

# MUP96(60)-1W24(12)V-MTR

## Product Features

- No flicker, smooth dimming
- High PF value
- Wide input voltage 120-277VAC
- Short circuit protection, overload protection, overcurrent protection
- Dial code to switch dimming mode
- Class 2 Output
- Safety according to UL8750 & UL 1310
- Suitable for Dry , Damp & Wet Locations



## Application

For LED constant voltage strip light only



LED Strip Light



LED Tube



Flicker free



Short Circuit Protection



Over Load Protection



Over Current Protection

## Technical Parameters

Model	MUP96(60)-1W24(12)V-MTR	96W 24V	60W 12V	
Input	Rated Voltage	120VAC-277VAC		
	Frequency Range(Hz)	50/60Hz		
	Input Current	0.95A@120VAC, 0.55A@230VAC, 0.45A@277VAC, full load	0.65A@120VAC, 0.27A@277VAC, full load	
	Power Factor	≥0.95@120VAC, ≥0.90@277VAC, full load		
	Efficiency	≥88%@120VAC, full load		
	THD(full load)	<20%@120VAC, <20%@277VAC, full load		
	No load power	0.5W		
	Inrush Current	Cold start, 30A@120VAC 250us,		
	Turn on delay Time	<0.75s max@120Vac (When the light begins to shine)		
Output	Output Voltage	24VDC	12VDC	
	Voltage Accuracy	21-26VDC±5%	12-13VDC±5%	
	Output Current	4A Max	5A Max	
	Output Power	96W Max	60W Max	
	Ripple Voltage	≤300mV		
	PWM	20K Hz		
Protection	Short Circuit	Shut down output, Auto-recovery after Fault Clearance		
	Over Load	Current drops, Auto-recovery after Fault Clearance		
	Over Current	Current drops, Auto-recovery after Fault Clearance		
Safety & EMC	Surge	L-N: 6kVAC L-N-PE: 6kVAC		
	Withstand Voltage	I/P-O/P: 3000Vac/1min/<5mA I/P-PE:1500Vac/1min/<5mA O/P-PE:500Vac/1min/<5mA		
	Safety standards	UL8750:2015 Ed.2+R:07Dec2022, UL1310, CSA-C22.2 No. 250.13:2022 Ed.5		
	EMC Eission	EN55015 FCC Part Class B		
	Insulation Resisance	5Mfi		
Others	Working Temp.	-20°C ~ +60°C [-4°F - 140°F]		
	Storage Temp., Humidity	-40°C ~ +90°C [-40°F - 194°F] 20%-90%RH		
	TC	80°C [ 176°F ] for safety & life		
	Material	Metal		
	IP Rating	IP20		
	Lifetime	50,000h@tc:80°C [ 176°F ]		
	Warranty Condition	5 years		
	Switch Cycle	25,000 times		
	Packing(weight)	Net weight: 937g(2.06 lb)±5%/PCS; TBD PCS/Carton;TBDkg(TBD lb)±5%/Carton; Carton Size: xxx*xxx*xxxmm(xxx*xxx*xxx Inch)(L*W*H)		
	Dimension	241.5*44*30mm (xxx*xxx*xx Inch)(L*W*H)		

## Dimension(mm)

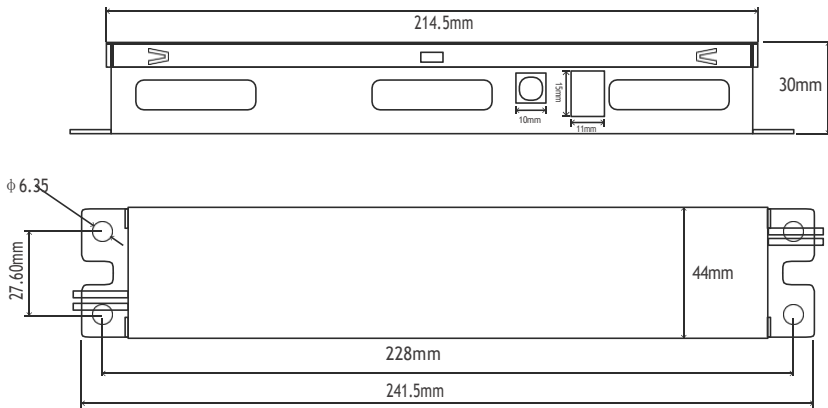
Metal case

All material to be ROHs compliant to Directive 2002/95/EC

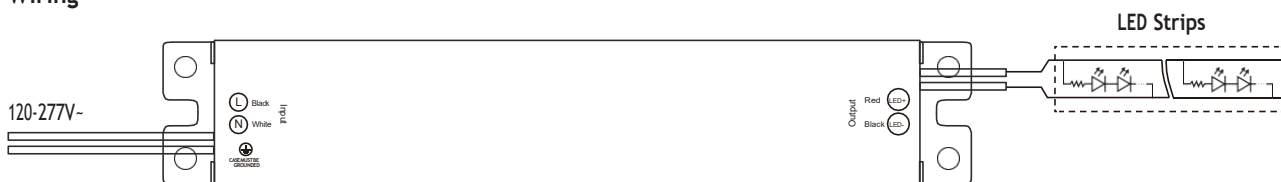
Wires to be Stranded with UL approval

Input: Black & White: 740mm , 18AWG

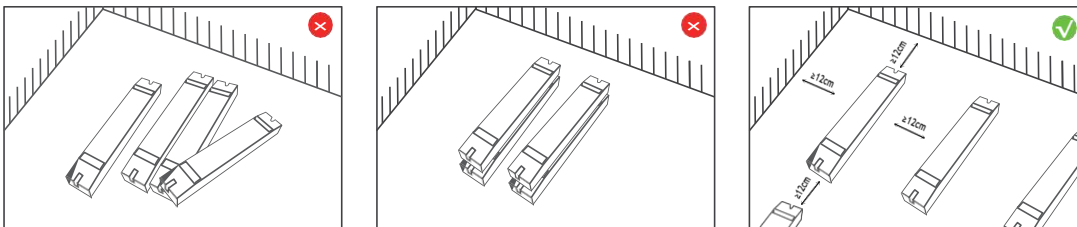
Output: Red & Blue:630mm , 18AWG



## Wiring



## Installation Precautions



Please do not stack the products. The distance between two products should be  $\geq 12\text{cm}$  so as not to affect heat dissipation and the lifespan of the products.

## Max. quantity of drivers per miniature circuit breaker

Specification item	Value	Condition
Inrush current $I_{peak}$	30A (120V)	Input Voltage 120V
Inrush current $T_{width}$	250us (120V)	Input Voltage 120V, measured to 50% $I_{peak}$

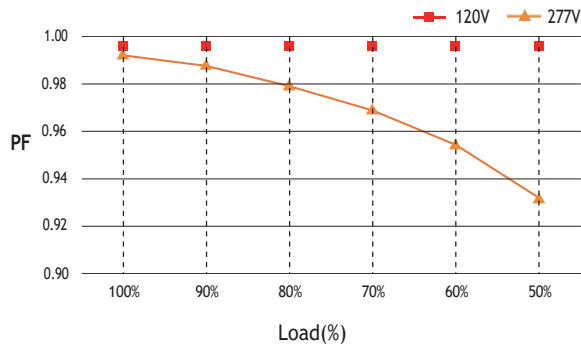
### 96W 24V

MCB	Input Voltage 120V Drivers	MCB	Input Voltage 120V Drivers
B10	10pcs	C10	10pcs
B13	13pcs	C13	13pcs
B16	16pcs	C16	16pcs
B20	21pcs	C20	21pcs
		D16	16pcs

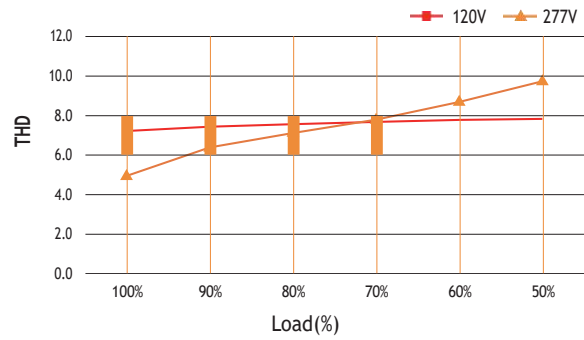
### 60W 12V

MCB	Input Voltage 120V Drivers	MCB	Input Voltage 120V Drivers
B10	10pcs	C10	15pcs
B13	13pcs	C13	20pcs
B16	17pcs	C16	24pcs
B20	21pcs	C20	30pcs
		D16	24pcs

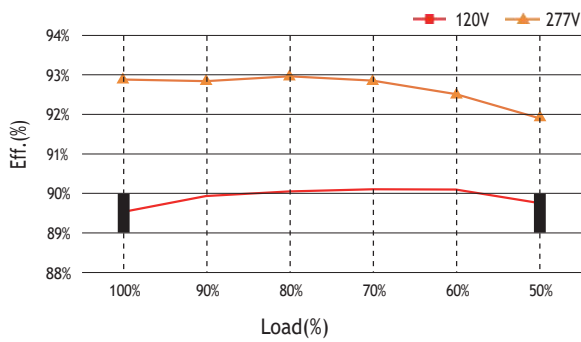
**PF vs Load Curve**



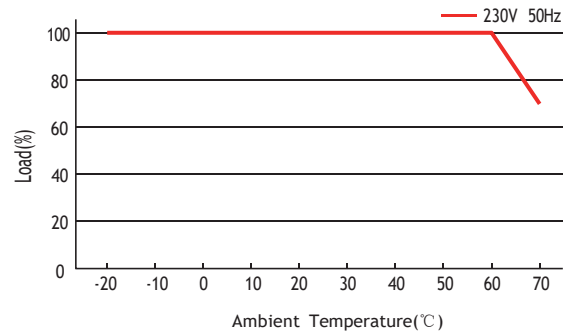
**THD vs Load Curve**



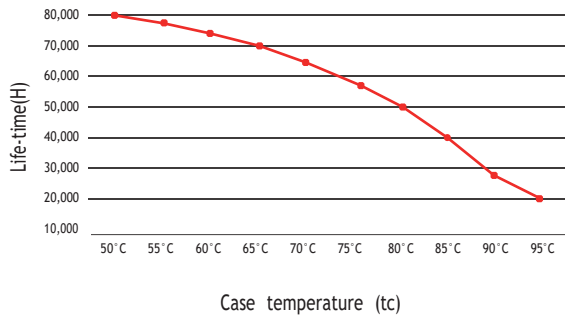
**Efficiency vs Load Curve**



**Derating Curve**



**Life-time vs. case temperature**



The lifetime of the LED driver is shown in the figure above (calculated based on 90% reliability). The relationship between  $t_c$  and  $t_a$  also depends on the luminaire design.

### Cautions

This product must be installed and adjusted by a qualified professional.		
1	Confirmation of installation conditions	<ul style="list-style-type: none"> <li>· <b>Waterproof and Protection:</b> Install in a suitable location according to the waterproof and protection requirements of the power supply. Products without waterproof function should be protected from direct sunlight and rain. When installing outdoors, please use a waterproof box for protection.</li> <li>· <b>Heat dissipation requirements:</b> The drive power supply should avoid exposure to high temperature environments. Please ensure that the working environment temperature is within the recommended range. To ensure proper heat dissipation of the drive power supply, a well ventilated area should be selected for installation. Good heat dissipation conditions can help extend product lifespan.</li> </ul>
2	Power check	<ul style="list-style-type: none"> <li>· Before use, check the product parameters and confirm that the output voltage and current of the LED power supply meet the requirements</li> </ul>
3	Safe wiring	<ul style="list-style-type: none"> <li>· Use cables that meet the specifications to ensure that the cross-section of the wire matches the requirements of the driving power supply. Solid cables typically measuring 0.75-2.5 mm<sup>2</sup>, (Please refer to the silk screen printing or wiring diagram in the instruction manual for specific wire diameter requirements).</li> <li>· If the power supply (metal casing) is installed on a grounded lighting component or equipment, the power supply needs to be grounded.</li> </ul>
4	Wiring confirmation	<ul style="list-style-type: none"> <li>· Before power on debugging, ensure that the wiring is secure and avoid poor contact to prevent unstable current or equipment damage.</li> </ul>
5	Repair suggestions	<ul style="list-style-type: none"> <li>· If the product malfunctions, please do not repair it without authorization. If you have any questions, please contact the supplier or sales team for assistance.</li> </ul>

※ The contents of this manual are updated without prior notice. If the function of the product you are using is inconsistent with the instructions, the function of the product shall prevail. Please contact us if you have any questions .

### Warranty Agreement

1. Warranty periods from the date of delivery : 5 years.
2. Free repair or replacement services for quality problems are provided within warranty periods.

### Warranty exclusions below:

The following situations are not covered by the free warranty or replacement service:

1. Exceeding the warranty period.
2. Damage caused by human factors such as high voltage, overload, and improper operation.
3. The appearance of the product is severely damaged or deformed.
4. Normal wear and tear or aging during regular product use.
5. Damage caused by natural disasters or force majeure factors.
6. The quality inspection label of the product is damaged (QC PASS).
7. No contract or valid invoice proof signed with EUCHIPS has been provided.

※ Remedies: Repair or replacement is the only remedy provided by EUCHIPS to the customer, and EUCHIPS shall not be liable for incidental damages arising from repair or replacement, unless within the scope of applicable law.

※ Adjustment of Warranty Terms: EUCHIPS reserves the right to modify or adjust the warranty terms, which shall be published in writing.

### Revision history

Change date	Version	Item	From	To
2026.06.02	V1.0	First release		