A Solid-State Lighting Premium Expert

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Solid-State Lighting Series

PLCC Lightbar FPC Series Datasheet

PLCC Lightbar FPC is a strip of lighting module available in varying length. Its flexible circuit board not only enables novel design thinking with bendable light source, but also offers a wide range of applications with dividable lighting segments.

Features :

- High Brightness SMD LED
- Low Power Requirement & Energy Efficient
- Easily customized for any length
- Suitable for Restricted Space

Typical Applications :

- Auditorium Walkway Lighting
- Stairway Accent Lighting
- Cabinet Lighting

Specification :

- Color : ○ ● ●

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LBKx-M480/x0238 Package Dimensions and Circuit Diagram

• Package Dimensions

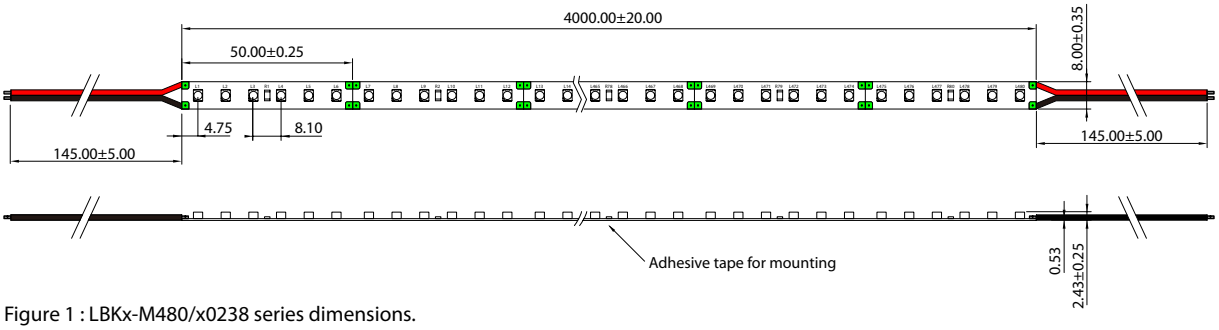

Figure 1 : LBKx-M480/x0238 series dimensions.

Note:
All dimensions are in millimeters.

• Circuit Diagram

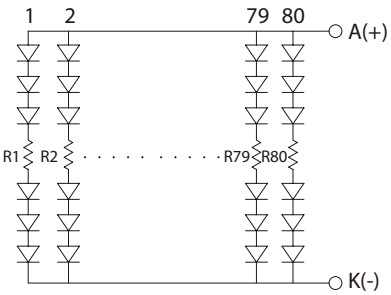

Figure 2 : LBKx-M480/x0238 series circuit diagram.

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LBKx-J300/x0227 Package Dimensions and Circuit Diagram

• Package Dimensions

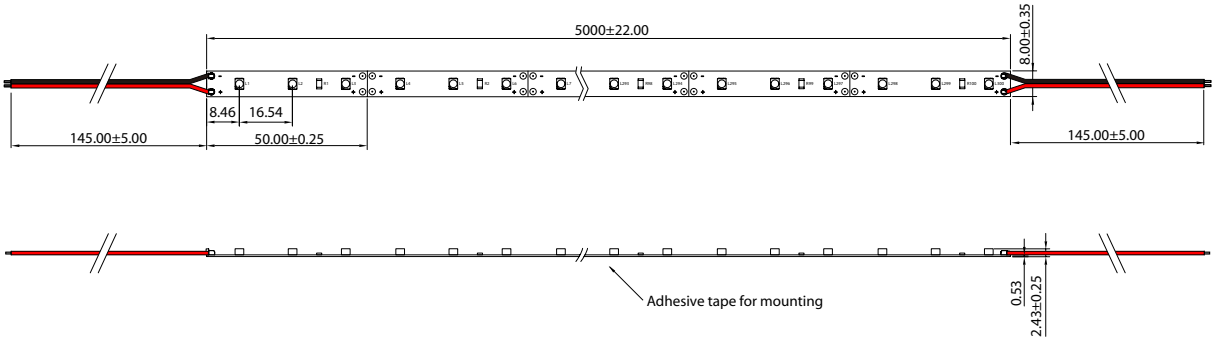

Figure 3 : LBKx-J300/x0227 series dimensions.

Note:
All dimensions are in millimeters.

• Circuit Diagram

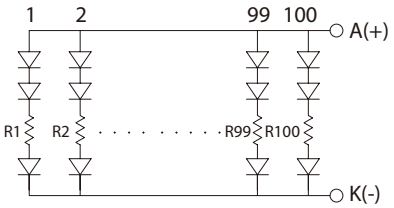

Figure 4 : LBKx-J300/x0227 series circuit diagram.

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Absolute Maximum Ratings

Parameter	Symbol	Rating	Units
LED junction Temperature	T_J	125	°C
Operating Temperature	T_{opr}	-20 ~ +85	°C
Storage Temperature	T_{stg}	-20 ~ +85	°C

Table 1 : Absolute maximum ratings for PLCC lightbar FPC series.

Note:
1. Proper current derating must be observed to maintain junction temperature below the maximum at all time.
2. LEDs are not designed to be driven in reverse bias.

Electro-Optical Characteristics (T_a=25°C)

• LBKx-M480/x0238 Series

Part No.	Color	Number of LEDs	Input Voltage (V DC)	Power (W)	Current (mA)	Radiance Angle	CCT(K)	Lumen Flux(lm)
LBKW-M480/ A0238	Cool White	480	24	34.56	1440	120°	6000	1747
LBKH-M480/ D0238	Neutral White	480	24	34.56	1440	120°	4100	1622
LBKX-M480/ D0238	Warm White	480	24	34.56	1440	120°	3050	1498

Table 2 : LBKx-M480/x0238 series electric-optical characteristics.

Note:
Flux is measured with an accuracy of ± 10%.

• LBKx-J300/x0227 Series

Part No.	Color	Number of LEDs	Input Voltage (V DC)	Power (W)	Current (mA)	Radiance Angle	CCT(K)	Lumen Flux(lm)
LBKW-J300/ A0227	Cool White	300	12	21.60	1800	120°	6000	1092
LBKH-J300/ D0227	Neutral White	300	12	21.60	1800	120°	4100	1014
LBKX-J300/ D0227	Warm White	300	12	21.60	1800	120°	3050	936

Table 3 : LBKx-J300/x0227 series electric-optical characteristics.

Note:
Flux is measured with an accuracy of ± 10%.

Environmental Compliance

PLCC lightbar FPC series are compliant to the Restriction of Hazardous Substances Directive or RoHS. The restricted materials including lead, mercury cadmium hexavalent chromium, polybrominated biphenyls (PBB) and polybrominated diphenyl ether (PBDE) are not used in PLCC lightbar FPC series to provide an environmentally friendly product to the customers.

Application Notes

PLCC Lightbar FPC series are available in cool white, neutral white and warm white for application such as under-cabinet lighting, cove lighting and wall washing.
Moreover, additional fine-tuned high color rendering index (CRI) version of white, neutral white and warm white all make PLCC Lightbar FPC series the ideal lighting choice for vividly displaying fruit and vegetables and/or refrigeration products, presenting the true color of the products and reflecting the freshness of goods.