

CABLES & INTERCONNECTS



 **ZHAOLONG**

LAN CABLE/ 网线

CAT 5e



Features/ 特点

compliant with/ 符合:

- ANSI/TIA-568-C.2 5e standards
- ISO/IEC11801 ClassD level

Application/ 应用:

- 100Base-TX · 100Base-T · 100VGAnyLAN
- 1000Base-T (GigabitEthernet)
- 1000Base-TX · ATM

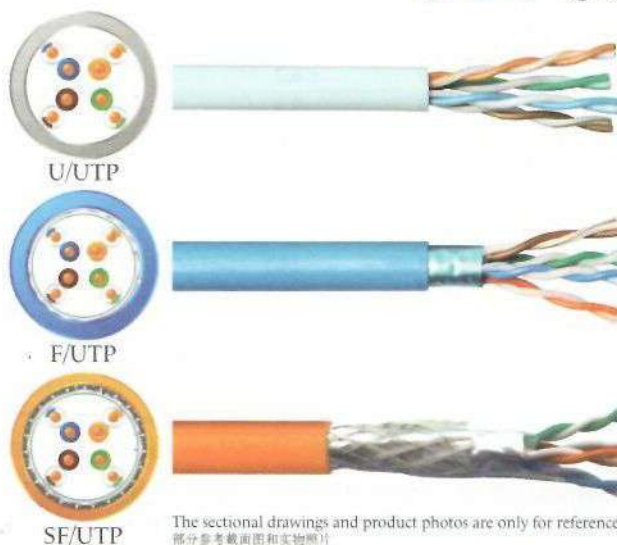
Reference Standards/ 参考标准

- UL444 · UL1581 · UL1666 · IEC 60332-1
- IEC 60332-3-24 · EN50399

Testing Standards/ 测试标准

- ISO/IEC11801 · ANSI/TIA-568-C.2

Physical Parameters/ 物理参数



The sectional drawings and product photos are only for reference
部分参考截面图和实物照片

Conductor/ 导体	Solid Bare Copper/ 实心裸铜
Insulation Materials/ 绝缘材料	High Density Polyethylene / 高密度聚乙烯
Insulation Diameter/ 绝缘直径	0.88mm Nom (solial insulation/ 实心绝缘) 1.00mm Nom. (solial insulation/ 实心绝缘)
Overall Shield/ 屏蔽总屏蔽	Aluminum Foiled / 铝箔
Double Overall Shield/ 双层总屏蔽	Aluminum Foiled+ Braiding / 铝箔+ 编织
Jacket Diameter/ 护套直径	5.0mm Nom. (U/UTP) 6.2mm Nom. (F / UTP) 6.6mm Nom. (SF / UTP) (5.0/10.8)mm Nom. (U/UTP duplex/ 双拼) (6.4/13.5)mm Nom. (F/UTP duplex/ 双拼) (5.4/2.6)mm Nom. (U/UTP aerial/ 自承) (6.4/2.6)mm Nom. (F/UTP aerial/ 自承)
Jacket Material/ 护套材料	PVC or LSZH or PE(depending on the jackets/ 根据不同的护套) Compliant with RoHS and REACH / 符合 RoHS 和 REACH 要求
Operating Temperature/ 工作温度	- 30 °C ~ + 50 °C (LSZH/PE) - 20 °C ~ + 50 °C (PVC)

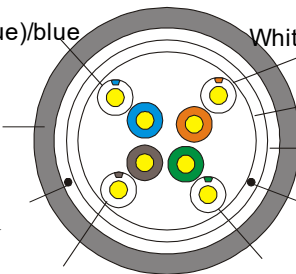
Electrical Parameters/ 电气参数 (20°C)

Transmission Delay Skew/ 传输延时差	≤45ns / 100m
Transmission Speed/ 传输速度	69%
Capacitance/ 电容	≤ 5.6nf / 100m
DC Conductor Resistance/ 直流电阻	9.5Ω / 100m
DC Conductor Resistance Unbalance/ 直流电阻不平衡	≤ 5%
Capacitance to Ground Capacitance / 对地电容不平衡	≤ 330pf / 100m

Telecommunication cable F/UTP 4Pairs cable-category5E- PVC Sheath

P/N: ZL-126-2302-001

Content of the Data Sheet

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Sheath Printing	TBD									
Customer No.		Customer Reference			White(blue)/blue White-Orange/Orange White- Brown /Brown White(green)/green Sheath Rip-cord Mylar AL/Mylar Drain wire 					
Category	F/UTP CAT5E-4P-PVC									
Reference Standard	ISO/IEC11801、ANSI/TIA-568-C.2									
Conductor	Material	Solid-Bare Copper								
	Nom.O.D.(mm)	0.500	up	+0.01						
Insulation	Material	HDPE								
	Diameter	1.00±0.05 mm								
Screening Material	Mylar+ AL/Mylar									
Sheath	Thickness	0.55±0.05mm			Technical Performance (100m):					
	External O.D.	6.2±0.4 mm			Frequency RL (MHz)	ATT (20℃) (dB)	NEXT (dB)	PHASE DELAY (ns)		
	Surface	Clean ,Frap,Satiation			1	20.0	—	65.3	570.00	
	Material	PVC(complies RoHS)			4	23.0	4.1	56.3	552.00	
	Color	Blue			8	24.5	5.8	51.8	546.73	
Surface Printing	Letter height	3.0±0.3mm			10	25.0	6.5	50.3	545.38	
	Color	Black			16	25.0	8.2	47.2	543.00	
	Print error & Space	≤±0.5%, 1m			20	25.0	9.3	45.8	542.05	
Core Color	1 White- Blue /Blue	2 White-Orange /Orange			25	24.3	10.4	44.3	541.20	
	3 White- Green /Green	4 White- Brown /Brown			31.25	23.6	11.7	42.9	540.44	
Packing	Wooden Tray & Carton				62.5	21.5	17.0	38.4	538.55	
Carton dimension	According to the requires				100	20.1	22.0	35.3	537.60	
Packing length	305±1.5m				Frequency (MHz)	PSNEXT (dB)	ELFEXT (dB)	PSELFEXT (dB)		
Rip-cord	Yes	Drain wire	Yes		1	62.3	63.8	60.8		
Sheath Physical Properties	Before Aging Tensile Strength (Mpa) ≥13.5				4	53.3	51.8	48.8		
	Elongation(%) ≥150				8	48.8	45.7	42.7		
	Aging Period((℃×hrs) 100℃×24h×7d				10	47.3	43.8	40.8		
	After Aging Tensile Strength(Mpa) ≥12.5				16	44.4	39.7	36.7		
	Elongation(%) ≥125				20	42.8	37.8	34.8		
Electrical Characteristics (20℃)	Cold bend(-20±2℃×4h) 8×Cable O.D., No visible cracks				25	41.3	35.8	32.8		
	1.0-100.0MHz	Impedance(Ω)	100±15		31.25	39.9	33.9	30.9		
	1.0-100.0MHz	Delay Skew (ns/100m)	≤45		62.5	35.4	27.9	24.9		
	unbalanced-to-ground capacitance (pf/100m)		max 330		100	32.3	23.8	20.8		
	DC Resistance (Ω/100m)		max 9.5							
DC Conductor Resistance Unbalance (%)		max 5.0								
Voltage ≤ 70V										
Version	A/01	Date	2022-07-12	Revised By	Caihanglie	Audited By	Nidonghua	Approved By	Nidonghua	

Number	Revise Contents	Revise Reasons	Revised By	Audited By	Approved By	Date
A/01	Specification Version 1		Caihangle	Nidonghua	Nidonghua	2022-07-12

