform to the following standards:

- TIA/EIA 568C
- EN 50173-1 and EN 50173-2
- ISO/IEC 11801 version 2

The LCS² system supports 10G applications Base-T up to 100 m in a transmission channel. Conforms with standards ISO/IEC 24750, TIA TSB 155 and IEEE 802.3 an.

The Ea link class of the LCS² system also conforms with amendment 1 (04/2008) of standard ISO 11801 and its components conform with amendment 2.

LCS² systems are certified by expert independent laboratory 3P



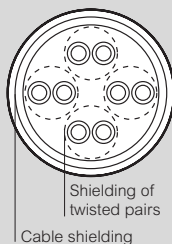
Main characteristics of the LCS² systems

	LCS ² 6A		LCS ² 6		LCS ² 5e
Frequency	500 Mhz		250 MHz		100 Mhz
Speed	10 Gbit/s		1 Gbit/s		1 Gbit/s
Wiring	Copper	FO	Copper	FO	Copper
Connectors	RJ 45	SC-LC...	RJ 45	SC-LC...	RJ 45
Length cable max.	100 m	variable	100 m	variable	100 m

New names for LAN cables (according to ISO 11801-2)

They correspond to: "type of cable shield"/ "type of twisted pair shield" TP monitoring (for twisted pairs)

Type of cable		Shield of the cable	Shield of pairs twisted
old name	new name		
SSTP	S/FTP	S: screen made up	F: screen formed a metal braid of a ribbon alumin/ polyester
SFTP	SF/UTP	SF: combination of ribbon + braid	U: no screen
STP	U/FTP	U: no screen	F: screen formed of a ribbon alumin/ polyester
FTP	F/UTP	F: screen formed of a ribbon alumin/ polyester	U: no screen
UTP	U/UTP	U: no screen	U: no screen



Area distribution boxes

Compliance with standards:

Area distribution box: TIA/EIA 568
UTE C 15-900
NF C 15-100 - NF C 20-730
EN 50-174.2
ISO 11801
EN 50173
IEC 60950

Cords and cables: ISO 11801 id.2.0, EN 50173-1, TIA/EIA 568

General characteristics:

- 6 or 12 incoming ports (depending on Cat.No) RJ 45 wiring
- 4 to 8 or 12 outgoing ports (depending on Cat.No) maximum Connection of mixed cords via RJ 45 connector (RJ 45/stripped)
- UTP, FTP and STP versions
- Cat. 6A, 6 and 5e
- for computer applications; telephone, access control etc.

Technical characteristics:

- material: Polycarbonate PC hood
Polypropylene PP base
- colour: RAL 7035
- Weatherproofing protection index: IP 21
- Mechanical shock protection index: IK 07
- hold connector units in place in the box: 100 N
- Cables anchored on support using Colring cable ties

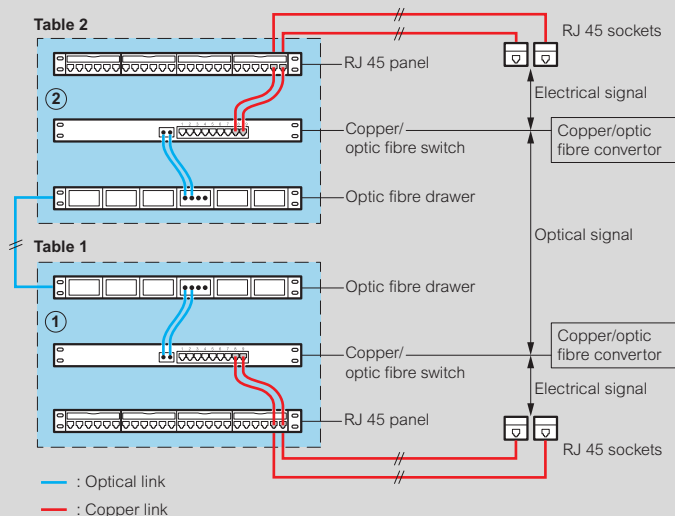
Fibre optic

New optical classes ISO 11801 2nd Ed.

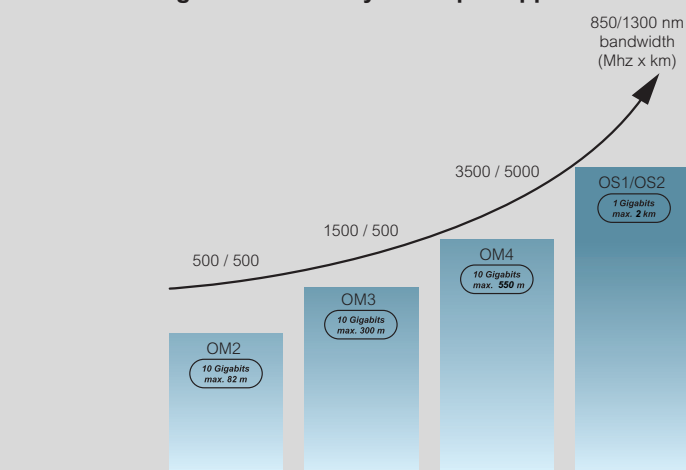
Parameters of the optical link (ISO 11801/EN 50173)

Parameter	Multimode		Monomode	
	850 nm	1 300 nm	1 310 nm	1 550 nm
Fibre attenuation dB/km	3.5 max.	1.5 max.	1.0	1.0
Bandwidth MHz.km	200 min.	500 min.	n/a	n/a
Connector attenuation dB	0.75 max.	0.75 max.	0.75 max.	0.75 max.
Return loss dB	20 min.	20 min.	26 min.	26 min.

Typical layout of an optical link between 2 distribution blocks



Maximal length of channel by fibre optic application



Applications	Multimode			Monomode
	OM2	OM3	OM4	OS1/OS2
10 Gigabits Ethernet (S/R base)	82 m	300 m	550 m ⁽¹⁾	NA
Giga Ethernet (LX base)	550 m	550 m	550 m	2 km
Giga Ethernet (SX base)	550 m	550 m	1100 m	NA

■ TIA 568

□ Applications IEEE 802.3

¹: Engineered solution using a max. cabled fibre attenuation of 3.0 dB/km. If not distance is of 400 m