



Cat6a Eco Series

Shielded U/FTP LSZH EuroClass: Dca

Key Features

- 500*MHz Class Ea Bandwidth Performance
- PoE Rated 30W/60W
- 3rd Party ETL Verified
- LSZH for Higher Fire Safety
- CPR EuroClass: Dca-s2,d2,a1
- Limited Lifetime Warranty*
- SCP Eco Reel-in-Box
- Uses Wood/Cardboard Spool Inside Box, No Plastic
- Reinforced handles for improved performance
- Environmental Friendly
- Recyclable & Reusable
- Industry Leading Zone and Outlet Legend

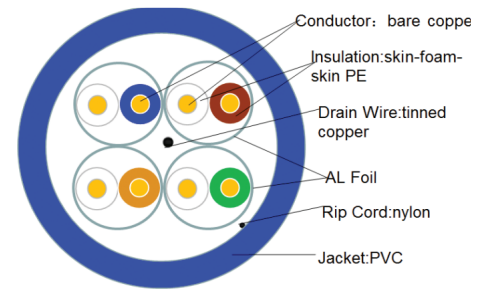
*Details at www.scpcat5e.com/warranties

Description

Cat6a Eco Series Shielded U/FTP LSZH - 500*MHz ETL Verified 23 AWG Solid BC, 4PR, U/FTP, Class Ea, PoE Type 2/3 30W/60W, CPR EuroClass: Dca-s2,d2,a1, LSZH Jacket

Applications

Supports all Category 6a and Class Ea applications including structured cabling for horizontal and building backbone, Ethernet 10/100/1000/10GBASE-T, indoor use, fixed installations, Power Over Ethernet (PoE), and other high bandwidth applications.



Construction

Conductor	Material	Bare Copper	Shielding/Screen	Type	Each Pair Shielded U/FTP
	Solid/Stranded	Solid (0.55)		Material	Al Foil
	Size	23 AWG			
	Insulation Material	Skin-foam-skin PE		Drain Wire	Tinned Copper
	Insulation OD	0.35mm			0.40+/-0.01mm
	Color Code	Per ANSI/TIA 568.2-D		Jacket/Sheath	Material
Pair Separator/ Spline	Twisted Pair	4P/2 Cores to Pair	Overall Cable Diameter (OD)	Nominal Jacket Thickness	LSZH
	Insulated Conductor OD	1.28+/-0.05mm		Color Code	0.55mm avg Per Request
Rip Cord	Material	na			
	Spline OD	na			

Mechanical Properties

Bend Radius	Min Bend Radius (Installation)	8x Outer Diameter
	Min Bend Radius (Operation)	4x Outer Diameter
Maximum Pulling Tension	85N	
Insulation Tensile Strength	Unaged / Elongation %	12.3Mpa / 150%
	Aged / Elongation %	9.8Mpa / 100%
Jacket/Screen Tensile Strength	Unaged / Elongation %	10.0Mpa / 100%
	Aged / Elongation %	8.0Mpa / 50%
Cable Cold Bend (-20°C for 4 hrs)	No Crack	

Environmental Parameters

Temperature Range - Operating	-20°C to 75°C (-4°F to 167°F)
Temperature Range - Installation	0°C to 40°C (32°F to 104°F)
Temperature Range - Storage	0°C to 40°C (32°F to 104°F)

Environmental Compliance

RoHS Compliant: RoHS II/III, EU/UK RoHS
REACH, WEEE Directive, WFD:2023, SCIP:2023, POPs (EU) No 2019/1021
Reel-in-Box - No Plastic. Recyclable. Improved Environmental Impact

Rev. 04252Z

Electrical Characteristics

Bandwidth per TIA Standard	500MHz	Capacitance Unbalance pair-to-ground	Max 3300 pf/km
Maximum Bandwidth as Tested	500MHz	Characteristic Impedance	100 +/- 15 Ohm
Conductor Resistance (at 20°C)	Max 93.8 Ohm/km	Coupling Attenuation	≥55dB @30-100MHz
Dielectric Strength	Min AC1.5KV	Nominal Velocity of Propagation % (NVP)	≥74-78
Spark Test	2.5KV	Rated Voltage	Insulated 300V
AC Leakage Current thru Jacket/Screen	na		Operating Low Voltage 80V
Resistance Unbalance	Max 5%	Delay Skew	Max 45ns / 100m
Insulation Resistance	min 5000MΩ.km	PoE Rating	802.3at/bt Type 2/3 30W/60W
Mutual Capacitance	5600pF/100m	Transverse Conversion Loss (TCL)	30 – 10log(f /100) @1-500MHz

Standards Reference

Manufactured in Accordance to: ANSI/TIA 568.2-D, ISO/IEC 11801 Class Ea, EN 50288-5-1, ISO/IEC 61156-5, EN 50173-1, EN 50288-6-1, EN 50575

CPR EuroClass: Dca-s2,d2,a1

Reaction to Fire: BS EN 13501-6; EN ISO 1716; EN 50399, BS EN 60332-1-2; BS EN 61034-2; BS EN 60754-1&2

Power Over Ethernet (PoE): IEEE 802.3at/bt Type 2/3 (30W/60W)

Power Over HDBaseT (PoH): Yes

3rd Party Certification: ETL Verified

Cable Jacket Markings

Structured Cable Products --- CAT6ASH-ECO-LS-XX --- Cat6a Eco U/FTP LSZH Series 500*MHz ETL Verified ANSI/TIA 568.2-D ISO/IEC 11801 Class Ea 4PR 23 AWG SOL BC U/FTP 75°C EN50575 Dca-s2,d2,a1 LSZH JKT CE RoHS ZONE/DEVICE A B C D E 0 1 2 3 4 5 6 7 8 9 *** Feet (or Meters) MM/YYYY

Above jacket markings are an example for reference purposes. All SCP jacket markings include descending feet or meter markings and our industry leading zone and outlet legend for easy cable identification during installation.

Performance Data*

Bandwidth MHz	Attenuation Max (dB/100m)		NEXT Min (dB)		PS NEXT Min (dB)		ACR Min (dB)		RL Min (dB)		ELFEXT Min (dB)		PS ELFEXT Min (dB)		PSACR Min (dB)	
	Standard	SCP	Standard	SCP	Standard	SCP	Standard	SCP	Standard	SCP	Standard	SCP	Standard	SCP	Standard	SCP
1	2.1	1.9	74.3	80.3	72.3	76.6	72.3	78.4	20	23.6	67.8	75.6	64.8	73.3	70.3	74.7
4	3.8	3.7	65.3	75.6	63.3	74.2	61.5	71.9	23	23.9	55.8	61.3	52.8	60.1	59.5	70.5
8	5.3	5.1	60.8	66	58.8	65.1	55.5	60.9	24.5	30	49.7	55.7	46.7	54.8	53.5	60
10	5.9	5.8	59.3	67.6	57.3	65.9	53.3	61.8	25	28.5	47.8	55.2	44.8	53.2	51.3	60.1
16	7.5	7.4	56.2	70.8	54.2	67.2	48.6	63.4	25	28.2	43.7	49.7	40.7	48.1	46.6	59.8
20	8.4	8.2	54.8	71.9	52.8	69.1	46.3	63.7	25	27.8	41.8	48.1	38.8	46.2	44.3	60.9
25	9.4	9.1	53.3	62.3	51.3	60.8	43.8	53.2	24.3	27.5	39.8	45.9	36.8	45	41.8	51.7
100	19.1	18.8	44.3	60	42.3	58	24.5	41.2	20.1	23.5	27.8	35	24.8	33.2	22.5	39.2
200	27.6	27.4	39.8	57.5	37.8	56	10.8	30.1	18	23.2	21.8	32.8	18.8	30.2	8.8	28.6
250	31.1	29.4	38.3	55.8	36.3	54.1	5.5	26.4	17.3	21.5	19.8	30.7	16.8	27.7	3.5	24.7
300	34.3	33.3	37.1	54.2	35.1	53.4	0.7	20.9	16.8	20.8	18.3	26.5	15.3	25.4	---	---
400	43	38.6	35.3	53.8	33.3	52.1	---	---	15.9	18.9	15.8	23.4	12.8	22.1	---	---
500	45.3	43.9	33.8	51	31.8	49.3	---	---	15.2	18.6	13.8	19.5	10.8	18.7	---	---



Part Numbers

Item No.	UPC	Jacket Color	Package Length	Package Type	Package Weigth (lb/kg)	Item Dimensions (mm)
North America:						
Not available at this time						
EU (EMEA)						
CAT6ASH-ECO-LS-BK	810093726134	Black	1000ft/305m	Reel-in-Box	39.9/16	385x325x385
CAT6ASH-ECO-LS-BL	810093726141	Blue	1000ft/305m	Reel-in-Box	39.9/16	385x325x385
CAT6ASH-ECO-LS-WT	810093726158	White	1000ft/305m	Reel-in-Box	39.9/16	385x325x385