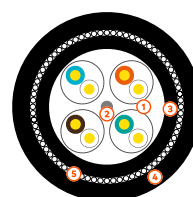




## COPPER CABLE CAT6A U/FTP SWA LSZH-PE - 23 AWG - 0,56mm

### DESCRIPTION

Performance specified up to 500 MHz.  
Foil shielding on each pair (U/FTP) to reduce crosstalk and external interference.  
Supplied with decreasing length cable marking for easy identification and reduced installation time and waste  
Designed to support all Class EA protocols including 10GBASE-T. Suitable for PoE, PoE+, PoE++ and 4PPoE applications.  
Steel wire armouring (SWA) provides mechanical protection for direct burial and harsh environments.



- 1 Mylar
- 2 Drain Wire
- 3 Inner Jacket
- 4 Outer Jacket
- 5 Armored



### APPLICABLE STANDARDS

#### Electrical Performance

• ISO/IEC 11801 • EN 50173 • EN 50174 • ANSI/ TIA-568-D.2

#### PoE

• IEEE 802.3bt PoE Type 1, 2, 3 and 4

### CONSTRUCTION

Category		CAT6A U/FTP		
Conductor	Material	Solid Bare Copper		
	Nom O.D.	0,560 ± 0,005 mm 0,022 in		
Insulation	Material	Foamed PE		
	Diameter	1,34 ± 0,05 mm 0,053 in		
Outer Sheath	Thickness	1,8 ± 0,20 mm 0,071 ± 0,020 in		
	External O.D.	11,9 ± 0,60 mm 0,469 ± 0,024 in		
	Material	PE (complies RoHS)		
	Color	Black (RAL9005)		
	External O.D.	8,10 ± 0,50 mm 0,319 ± 0,020 in		
Inner Sheath	Material	LSZH		
	Color	Black (RAL9004)		
Armor	Thickness	0,9 mm		
	Material	Galvanized Steel Wire Spiral		
	Coverage	≥90%		
Rip-cord	No			
Core Color	Pair 1	White & Blue / Blue	Pair 2	White & Orange / Orange
	Pair 3	White & Green / Green	Pair 4	White & Brown / Brown

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The pictures/drawings are merely illustrative.

More information: [info@barpa.eu](mailto:info@barpa.eu) or in [www.barpa.eu](http://www.barpa.eu)

datasheet nº b194\_0 | date: 06/25

approved by: Ana Barbosa



COPPER CABLE CAT6A U/FTP  
SWA LSZH-PE - 23 AWG - 0,56mm

#### SHEATH PHYSICAL PROPERTIES

Before Aging Tensile Strength (Mpa)	≥ 9,65
Before Aging Elongation (%)	≥ 300
Aging Period (°C x hrs)	100 x 48
After Aging Elongation (%)	≥ 75
Cold bend (-20±2°C x 4h)	8xCable O.D., No visible cracks

#### ELECTRICAL CHARACTERISTICS (20°C)

	Typical barpa values	Standard values
1-500MHz - Impedance (Ω)	100 ± 15	-
1-500MHz - Delay Skew (ns/100m)	≤ 45	≤ 45
DC Resistance (Ω/100m)	≤ 9,5	≤ 9,38
DC Conductor Resistance Unbalance (%)	0,5% in pairs; 1,2% between pairs	≤ 5,0
Unbalanced to Ground Capacitance (pf/100m)	≤ 160	≤ 330
1-500MHz - Velocity of Propagation (%) - NVP	70	-
Insulation Resistance (MΩ.km)	> 5000	-

#### TECHNICAL PERFORMANCE (100m || 328ft.)

Frequency (MHz)	Attenuation ≤ dB		Return Loss ≥ dB		NEXT ≥ dB		PSNEXT ≥ dB		ACRF ≥ dB		PSACRF ≥ dB	
	GWC	BT	GWC	BT	GWC	BT	GWC	BT	GWC	BT	GWC	BT
1	3,0	1,8	19,1	22	65,0	100	62,0	95	64,2	95	61,2	90
4	3,5	3,2	21,0	30	64,1	100	61,8	95	52,1	95	49,1	90
8	5,0	3,6	21,0	30	59,4	95	57,0	90	46,1	90	43,1	85
10	5,5	5,0	21,0	30	57,8	95	55,5	90	44,2	90	41,2	85
16	7,0	6,2	20,0	35	54,6	95	52,2	90	40,1	90	37,1	85
20	7,8	7,1	19,5	35	53,1	95	50,7	90	38,2	90	35,2	85
25	8,8	8,0	19,0	35	51,5	95	49,1	90	36,2	90	33,2	85
31,25	9,8	8,9	18,5	33	50,0	90	47,5	85	34,3	85	31,3	80
62,5	14,0	12,8	16,0	33	45,1	90	42,7	85	28,3	85	25,3	80
100	18,0	16,2	14,0	30	41,8	90	39,3	85	24,2	85	21,2	80
200	26,1	23,1	11,0	30	36,9	85	34,3	80	18,2	80	15,2	75
250	29,5	26,1	10,0	25	35,3	85	32,7	80	16,2	80	13,2	75
300	32,7	28,7	9,2	25	34,0	80	31,4	75	14,6	75	11,6	70
400	38,4	33,3	8,0	20	29,9	80	27,1	75	12,1	75	9,1	70
500	43,8	37,5	8,0	20	26,7	80	23,8	75	10,2	75	7,2	70

GWC = Guaranteed Worst Case // BT = barpa Typical



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### INSTALLATION

Temperature Range (Operation)	-20°C to +80°C	Temperature Range (Installation)	0°C to +60°C
Min. Bending Radius (Operation)	20x cable diameter	Max. Tensile Load (Installation)	100N

### CABLE MARK

barpa (code) category 6A U-FTP Armored SWA LSZH+PE CU cable 4 pair 23 AWG Verified to ISO/IEC11801, EN 50173, EN 50174 CLASS Fca  
NVP-70\_\_m (produce date)

### ORDER INFORMATION

Code	Description	Type of package	Size package (mm)	Gross Weight (kg/item)	Net Weight (kg/item)	Quantity (m)	EAN Code
82223864050	Cable Cat.6A U/FTP SWA LSZH-PE	Drum	570x200x460	132	125	500	5608445045225

### PACKAGING

This images are merely illustratives. We want you to see the importance we attach to the packaging. We always work with products and materials that are easy to use. The drum material is Plywood. The Cat.6A S/FTP SWA LSZH-PE cable is black.



As part of our goal to achieve quality excellence, our barpa System Warranty can give you 25 years products and solution assurance of compliance with the industry performance standard comparing with the class installed. This warranty applies to network infrastructure installations that was made by an approved barpa Partner using an barpa solution (end-to-end).  
For more informations go to our website.

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