

8klink

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1	2023/11/21	A0	1~9	Add new control	Yuhai Zhao

Approval	Audit	Develop	Set Date	2023.11.21
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1. Product introduction:

The 8K-Link USB 3.2 GEN 2 AOC uses optical fiber to transmit high-speed signals, use copper wires to transmit low-speed signals and power supply, which solves the problem of traditional copper wires not being able to transmit over long distances.

Moreover, optical fiber transmission data can better protect against electromagnetic and radio frequency interference, which can be used for longer-distance signal transmission.

Application: With 8K-Link USB AOC, all USB2.0 and USB3.2 GEN 2 devices can be installed anywhere in the room while hiding the host computer from sight. 8K-Link USB AOC adopts optical fiber transparent transmission technology, which reduces cost and complexity and makes it easy to eliminate fault points. Long-distance USB AOC cables for commercial installations on walls, above ceilings, through raceways and conduits, with transfer speeds up to 10 Gbps, and are flame-retardant rated and ECA certified.

2. Main features

- Standard USB Type A Male and Type C Male interfaces, compliant with the USB specification.
- Support USB3.2 Gen2 signal transmission maximum rate of 10Gbps.



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- Supply power maximum 300mA/5V to devices.
- Low power consumption, no need extra power supply
- Support hot plug, plug and play no need extra drive.
- Support long distance signal transmission
- Lighter and thinner, the weight and volume reduce over 70% compare copper cables.
- Good EMI resistance performance.

Item	8klink USB AOC	Copper USB 3.2	Ordinary USB AOC
Length	40M	Maximum 3M	Maximum 5M
Maximum rate	10 Gbps	5 Gbps	5Gbps
Compatible with USB 3.X	Yes	Yes	Yes
Compatible with USB 2.0	Yes	Yes	No
Plenum rated, ECA Compliant	Yes	No	No
Installation in tubes	Yes	No	NO
Use with self-powered devices and hubs	Yes	Yes	Yes
For use with bus-powered devices and hubs	No	Yes	No

3. Physical picture



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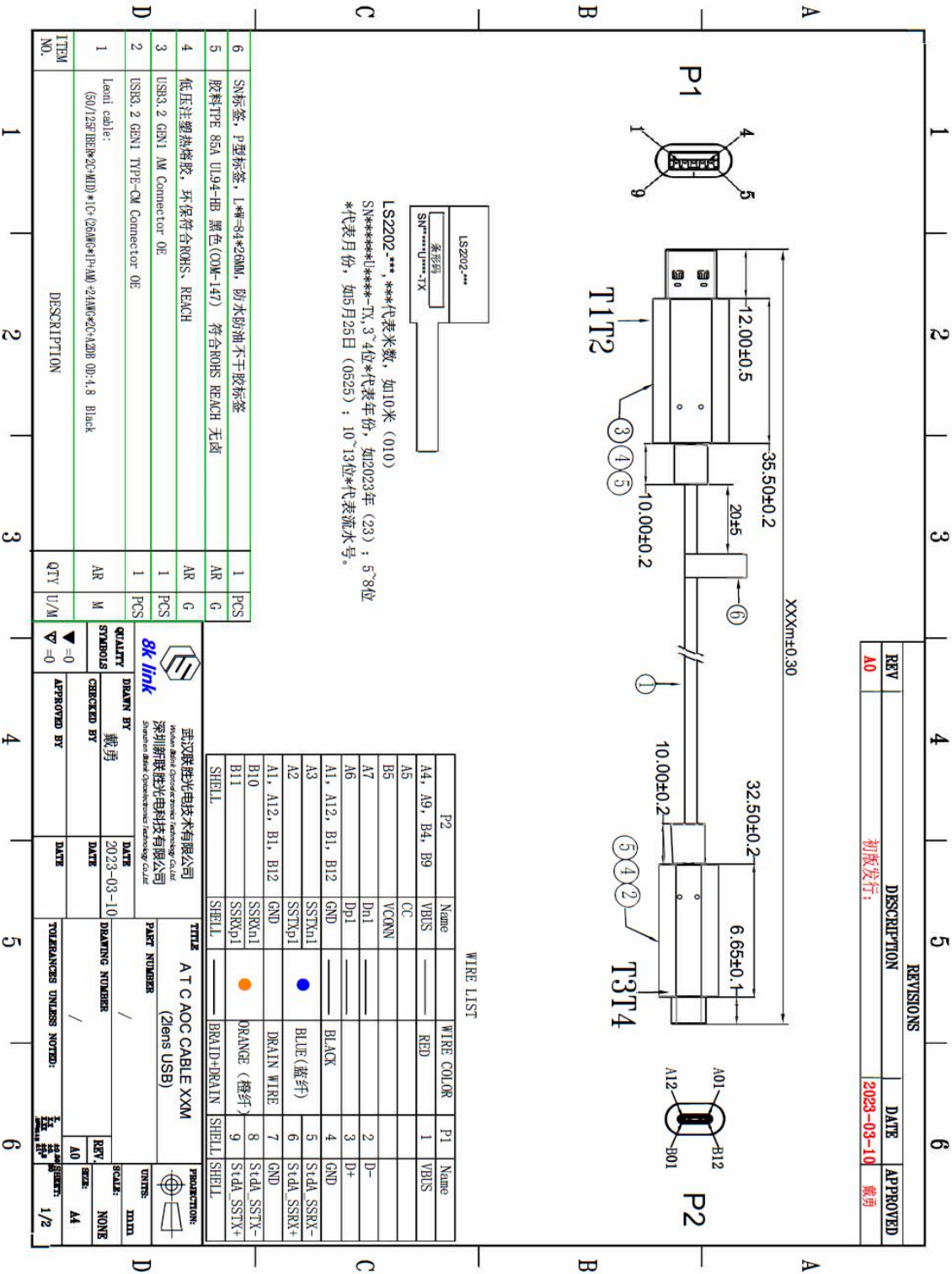


4. Product size



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5. Performance Parameters

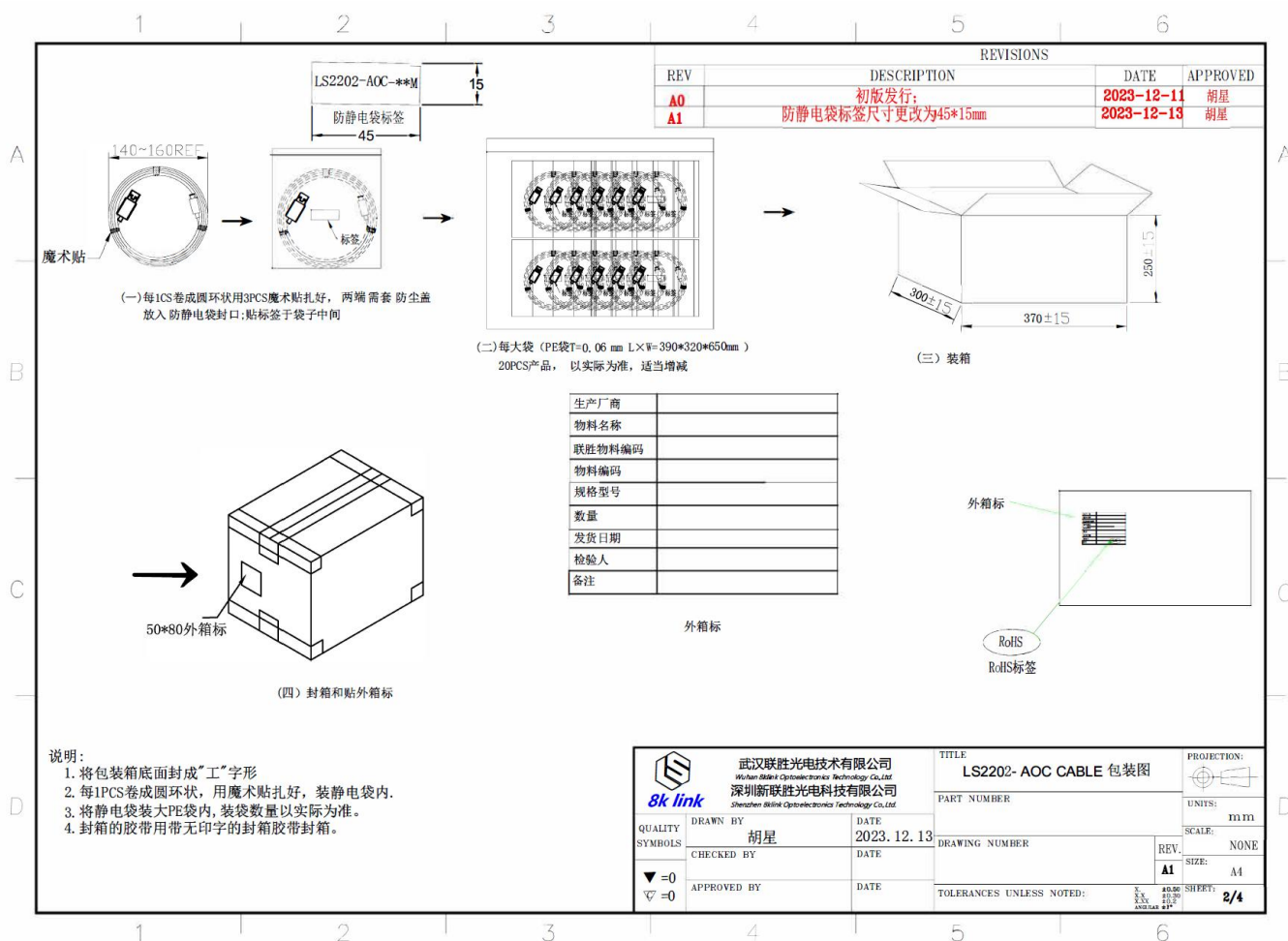
Parameters	Minimum	Typical	Maximum	Unit	Remarks
Transmission rate		10		Gbps	
Working temperature	-20	25	70	°C	
Working voltage		5		V	
Working current		130		mA	
Working consumption		0.650		W	
Outer diameter		4.8		mm	
Transmission distance		10	40	meter	
Bending radius	25	40		mm	Static (working) 40mm Dynamic (when installed) 80mm
Bit Error Rate	1.00E-12				
Hot Plug	Yes				

6. Package drawing



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7.Cautions

1. Prevent the items from the water and dust.
2. Prevent the optical fibers and copper cores from damaging. Don't bend or stretch the cable over its max performance limitation.



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3. Don't remove or replace components privately during the product working.
4. Bending and stretching during the use of the product shall not be close to or exceed the performance parameters specified in the table to prevent damage to optical fiber or copper wire injury.

8.Storage conditions

1. Ambient temperature: $25^{\circ}\text{C}\pm 5^{\circ}\text{C}$
2. Ambient Humidity: 30~75%RH
3. Other: Dust-free environment