



# AV014\_XBET-E

Multi Power

## FEATURES

- CRI≥95, SDCM≤3
- Dual color temperature
- Support PWM, DALI, DMX dimming
- Multi power optional



120°



2835



DC24V



5Years



IP20

## DIMENSION

Input voltage: DC24V  
Ra: >95  
Rated power: 2.4-14.4W  
Power error range: ±10%

Tape IP: IP20/IP65/IP67  
Warranty: 5years  
Working temperature: -20~+60°C  
Storage temperature: -20~+70°C

Available Tape IP



IP20



IP65



IP67



Bending radius:  
Rmin=30mm

## OPTICAL & ELECTRICAL PARAMETERS

Model No.	Voltage	CRI	Color	CCT	Lm/m	Lm/W	W/m
AV0147XBET-E	24V DC	>95	W1	2700K	228	95	2.4
		>95	W2	2700K	456	95	4.8
		>95	N1	6500K	233	97	2.4
		>95	N2	6500K	469	98	4.8
		--	W1W2	--	675	94	7.2
		--	W1N1	--	457	95	4.8
		--	W1N2	--	690	96	7.2
		--	W2N1	--	700	95	7.2
		--	W2N2	--	916	95	9.6
		--	N1N2	--	697	97	7.2
		--	W1W2N1	--	900	94	9.6
		--	W1W2N2	--	1133	94	12.0
		--	W1N1N2	--	918	96	9.6
		--	W2N1N2	--	1140	95	12.0
		--	W1W2N1N2	--	1351	94	14.4
AV0146XBET-E	24V DC	>95	W1	2700K	273	114	2.4
		>95	W2	2700K	542	113	4.8
		>95	N1	6500K	274	114	2.4
		>95	N2	6500K	536	112	4.8
		--	W1W2	--	820	114	7.2
		--	W1N1	--	542	113	4.8
		--	W1N2	--	815	113	7.2
		--	W2N1	--	831	112	7.2
		--	W2N2	--	1080	112	9.6
		--	N1N2	--	815	113	7.2
		--	W1W2N1	--	1069	111	9.6
		--	W1W2N2	--	1337	111	12.0
		--	W1N1N2	--	1080	113	9.6
		--	W2N1N2	--	1344	112	12.0
		--	W1W2N1N2	--	1593	111	14.4

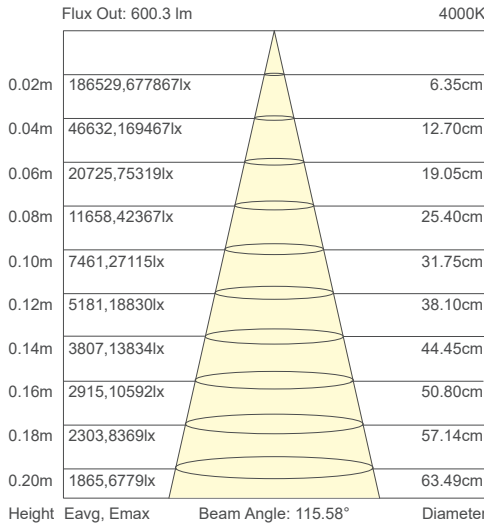
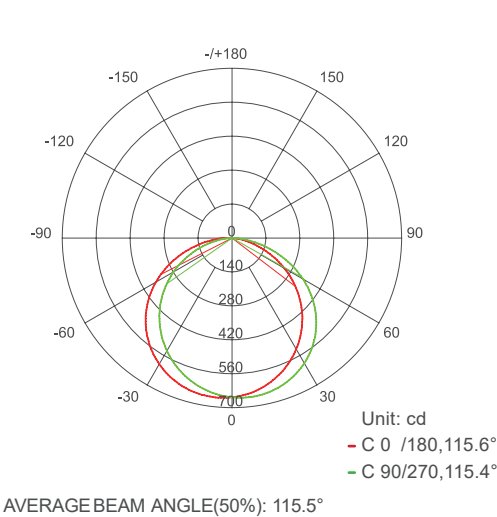
OTHER PARAMETERS

Model No.	LED Qty (pcs/m)	Power(W)	Standard Packing Length	Max Run	Min. Cutting Unit	LED Pitch
AV0147XBET-E	120	2.4	5000mm	13 m	100mm	16.7mm
		4.8		9 m		
		14.4		7 m		
AV0146XBET-E	140	2.4	5000mm	11 m	100mm	14.3mm
		4.8		7 m		
		14.4		6 m		

Note:  
Test environment temperature is 25±2°C.  
The above data was measured under standard conditions and actual data may be different. We would update data without further notice.  
The above luminous flux data is based on single-color.  
If the selected LED chip is different, the color temperature and luminous flux will change accordingly

LUMINOUS INTENSITY DISTRIBUTION DIAGRAM

AVERAGE ILLUMINATION



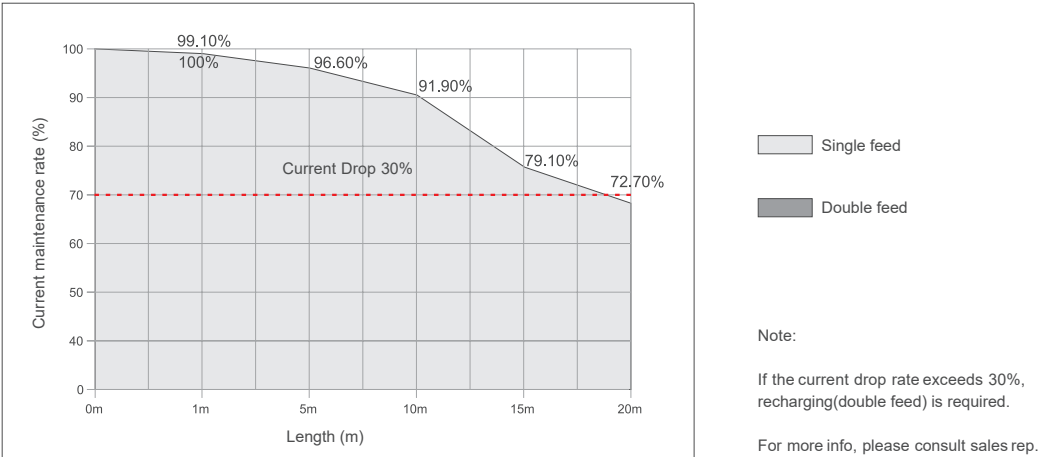
Note: above data tested with-W1W2N1N2 at 4000K. For other data,please consult sales rep. **RECOMMENDED**

POWER SUPPLY UPON WORKING LENGTH

AV014\_XBET-E

Operating Length (m)	1	2	3	5	6
Operation Voltage (DC V)	24.0	24.0	24.0	24.0	24.0
Total current (A)	0.55	1.07	1.56	2.33	2.61
Total Power (W)	13.37	25.82	37.49	55.96	62.76
Head voltage (DC V)	23.93	23.88	23.85	23.77	23.68
Tail voltage (DC V)	23.89	23.70	23.39	22.68	22.13
Head current (mA)	11.99	11.89	11.83	11.66	11.49
Tail current (mA)	11.88	11.49	10.87	9.22	8.35
Head-to-tail voltage drop rate(%)	0.17	0.75	1.93	4.59	6.55
Head-to-tail current drop rate(%)	0.90	3.40	8.10	20.90	27.30
Single/Double feed	Single feed	Single feed	Single feed	Single feed	Single feed

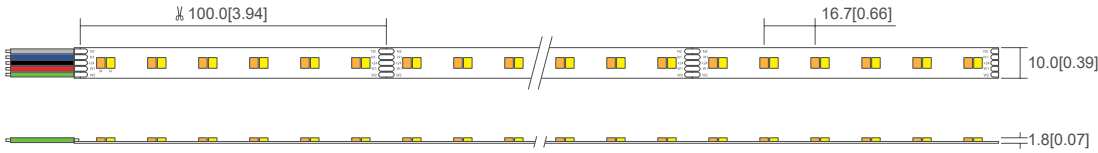
CURRENT MAINTENANCE RATE & POWER SUPPLY MODE



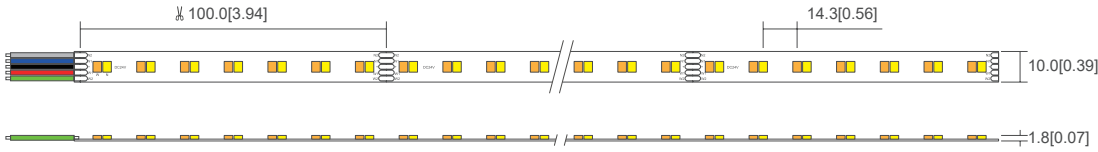
PROFILE DRAWINGS

Unit:mm[inch]

AV0147XBET-E

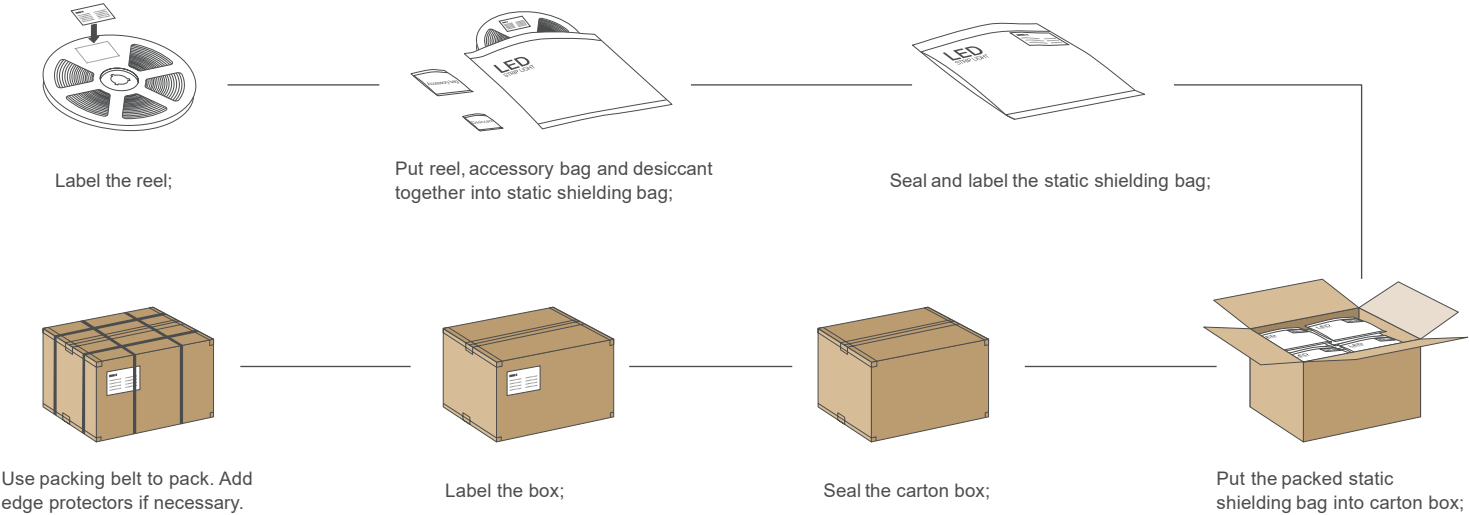


AV0146XBET-E



Note: □ Black +, W1 red, W2 green; N1 blue, N2 white. □ For more info, please contact sales rep.

PACKAGING INFORMATION

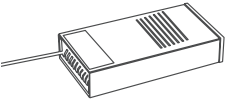


Model No.	Product Size L*W	Carton Size	Meter/Reel	Reel/Carton	Net Weight (kg)	Gross Weight (kg)
AV0147XBET-E	5000*10mm	550*400*340mm	5	100	8.64 (1±10%)	11.04 (1±10%)
AV0146XBET-E					8.85 (1±10%)	11.25 (1±10%)


NOTE:

The above-mentioned packaging quantity and weight are only for the illustrated packaging method. For other packaging methods, the packaging quantity and weight will be different. The actual weight is subject to the actual product.


### INSTALLATION TOOLS



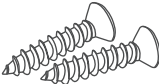
LED power supply



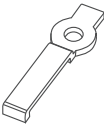
Cutter



Electric drill



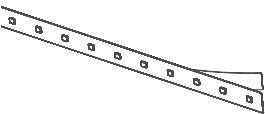
Screw



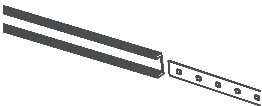
Clips

### INSTALLATION METHODS AND STEPS

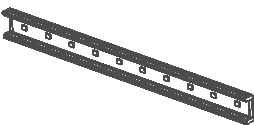
#### Aluminum channel installation




Peel away the self adhesive tape on the back of strip.



Cut off the excess part based on the installation position.

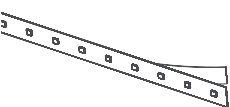


Evenly arrange the strips with appropriate space in the track.

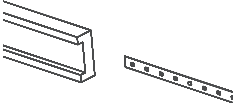


Install the cover and end cap.

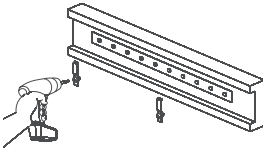
#### Covered channel installation



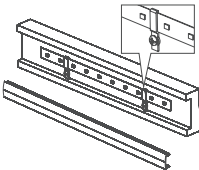
Peel away the self adhesive tape on the back of strip.




Cut off the excess part based on the installation position.



Evenly arrange the strips with appropriate space in the track and fix them with clips.



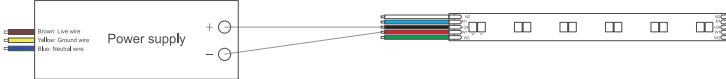
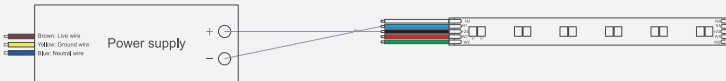
Install the cover and end cap.



Finished.

### WIRING METHOD AND CORRESPONDING POWER

Referring to the combination of 2700K and 6500K as an example.

No.	Diagram	Power	CCT
Method 1		2.4W	2700K
Method 2		2.4W	6500K

No.	Diagram	Power	CCT
Method 3		4.8W	2700K
Method 4		4.8W	6500K
Method 5		4.8W	4000K
Method 6		7.2W	2700K
Method 7		7.2W	4700K
Method 8		7.2W	3500K
Method 9		7.2W	6500K
Method 10		9.6W	4000K
Method 11		9.6W	3300K
Method 12		9.6W	5000K
Method 13		12W	3700K
Method 14		12W	4400K
Method 15		14.4W	4000K

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### ATTENTIONS BEFORE INSTALLATION

- Before installation, please check whether the parameters of the product are consistent with the requirements (Seeingthe Product Specification or Label).
- The voltage, current, and power of the power supply and load used must be consistent with this product.
- Follow the instructions of wiring diagram (firstconnect the load and then the power supply)to avoid short circuit.
- Product wires must be correctly connected to the positive and negative terminals of the power output, otherwise the light will not turn on.
- The power cord should be tightly screwed into the terminal, with a recommended tightness that cannot be pulled out by hand.
- The connection terminals must be effectively waterproof and corrosion-resistant.
- For non-waterproof or S-type strips, if the installation length exceeds the maximum run length, more power feed is needed..
- For non-waterproof or S-type strips, auxilliary heat dissipation appliances must be added when the current of single LED exceeds regular value.

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### 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,especiallyfor high voltage product.
- Do not use any organic chemical solvents.
- Use neutral glass adhesive to fix this product and it needs to be dried 4 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.

Version	Content	Date
A1.1	Update: basic parameters and wiring diagram	2025-3-19