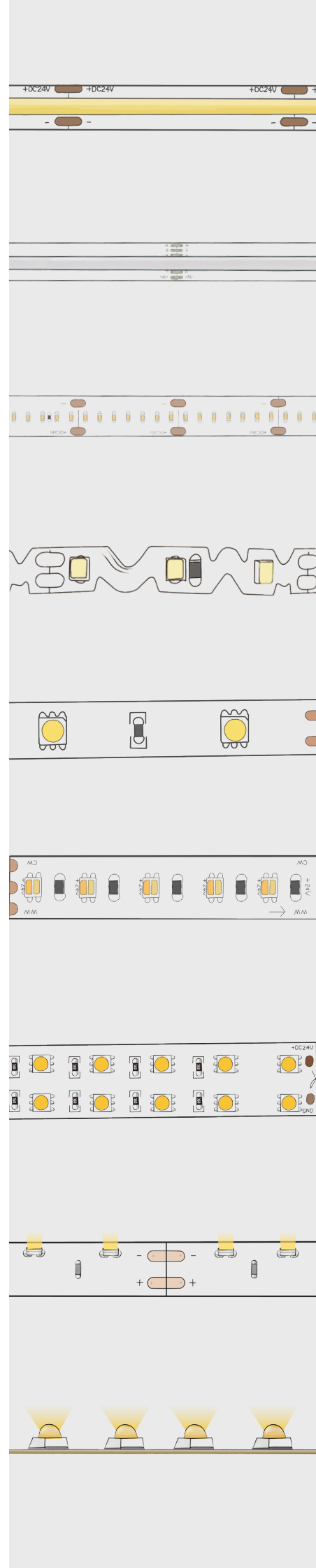




Production Specification

D25 Neon Strip



www.mingxueled.com

E-mail: info@mingxue.cn

Tel: +86-755-27637866

Address: 14 Floor, T3 Building, HIPAR technology building, Shiyan Town, Bao'an District, Shenzhen, China.

Factory: Building 9 & 10, WanYang park, baoyong industry road No 8, west area baoyong industry zone, longjiang town, Shunde District, Foshan city.

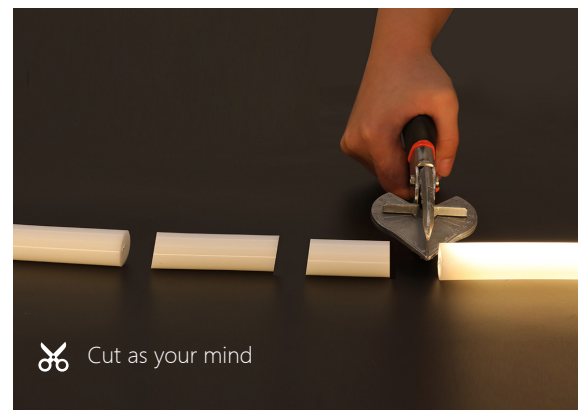
D25 Neon Strip

- Circular tube profile supports 360° circular luminous surface, uniform luminous area without dark area, suitable for space decorative lighting;
- Free to cut any length can be rigid, flexible, plasticity, bending and pliable;
- IP67 waterproof grade, can be used outdoors, the use of silica gel material, flame retardant, corrosion resistance and UV resistance;
- 50000 hours long life, 5 years warranty, UL and CE certification;
- High transmittance high purity silica gel material, protection grade IP67;
- Support multiple installation methods such as hanging and surface installation.



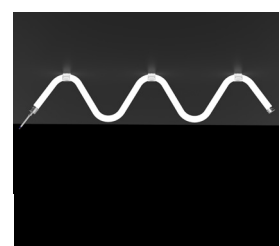
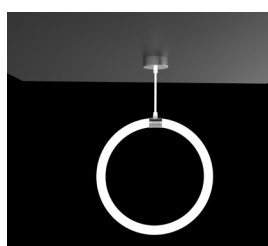
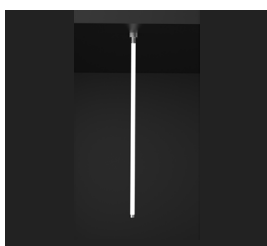
Application

We have also have CCT & RGB & RGB SPI version for your reference, they especially suit for spatial decoration, Domestic decoration hotel, garden, ceiling, floor stairs ect.



Accent Lighting: D25 Neon Strip

Can be hoisted at will, with various shapes. Emitting 360 degree, widely use for artistic lighting space to bring more vivid designs.



General Parameters

Series	Item Code	Input voltage	CCT/K	Watt/m	Color Rendering Index	Lm/m	Lm/ft	LM/w	LED Type	Max.run length (SEP)
STA Series 50mm cut	MN328V240Q90-D027M6A10106N-RO25Y	24V	2700k	20	80	1110	347	56	240/M	5m
	MN328V240Q90-D030M6A10106N-RO25Y	24V	3000k	20	80	1175	367	59	240//M	5m
	MN328W240Q90-D040M6A10106N-RO25Y	24V	4000k	20	80	1235	386	62	240//M	5m
	MN328W240Q90-D050M6A10106N-RO25Y	24V	5000k	20	80	1260	394	63	240//M	5m
	MN328W240Q90-D065M6A10106N-RO25Y	24V	6500k	20	80	1295	405	65	240//M	5m
Pro Series 6.25mm cut	MN328V320Q90-D027M6A10101N-RO25Y	24V	2700k	20	80	1320	413	66	320/M	5m
	MN328V320Q90-D030M6A10101N-RO25Y	24V	3000k	20	80	1390	434	70	320/M	5m
	MN328W320Q90-D040M6A10101N-RO25Y	24V	4000k	20	80	1465	458	73	320/M	5m
	MN328W320Q90-D050M6A10101N-RO25Y	24V	5000k	20	80	1495	467	75	320/M	5m
	MN328W320Q90-D065M6A10101N-RO25Y	24V	6500k	20	80	1530	478	77	320/M	5m
Pro 48V Series 6.25mm cut	MN428V320Q90-D027M6A10101N-RO25Y	48V	2700k	20	80	1320	413	66	320/M	10m
	MN428V320Q90-D030M6A10101N-RO25Y	48V	3000k	20	80	1390	434	70	320/M	10m
	MN428W320Q90-D040M6A10101N-RO25Y	48V	4000k	20	80	1465	458	73	320/M	10m
	MN428W320Q90-D050M6A10101N-RO25Y	48V	5000k	20	80	1495	467	75	320/M	10m
	MN428W320Q90-D065M6A10101N-RO25Y	48V	6500k	20	80	1530	478	77	320/M	10m
CCT	MN328U480Q90-D027N6A10106N-RO25Y	24V	CCT	20	80	820	250	820	480/M	5m
RGB	MN344A240Q00-D000O6A12106N-RO25Y	24V	RGB	20	N/A	622	194	31	240/M	5m
RGB SPI 10.4mm cut	MN250A192Q00-D000N6A10101S-RO25Y	12V	RGB SPI	20	N/A	328	103	16	192/M	5m

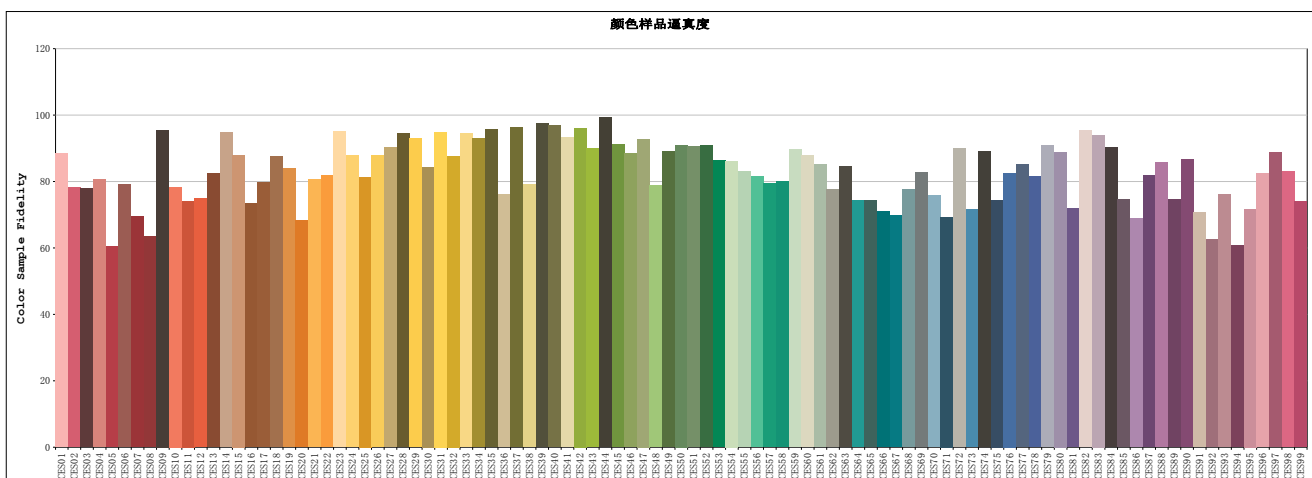
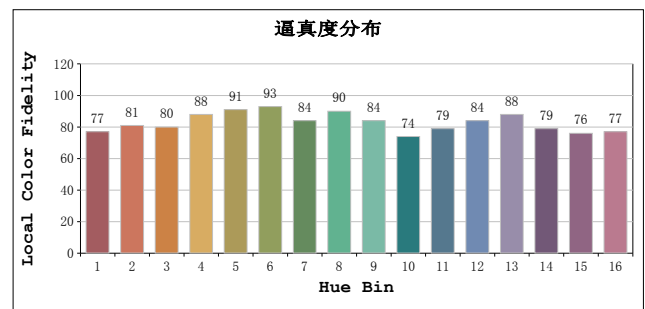
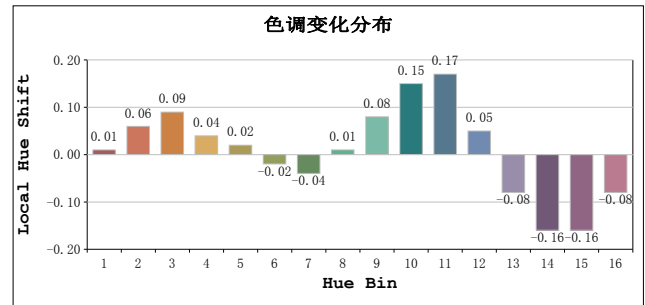
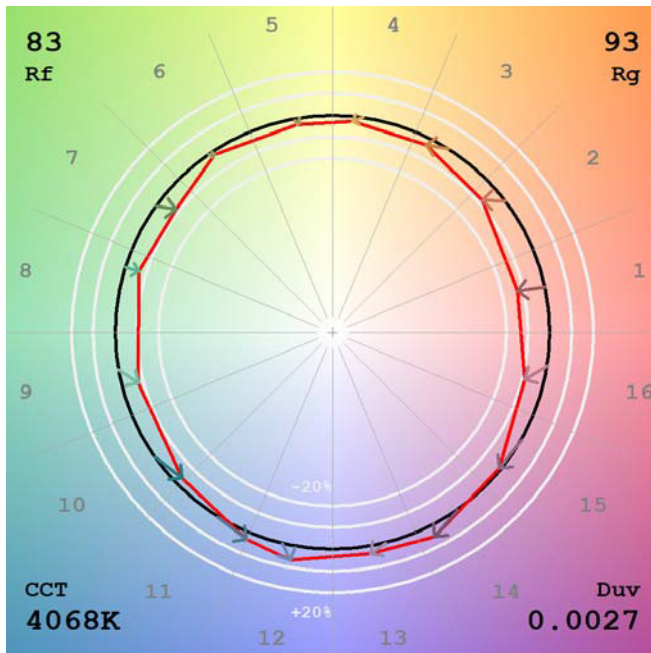
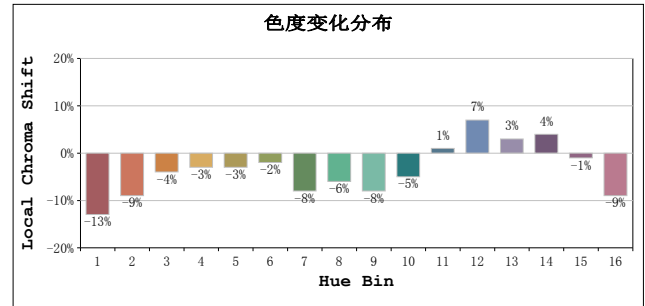
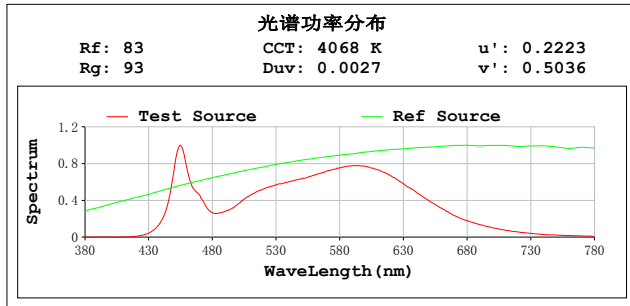
NOTE:
SEP:Single End Power Supply

Dimension:	Diameter 25mm	Input Current/m:	0.4~0.8A/M
Color Rendering Index:	Ra>80	Static Electricity:	1000V (ESD)
Beam Angle:	360°	Warranty:	5years
Operating Ambient temperature Ta:	-20~45° C [-4~113° F]	Energy Grade:	G
Pixel Segment& Address QTY:	16Pixel/M	Lifespan :	50,000H

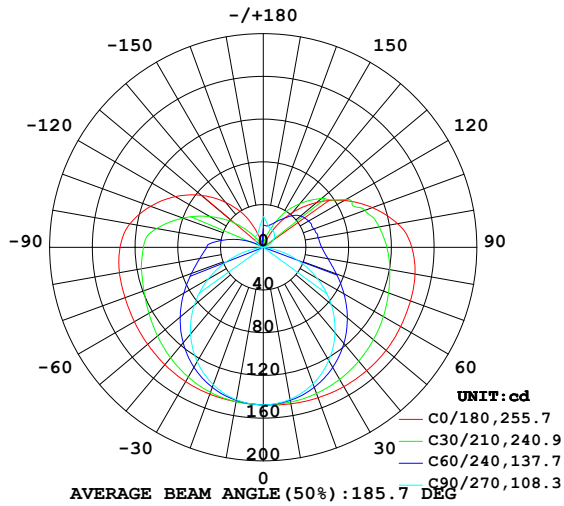
Notice:

- Luminous flux or CCT 2700K is 10% lower, or CCT 3000/3500K is 5% lower, for CCT 5000K/ 6500K is the same compared with 4000K.
- Energy efficiency class of regulation (EU)201 9/2020 is F(CRI80) for 4000K and G(CRI80) for CCT, it varies depending on CRI and CCT.
- The transmission direction of data must be from PI to Po following the arrow printing on FPC for DMX/SPI version, and can't be made by reverse connection, otherwise the strip will be out of control or even damaged.

TM30 test report



IES Data

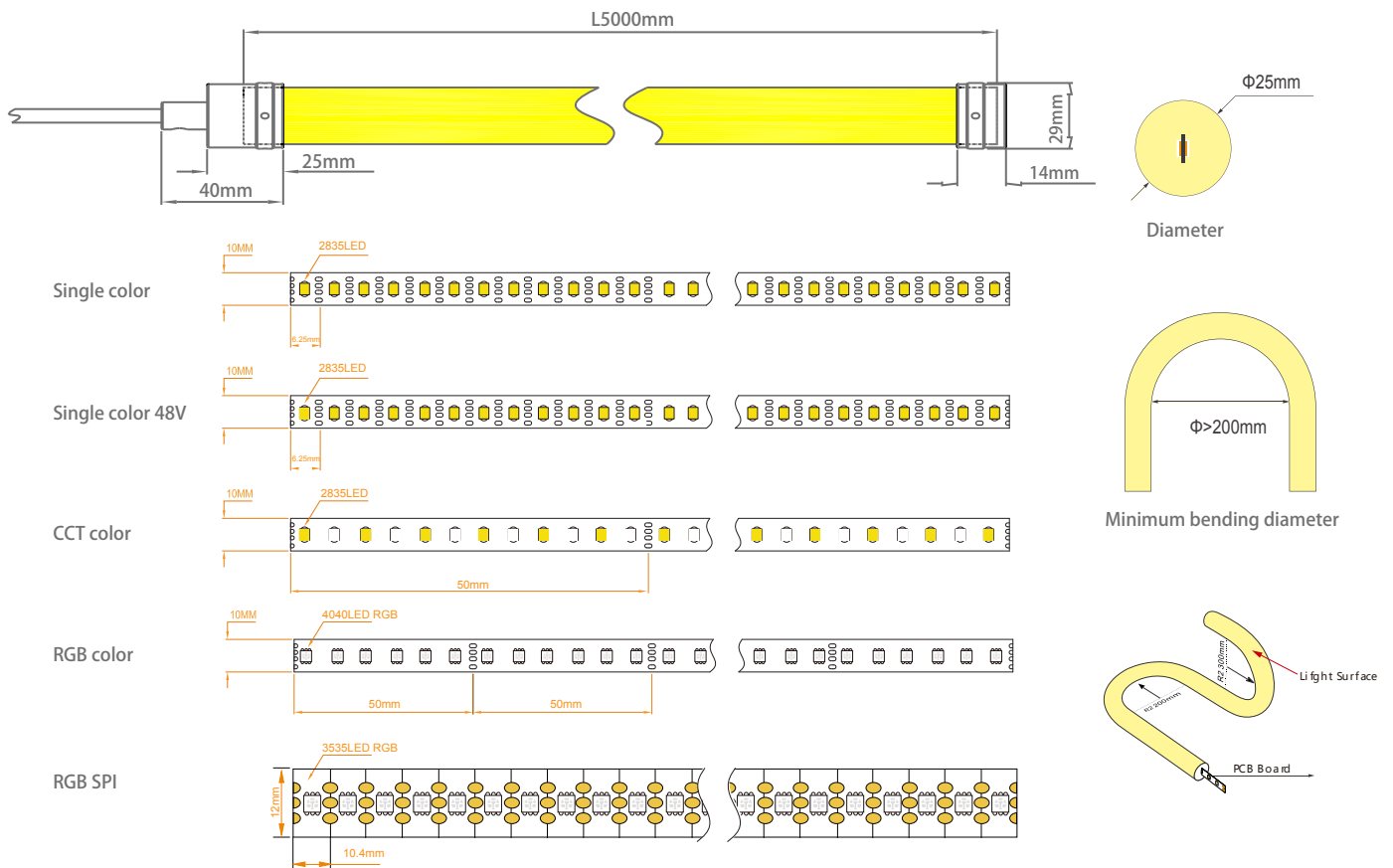


Flux out: 334.7 lm

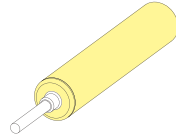
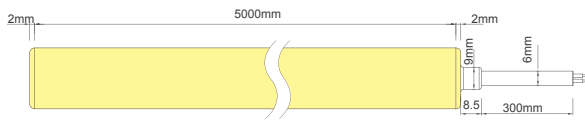
Height	Eavg, Emax	Angle: 107.82deg	Diameter
1m	56.24, 148.81lx		274.38cm
2m	14.06, 37.20lx		548.77cm
3m	6.249, 16.53lx		823.15cm
4m	3.515, 9.299lx		1097.54cm
5m	2.250, 5.952lx		1371.92cm
6m	1.562, 4.133lx		1646.30cm
7m	1.148, 3.036lx		1920.69cm
8m	0.8788, 2.325lx		2195.07cm
9m	0.6943, 1.837lx		2469.45cm
10m	0.5624, 1.488lx		2743.84cm

Note: The Curves indicate the illuminated area and the average illumination when the luminaire is at different distance.

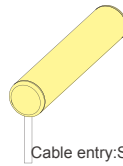
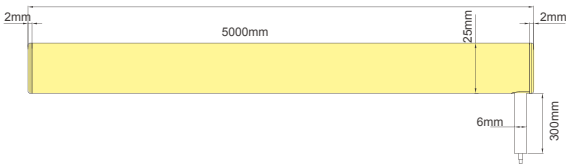
Drawing



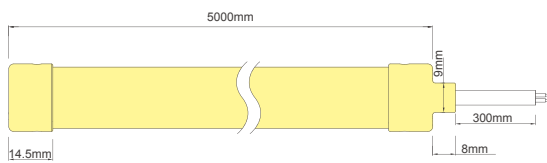
Cable entry method



Cable entry: Front



Cable entry: Side Front



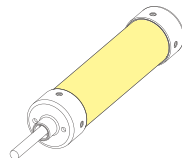
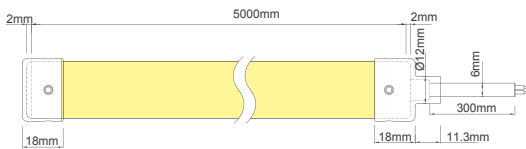
Silicone Cable Entry: Front



MX-08-001490



MX-08-001491



Alu Cable Entry: Front



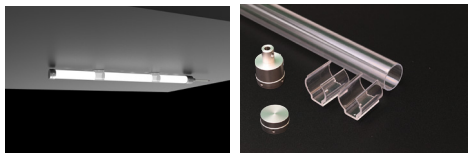
MX-01-002494



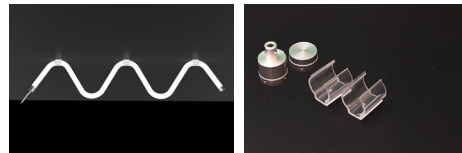
MX-01-002495

Installation schematic

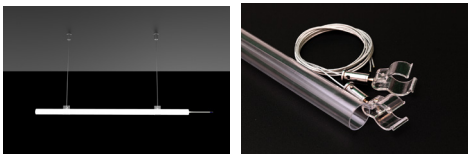
>>S-shaped Lifting-(MX-PJ-03009) (MX-PJ-02876) (MX-PJ-02870)



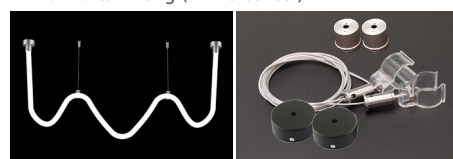
>>DIY ceiling-(MX-PJ-02876) (MX-PJ-02870)



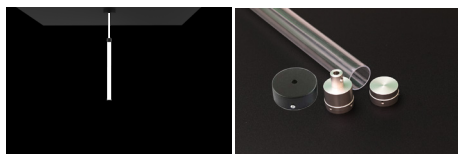
>>Surface Installation-(MX-PJ-03106)



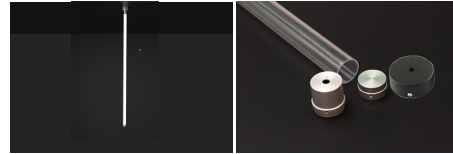
>>Horizontal Lifting-(MX-PJ-03105)



>>Vertical Lifting B-(MX-PJ-03159)



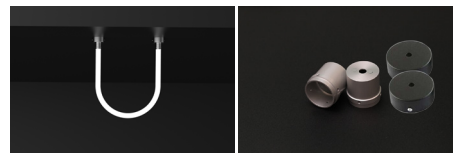
>>Vertical Lifting A- (MX-PJ-02868) (MX-PJ-03009)



>>Circular ring lifting-(MX-PJ-02882)



>>U-shaped Lifting-(MX-PJ-03104)



Accessories color can be customized



Satin Brass



Blackened Brass



Antique Brass



Satin Nickel



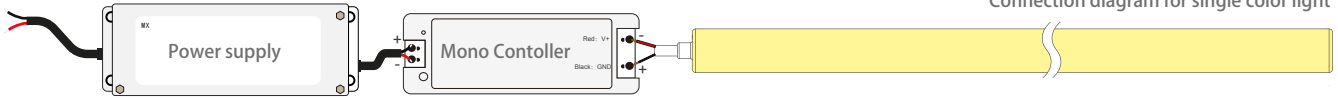
Brick red Copper



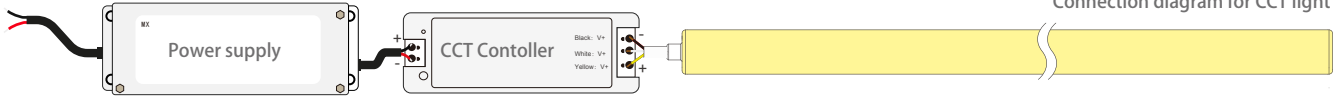
Satin Copper

Connection diagram

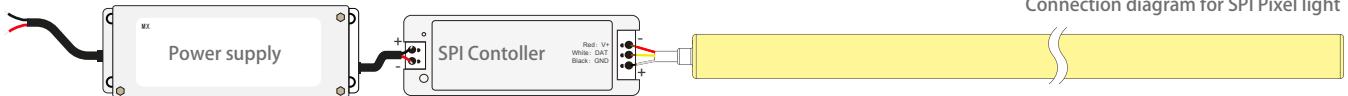
Connection diagram for single color light



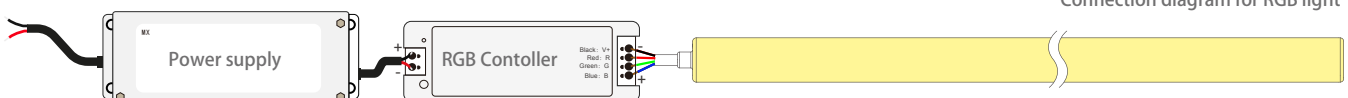
Connection diagram for CCT light



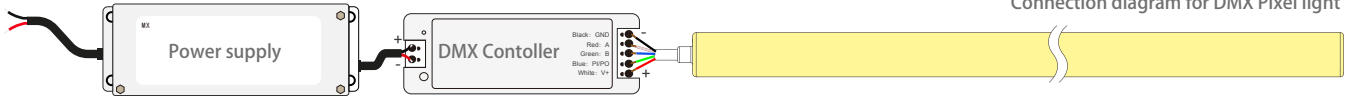
Connection diagram for SPI Pixel light



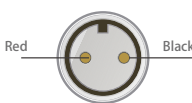
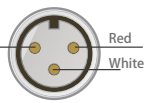
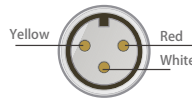
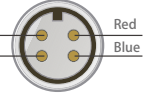
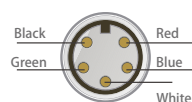
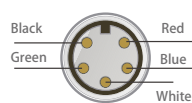
Connection diagram for RGB light



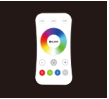
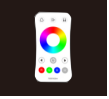
Connection diagram for DMX Pixel light



ELECTRICAL WIRING COLOR CODES

MONOCOLOR  Red: V+ Black: GND		CCT  Red: V+ White: C Yellow: W	
SPI  Red: V+ Yellow: DAT White: GND		RGB  Black: V+ Red: R Green: G Blue: B	
RGBW  Black: V+ Red: R Green: G Blue: B White: W		RGBCCT  Black: V+ Red: R Green: G Blue: B White: C Yellow: W	
DMX  Black: GND White: B Blue: A Green: PI/PO Red: V+			

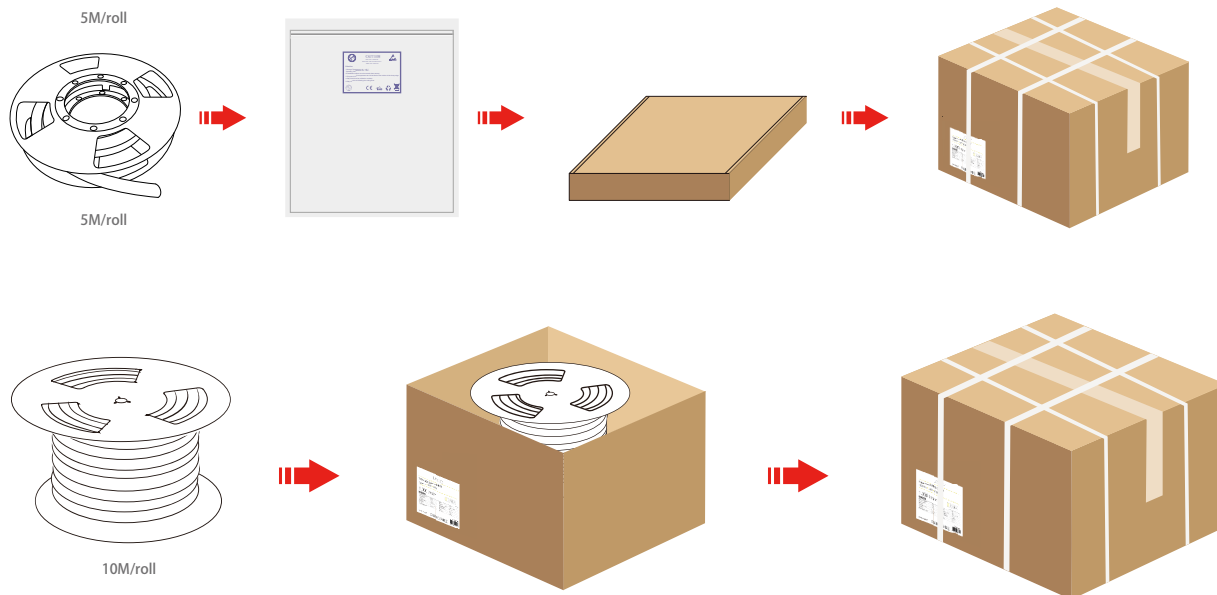
Controller

Picture	Item	Model	Spec	Match
	Monochrome remote	MX-03-030472	Output signal:RF(2.4GHz) Working voltage:3VDC(CR2032) Remote control distance:30m Working temperature:Ta:-30°C~+55°C	Use with Monochrome light strip
	Monotone light controller	MX-03-030322	Input voltage:12-48VDC Output current:15A@12V-10A@36V/48V Output Power:180W@12V-360W@24V 360W@36V-480W@48V Working temperature:Ta:-30°C~+55°C	Use with Monochrome light strip
	CCT remote	MX-03-030466	Output signal:RF(2.4GHz) Working voltage:3VDC(CR2032) Remote control distance:30m Working temperature:Ta:-30°C~+55°C	Use with CCT light
	Color temperature controller	MX-03-030437	Input voltage :12-24VDC Output current :2CH,5A/CH Output Power :2x(120-240)W Working temperature:Ta:-30°C~+55°C	Use with CCT light
	RGB remote	MX-03-030469	Output signal :RF(2.4GHz) Working voltage :3VDC(CR2032) Remote control distance:30m Working temperature:Ta:-30°C~+55°C	Use with RGB light
	RGB Controller	MX-03-030467	Input voltage :12-24VDC Output current :3CH,4A/CH Output Power :144-288W Working temperature:Ta:-30°C~+55°C	Use with RGB light
	RGBW remote	MX-03-030454	output signal:RF(2.4GHz) Working voltage:3VDC(CR2032) Remote control distance:30m Working temperature:-30°C~+55°C	Use with RGBW light
	RGBW Controller	MX-03-030455	Input Voltage:12-24 VDC; Output Current:4A*4CH, Max 6A/CH; 192W/384W (12V/24V)	Use with RGBW light
	MX-03-030475	LTSA512 DMX Master Controller	Input Voltage:5V DC Power Consumption:<2W Connection way:Mini USB Internal Memory:6000 steps@512Chs Output Connector:XLR-3 Transmission Signal:DXM512 PC Software:LTECH LED player	Use with DMX Pixel light
	MX-03-030479	DMX512 to SPI Pixel Decoder	(1)5-24VDC (2)Input Signal:DMX512/RDM+RF 2.4G Output signal:pixel signal (3)Control dots:1024 (4)Compatible with 37 kinds of Driving ICs;Numeric display (5)Reverse Polarity Protection.	Use with SPI Pixel light
	MX-03-030458	SPI Controller	12-24VDC Input signal:RF2.4G,WORK WITH R9 remote Output signal:SPI(TTL) Control dots:1024 Compatible with 45 kinds of Driving ICs Reverse polarity protection	Use with SPI Pixel light
	MX-03-030459	RGB/RGBW SPI remote	Output signal:RF(2.4Hz) Working voltage:3VDC(CR2032) Remote control distance:30m Working temperature:-Ta30°C~+55°C	Use with SPI Pixel light

Reliability test of light

TEST TYPE	TESTING ITEM	TEST STANDARD	DESCRIPTION
PHOTOMETRIC TEST	Spectrum Analysis	LM 79	LM 79(lumen,CCT,CRI,XY,SDCM,wave length)
	Photometric Distribution	LM 79	LM 79(lumen intensity distribution&Lux diagram)
	Lumen Maintenance&Life Time	IES LM 80&IES TM28 GB/T24824-2009	LM 80&IES TM28
ELECTRICAL TEST	EMC Test	EMI & EMS	IEC 61547/GBT 18595 IEC 61000-3-2/GB 17625.1
MECHANICS & PHYSICE TESTING	Bending Test Vertical	Mingxue	Manufacturer-defined,100 cycles 3 times bending with 0.5m/s pulling speed
	Bending Test Horizontal	R2	Manufacturer-defined,100 cycles 3 times bending with 0.5m/s pulling speed
	Wrestling test	Mingxue	COB/CSP 500 / SMD 1000. cycles
	Swing Test	UL2388	UL2388,>750 cycles
	Tensile Test	IEC 60598-1; GB7000.1	Manufacture-defined,>the weight of light in maximum connection length wiht both ends feed. With 30Nm if total cross section <0,75 or 60Nm force, pull wire 25 timesduring 1 sec. Mark displacement ≤ 2mm.
	Twist Test	Mingxue	Manufacturer-defined,>200 cycles in 720°
	Curl test	Mingxue	Back and forth 80-100 times
	IK06-08-10	IEC62262	IEC62262 The hammer spring Impact energy 0.7J
	Adhesion test	JB1256-77	3M VHB5952 hung on 2kg loads >7 hrs
	Drop test	IEC68-2-6	IEC68-2-6,GB/T2423/10/95
	Vibration test	ISTA-1A	bear up to 25,4mm amplitude in 14200 cycles
	Winding Test	IEC 60598-1; IEC 60598-2-21; GB-7000.1	φ 150mm cylinder, 60N pull, winding 10 times at (-25°C ±2°C) , and 10 times after(-15°C ±2°C, 16h).
	Electrical strength	IEC 60598-1; IEC 60598-2-21 GB-7000.1	500V
	Product accessories disassembly test	Mingxue	Product accessories are installed and adapted 5-10 times
ENVIRONMENT TESTING	Heating test	IEC 60598-1: 12.4	Sample to be tested under normal installation Under 1.06 times Rating Voltage After 30 minutes.
	Salt Spray Test	IEC 60068-2-11	5% salt solution concentration,5% salt water,35+/-2C for 72hrs
	High temperature and Humidity impact	IEC 60068-2-78 GB/T 2423.3	60+/-2° C for 168 hrs 60°C, 85%RH ,Test light decay data<3%
	Temperature Shock Test	IIEC60068	Manufacturer-defined,-40°C-60°C(typical temperature ange) 168H
	switch test	GB/T24824-2009	30s On, 30s Off, 15000 times;on/off every 30S, > 15000 cycles
	Lifetime aging test	Mingxue	Normal temperature 25°C
	Constant Temperature Test	Mingxue	Manufacturer-defined,60°C to -40° (typical temperature)
	Cold Bend Test	IEC 60598-1; IEC 60598-2-21 GB-7000.1	wound on mandrel,low-temperature (-15°C ±2°C, 16h), around the mandrel for two turns
	Cold Impact test	IEC 60598-1; IEC 60598-2-21 GB-7000.1	Low-temperature (-15°C ±5°C, 16h), hammer falls from a height of 100mm.
	UV Exposure Test	ASTMG154-06	ASTMG 154,ISO 4892-3, UVA@340nm ASTMG154-06, UVA-340 0.68W/m2 for 500 hrs
	IPX5 IPX6 IPX7 IPX8	IEC 60598-1; IEC 60598-2-21 GB-7000.1	IEC60529 IPX5/X6/ IPX7/X8

Packing



Safety Information

Application notes for led flexiable strip

In order to drive LED flexible strip lights safely, it is absolutely necessary to operate them with an electronically stabilised power supply protecting against short circuits, overload and overheating.

To also ease the luminaire/installation approval, electronic control gear, power supply and all electronic accessories for LED or LED modules should carry "CE, or UL" mark and meet the latest safety standard.

- Please use 24VDC isolated power supply to drive the led strip, and the constant voltage source ripple less than 5%. Can't step-down the power by resistance-capacitance and non-isolated power supply driver led strip, etc.
- To ensure the longevity and reliability of the strips, please do not bend the arc diameter 60mm or less, do not fold to avoid damaging the lamp beads or broken.
- To ensure the life and environment of lights, in the use of force can not pull the power cord to avoid damage to prohibit collision LED lights.
- During the installation of positive and negative attention to the power cord, do not pick the wrong voltage power supply and the product are the same, so as to avoid damage to the product.
- LED lights should be stored in dry sealed environment, the proposed storage period should not be too long before using unpacking, the working temperature: $-20 \sim +45$, Storage temperature: $-0 \sim +60$, not waterproof lights band indoor use, relative humidity not higher than 70%.
- In practical applications, the power supply should leave 20% margin (recommend using only 80% of the power) in order to ensure a sufficient amount of voltage drive products
- Do not use any acidic, alkaline adhesive securement products (including not limited to glass, plastic, etc.)

