



## Construction

<b>Conductor</b>	Bare copper wire Diameter: 0,50 mm (AWG24)
<b>Insulation</b>	Polyethylene Diameter: 0,90 mm
<b>Assembly</b>	Two insulated conductors twisted together as a pair
<b>Pair Screen</b>	-
<b>General assembly</b>	4 twisted pairs laid up together
<b>Overall screen</b>	-
<b>Outer sheath</b>	Halogen free compound Standard colour: Grey (RAL 7035)

## Technical characteristics

<b>Outer diameter</b>	5,1 mm
<b>Weight</b>	36 Kg/Km
<b>Operating T<sup>a</sup></b>	Fixed installation: -20°C to +60°C During installation: 0°C to +50°C
<b>Min. bending radius</b>	Fixed installation (without load): 4xD During installation (with load): 8xD
<b>Loop resistance</b>	190 Ohm/Km Max.
<b>Resistance unbalance</b>	2% Max.
<b>Insulation resistance</b>	2000 MOhm*Km Min. (500V)
<b>Mutual capacitance</b>	Nominal 48 pF/m (at 800Hz)
<b>Capacitance unbalance</b>	1500 pF/Km Max. (Pair-Ground)
<b>Characteristic Impedance</b>	100 ± 5 Ohm (at 100 MHz)
<b>Velocity of propagation</b>	67%
<b>Propagation delay</b>	Nominal 535 ns/100m
<b>Test Voltage</b>	1000 V (DC, 1 min)
<b>Transfer Impedance</b>	-
<b>Coupling attenuation</b>	40 dB Min.
<b>Segregation class</b>	-

## Application

Halogen free data transmission cable for local area networks (LAN).  
Primary(Campus), Secondary (Riser), Tertiary (Horizontal)  
IEEE 803.3: 10Base-T, 100Base-T, 1000Base-T  
IEEE 802.5 16Mb; ISDN; TPDDI; ATM  
Power over Ethernet (PoE) / Poe+

\* CPR:

Cable suitable to be installed under the requirements of the CPR (Construction Product Regulation (EU) N ° 305/2011) in accordance with the classification (Euroclass) specified in this document.

## Standards / Properties

**Halogen free**

UNE-EN 60754-1 (IEC 60754-1)

**Flame Retardant**

UNE-EN 60332-1 (IEC 60332-1)

**CPR Classification (Euroclass)**

Dca-s2,d2,a2

(According to UNE-EN 50575)

**Ref. standard for drawing**

TIA/EIA-568-C.2

ISO/IEC 11801; IEC 61156-5

EN 50173; EN 50288-3-1

IEEE 802.3at

**Low corrosivity**

UNE-EN 60754-2 (IEC 60754-2)

(pH  $\geq$  4,3 ; conductivity  $\leq$  10 $\mu$ S/mm)

**Low smoke emission**

UNE-EN 61034 (IEC 61034)



flame retardant



halogen free



low corrosivity



low smoke  
opacity



## Article Table

Code	Cable	Supply
14450046	U/UTP Cat.5e 4x2xAWG24 LSHF	Box 305mts

## Colour table

PAIR N°	Conductor A	Conductor B
1	Blue	White/Blue
2	Orange	White/Orange
3	Green	White/Green
4	Brown	White/Brown

## Electrical Data

Freq.(MHz)	** Attenuation	*NEXT	*PSNEXT	**ACR	**PS-ACR	**ACRF	**PS-ACRF	*RL
1	1.9	71	68	69.1	66.1	68	65	20
4	3.7	62	59	58.3	55.3	56	53	23
10	6	56	53	50	47	48	45	25
16	7.6	53	50	45.4	42.4	44	41	25
20	8.5	51	48	42.5	39.5	42	39	25
31.2	10.7	49	46	38.3	35.3	38	35	24
62.5	15.7	44	41	28.3	25.3	32	29	22
100	19.8	41	38	21.2	18.2	28	25	20
125	22.3	40	37	17.7	14.7	26	23	19
155.5	24.2	38	35	13.8	10.8	24	21	-
175	25.7	37	34	11.3	8.3	23	20	-
200	25.7	36	33	8.5	5.5	22	19	-
250	29.2	35	32	5.8	2.8	20	17	-
300	32	34	31	2	-1	16	13	-

Units: \* = dB / \*\* = dB/100m