

Features

- Secondary optical lens for uniform lighting.
- Aluminum substrate for better heat dissipation.
- Multiple specifications, support customization.

Application

Suitable for back-lit lightboxes with a depth of 4-12cm, signage lighting, etc.

Installation

Fixed by screws or adhesive tape

Optical & Electrical Parameters

Model No.	Light Color	CCT (K)	Beam Angle	Typical Luminous Flux value (lm/pcs)	Ra	Efficacy (lm/W)	Voltage (DC)	Power (W/pcs)
AF92-325	W	3000-9000	180°	218	80+	130	24V	1.68
AF92-330				327		97		3.36
AF92-335				437		130		3.36
AF92-340				545		106		5.04
AF92-345				655		130		5.04
AF92-350				1530		130		11.76

Other Parameters

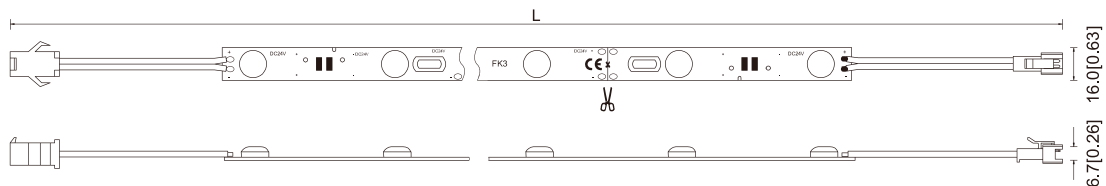
Model No.	LED Quantity/pc	Product Size L*W*H(mm)	Standard Run(pcs)	Max Run(pcs)	Working Temperature	Storage Temperature
AF92-325	2	99*16*6.7	1	18	-20~+60°C	-20~+70°C
AF92-330	3	168*16*6.7		11		
AF92-335	4	238*16*6.7		8		
AF92-340	5	307*16*6.7		6		
AF92-345	6	376*16*6.7		5		
AF92-350	14	930*16*6.7		2		

Note:

1. Test environment temperature : $25 \pm 2^\circ\text{C}$.
2. The luminous flux is tested at 3000-9000K.
3. The actual data of each single product may differ from the typical values. The data is subject to change without notice.
4. The luminous flux and power tolerance within $\pm 10\%$
5. The color temperature and power luminous flux may vary when different LED chips are selected.
6. If uneven brightness occurs during use, extra power supply is required.

Profile Drawings

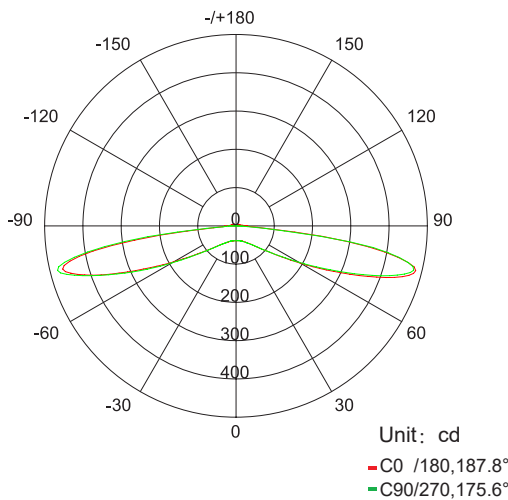
Unit: mm[inch]



Note: more info, please contact sales rep.

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM

AVERAGE ILLUMINATION

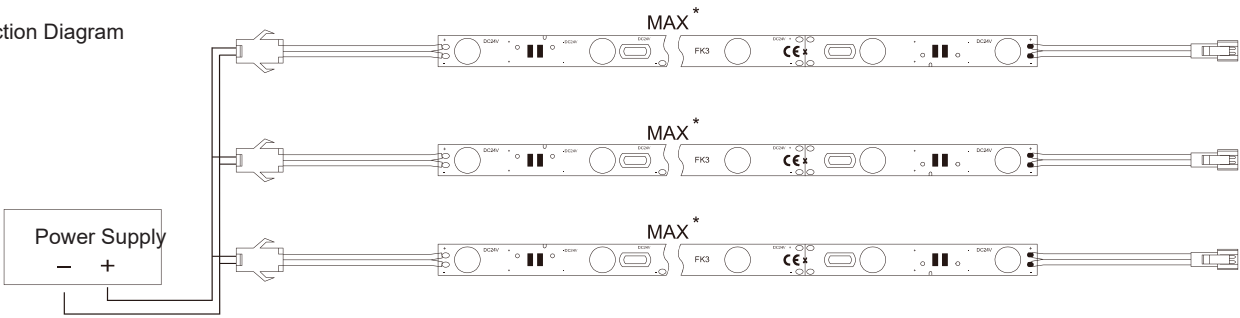


AVERAGE BEAM ANGLE(50%): 181.7°

Flux Out: 1155lm (CCT=8000-9000K)		
Height	Eavg, Emax	Diameter
2cm	1121,98227lx	102.43cm
4cm	280.2,24557lx	204.86cm
6cm	124.6,10914lx	307.29cm
8cm	70.06,6139lx	409.72cm
10cm	44.84,3929lx	512.16cm
12cm	31.14,2729lx	614.59cm
14cm	22.88,2005lx	717.02cm
16cm	17.52,1535lx	819.45cm
18cm	13.84,1213lx	921.88cm
20cm	11.21,982.3lx	1024.31cm
Beam Angle: 175.53°		

Note: the above two figures are tested with sample FK3-9313 at 8000-9000k, for other data please consult sales rep.

Connection Diagram



Installation Reference

Model No.	Bottom Color of Lightbox	Surface Material	Depth(H)	Illumination (lux)	Density (pcs/m ²)	Spacing(Y)cm	Power Density(W/m ²)	Visual Effects
FK3-9313	White	White Soft Film	4cm	9350-12510	12	8	132	OK
			5cm	6140-7630	7	14cm	77	
			6cm	3760-5020	4	25cm	44	
			8cm	3520-4510	4	25cm	44	
			10cm	2720-3450	3	33cm	33	
			12cm	2020-2360	2	50cm	22	



Note:
 Spacing between strips, as shown in the diagram.
 For specific data, please contact our sales rep.
 For lightboxes with a depth of less than 6cm, reflective film or spray-on reflective materials may need to be added based on the actual usage environment.

Common Faults and Troubleshoot

Quick Guide		
Problems	Reasons	Solutions
All LEDs can not light on.	No electric supply.	Fix the short circuit problem.
	Automatic power protection from the open or short circuit in output of the power supply.	
	Wrong connection of power supply.	
LEDs can not light on partly.	Some switching mode power supplies are not powered.	Correctly connection
	Power supply line error.	
	Mistaken wire connection of some of products	
Brightness of LED is inconsistent or insufficient.	Power overloaded.	Replace with more powerful power
	Power supply circuit excessive consumption.	Make sure the working voltage of the product within $\pm 5\%$ of standard voltage, or keep balance by circuit power consumption.
	Excessive quantities in series connection of the product	Reduce the quantities of the product in series connection to meet requirement.
LED flicker.	Connection point fault.	Remove bad connection point.
	Switching power supply failure.	Replace a new power supply.
	Wrong Installation or use of products	Please follow the instructions

Attentions before installation

- Before installation, check that the product parameters are consistent with the requirements (Seeing product specifications or product labels)
- Load voltage, current, power and power supply should be matched with the product.
- Follow the instructions of wiring diagram (first connect the load and then the power supply) to avoid short circuit.
- Make sure the correct connection of positive and negative poles between products and power supply. Otherwise, the light will not be on.
- Make sure the power cord firmly screwed into the terminal and it should not be pulled out by hands.
- The terminal should have insulation, waterproof and anti-corrosive treatment.
- Please take and use the product gently to avoid damage.
- After installation, the fabric light box must be covered with cloth within 48 hours. Please avoid leaving the light box idle for a long time.

Warning

- Do not disassemble or retrofit the light. Do not touch the surface of the light with a sharp object.
- Do not do live-line working during installation, especially for high voltage product.
- Do not use any organic chemical solvents.
- Use neutral glass adhesive to fix this product and it needs to be dried 24 hours in the open environment after operation.
- Treat the ends and the circuit connection points that are not connected to the main line with insulation, waterproof, and anti-corrosion in the installation.
- Use 18AWG (0.75mm² cross-sectional area) or thicker core wire to avoid adverse consequences caused by overheating, if the power cable need to lengthen.
- Make sure the input voltage meets the requirements and lines are connected correctly before lighting on.
- This product is for signage, and do not use as general lighting.
- Series connection within the max run.
- The length of the power cable between the power supply and the led strip should not exceed 2 meters. Otherwise, large circuit loss will lead to inconsistent brightness.
- Installation, maintenance and repair should be operated by a qualified technician.

Statements and Recycling

Statements:

- Repair should be operated by a qualified technician, if the external circuit or main line of this product is damaged.
- The parameters given in this manual are typical values and for reference only.
- All illustrations and drawings in this manual are for reference.
- This product is subject to change without notice.

Recycling:

- LED lighting products belongs to electronic products, please do recycling treatment according to the relevant WEEE directives.

Version	Content	Date
D1.0	first release	2024-3-29