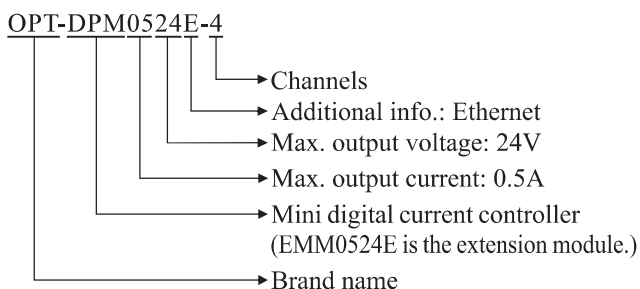


# DPM Mini Digital Current Controller Patented



## Selection Guide



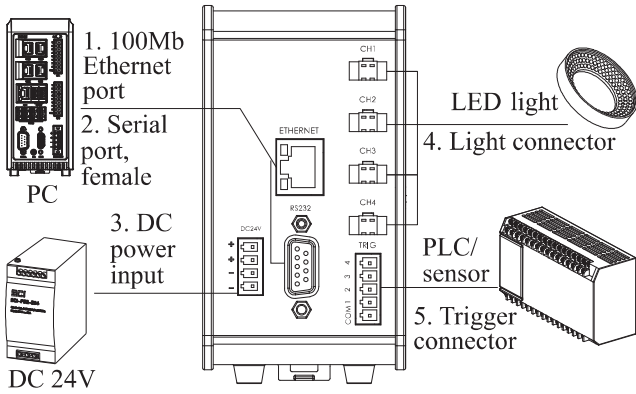
## Product Features

- Can extend up to 16 channels via adding EMM0524 modules
- 20 - 24V DC input voltage; convenient to use DC power on other devices
- Compact size
- Autosense™ technology
- Manual setting for Max. output current
- 100Mb Ethernet interface
- Simultaneous communication of multiple channels
- Trigger pulse width setting
- External trigger: External trigger input (e.g. camera trigger signal) for related light strobes and other sequences. (Strobe mode can greatly improve light source expectancy.)
- 256-level light intensity control
- RS232 interface
- Convenient mounting with screws or on DIN rails

## Specifications

Item	Parameter	Description
Input voltage	20 - 24V DC 7.5A	
Lighting mode	Continuous/strobe	Set via DEMO software
Auto sensing of light rated current	For 10mA - 0.5A 24V LED light	Set via DEMO software
Manual setting for max. output current	10mA - 0.5A	Set via DEMO software
Intensity control	256 intensity levels	Set via DEMO software
Short-circuit protection	Yes	The related channel is shut down when enabled. Remove the error and reboot to restore the channel.
Overcurrent protection	Yes	Enabled when the output current is higher than 110% of the set value, and the related channel is shut down. Remove the error and reboot to restore the channel.
Triggering	Level	
Normal trigger	256 intensity levels	
Normal trigger pulse width	1 - 999ms	Set via DEMO software
High intensity trigger	1A output per channel	
High intensity trigger pulse width	0.01 - 5.00ms	Set via DEMO software
Trigger response time	≤ 80μs	
Trigger response frequency	≤ 4kHz	
Output power	12W/CH 48W/4CH Total: 100W	Only connected with 24V 10mA - 0.5A LED light
Communication	RS232/Ethernet	
Standby power consumption	< 3W	
Operating temperature	-5°C - 50°C	
Dimensions (mm) (L×W×H)	59×69×110	Refer to the drawing for details
Weight (kg)	0.4	

**Device Overview**



No.	Item	Description
1	100Mb Ethernet port	Communication with PC via the Ethernet interface
2	Serial port, female	Communication with PC via the RS232 interface
3	DC power input	20 - 24V DC
4	Light connector	Each light individually controlled
5	Trigger connector	Connects external trigger for synchronized strobe; trigger pulse width settable

**Trigger**

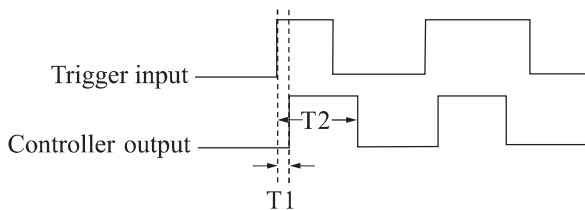
Trigger Mode	Trigger Polarity
Normal trigger	Rising edge trigger
	Falling edge trigger
	Positive follow trigger mode
	Negative follow trigger mode
High intensity trigger	Rising edge trigger
	Falling edge trigger
	Positive follow trigger mode
	Negative follow trigger mode

Remark: Rising edge trigger is the default trigger polarity.

**Trigger Sequence**

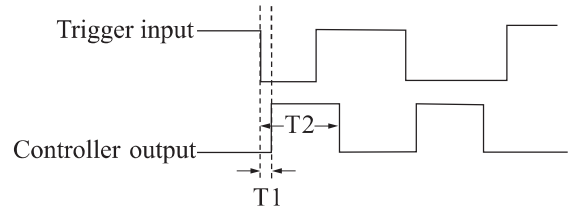
**Rising edge trigger**

The illumination time is equal to the trigger pulse width, which is set via DEMO software.



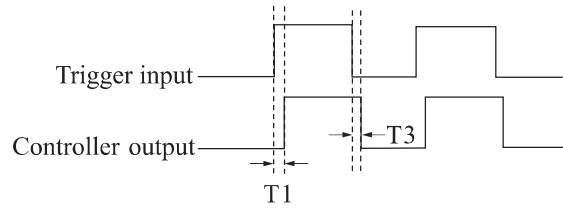
**Falling edge trigger**

The illumination time is equal to the trigger pulse width, which is set via DEMO software.



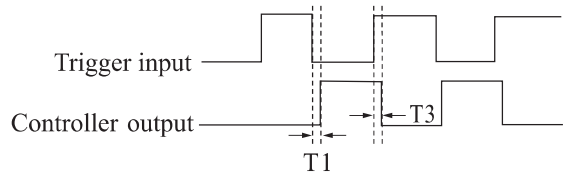
**Positive follow trigger mode**

When the trigger signal is at high level, the illumination time is the same as the high-level pulse width.



**Negative follow trigger mode**

When the trigger signal is at low level, the illumination time is the same as the low-level pulse width.

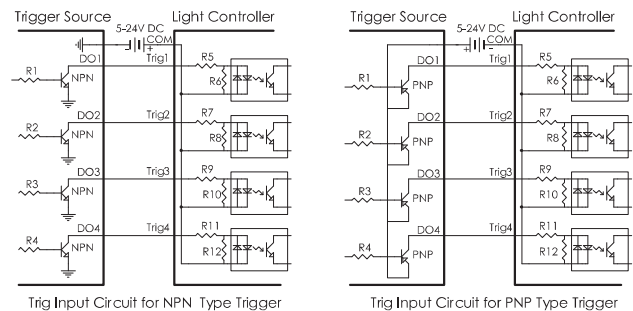


**Remarks**

1. T1: Enabling response time; T2: Trigger pulse width; T3: Disabling response time
2. Normal trigger: T1 ≤ 80μs; T3 ≤ 10μs; T2 setting range: 1 - 999ms
3. High intensity trigger: T1 ≤ 80μs; T3 ≤ 10μs; T2 setting range: 0.01 - 5.00ms

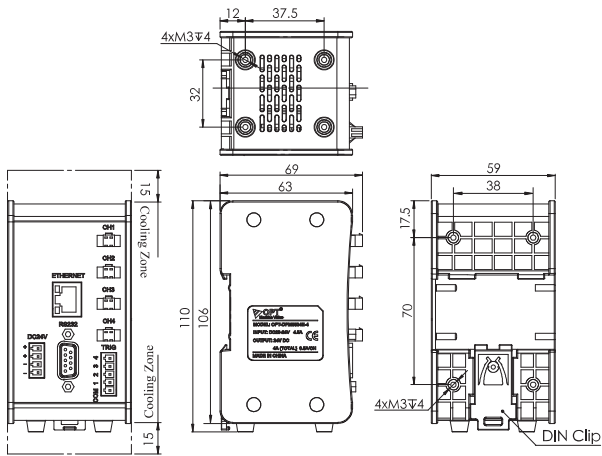
**Level Trigger Wiring Diagrams**

4 trigger channels, and bidirectional optocoupler inside  
Low level: 0 - 2V input voltage; high level: 5 - 24V input voltage. The rising edge trigger is the default trigger polarity. The diagrams are as below.



Dimensions (mm)

1. OPT-DPM0524E-4



2. OPT-EMM0524E-4

