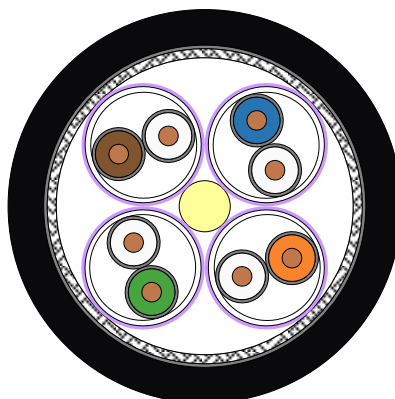


# SeaLine®

CAT 7 (PH120<sup>+</sup> = CAT 6<sub>A</sub>)

Cable type: 02YS(FE)C(FE)H 4X2X0.6/1.67-100 PIMF BK



## Design

### Wire

Solid bare copper wire (23/1 AWG)  
Insulation of foamed Polyethylene (PE) with skin  
Flame retardant foil, overlapped

∅ 0.6 mm (0.024 in dia)  
∅ 1.4 mm (0.055 in dia)

### Screened pair

2 wires twisted to a pair  
Plastic tape overlapped  
Alulaminat foil overlapped

### Core

Central element: Strain relief (≥ 300N)  
4 screened pairs  
Sequence of colors: WH/BU-WH/OG-WH/GN-WH/BN  
Shield braiding of tinned copper wires  
Coverage about 65%  
Flame retardant foil, overlapped

∅ 8.4 mm (0.331 in dia)

### Jacket

Thermoplastic copolymer (FRNC) BK

∅ (10.4 ±0.3) mm (0.409 ±0.012 in dia)

Printing: "sequential length in metres" LEONI L SeaLine® \* L45467-J416-C616 02YS(FE)C(FE)H 4X2X0.60/1.67-100 PIMF CAT7 FIRE RESISTANT FE90 IEC 60331-23 \* IEC 60332-3-22 SHF1 \* "internal lot number"

## Electrical data at 20°C

Loop resistance	≤	150	Ohm/km
Insulation resistance	≥	500	MOhm*km
Signal run time	≤	5.3	ns/m
Capacitance (1 kHz)	≈	42	nF/km
Operating voltage (peak)	≤	30	V
Characteristic impedance 100 MHz	(100 ±5)		Ohm
Surface transfer impedance 10 MHz		10	mOhm/m

Test voltage (wire/wire/screen rms 50Hz 1min)

700 V

Frequency (MHz)	1	4	10	16	20	31.25	62.5	100	155	200	300	600
Next (dB)	80	80	80	80	80	80	75.1	72.4	69.6	67.9	65.3	60.8
PSNext (dB)	77	77	77	77	77	77	72.5	69.4	66.6	64.9	62.3	57.8
ELFext (dB)	80	80	74.0	69.9	68	64.1	58.1	54	50.2	48	44.5	38.4
PSELfext (dB)	77	77	71	66.9	65	61.1	55.1	51	47.2	45.0	41.5	35.4
Attenuation dB/100m)	2.0	3.6	5.7	7.2	8.1	10.1	14.5	18.5	23.4	26.8	33.3	48.9
Frequency (MHz)	4	8	10	16	20	31.25	62.5	100	155	250	350	600
Return loss (dB)	23.1	24.5	25	25	25	23.6	21.5	20.1	18.8	17.3	17.3	17.3

Electrical requirements acc. to. EN 50288-4-1 (2014)

### Mechanical and thermal characteristics

Insulating material acc. to DIN EN 50290-2-23 (VDE 0819), table 2/A (HD 624.3) (02Y)

Jacket material acc. to IEC 60092-360 (IEC 60092-359) SHF1

Functional integrity under fire conditions similar to EN 50200 (> PH120), EN 50289-4-16 and IEC 61156-5 (Cat 6<sub>A</sub>)

Insulation effect under fire conditions acc. to IEC 60331-23, FE180

Flame retardant acc. to IEC 60332-3-22 (Cat. A)

Flame retardant acc. to IEC 60332-3-24 (Cat. C)

Flame retardant acc. to IEC 60332-1-2

Approved for Marine and Offshore Applications

DNV - GL Certificate No. TAE000019E

### Other characteristics:

RoHS compliant (Directive 2011/65/EC)

Fire retardant, Zero Halogen

Halogen free acc. to IEC 60754-1/2

Smoke-density acc. to IEC 61034-1/2

UV-resistant

Permissible temperature range

Transport, installation and operating: -40 °C (-40 °F) up to 80 °C (176 °F)

Min. bending radius allowed: repeated 15X  $\varnothing$ , single 10X  $\varnothing$

Weight about : 129 kg/km (87 lb/1000ft)

### Designation of order:

L45467-J416-C616

231491

02YS(FE)C(FE)H 4X2X0.6/1.67-100 PIMF SW

500 m (1640 ft) on non-returnable reel