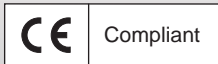
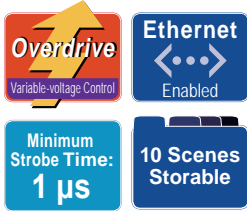


Multi-functional and fine-tunable Control Units



The supplied AC cord is for use with 100 to 120 VAC. If you would like to use the Control Unit with 200 to 240 VAC, you must procure another appropriate AC power cord.

POD-5024-2-PEI  
(2 channel model)

POD-22024-4-PEI  
(4 channel model)

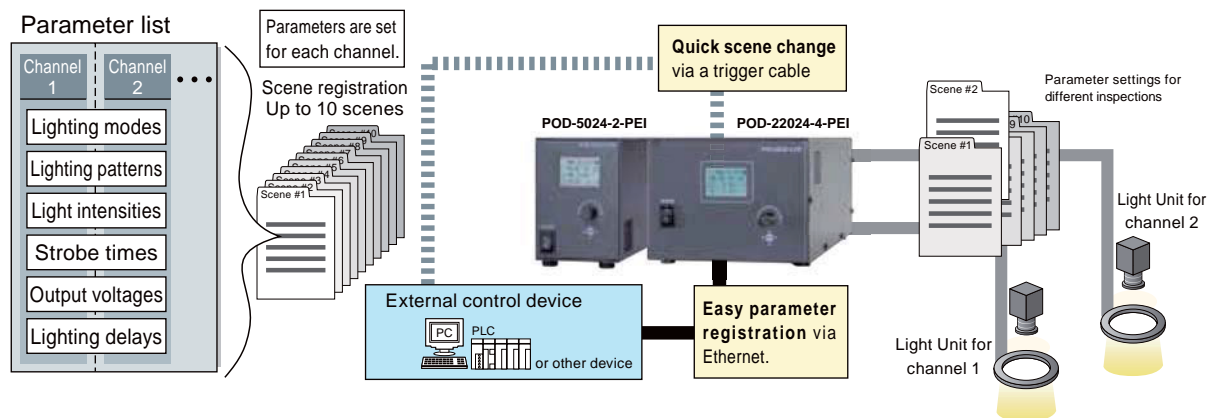
Features

- Strobe lighting. Overdrive specifications.
- Voltage control during overdrive operation.
- Ethernet and parallel communications
- Continuous lighting under PWM control
- Sets of parameters related to light control can be registered.
- The light intensity can be set to one of 512 levels. Output voltage: 24 to 48 VDC
- Minimum strobe time of 1 μs
- Strobe delay: 0 to 1,000 μs (in steps of 1 μs)
- 2 channels (POD-5024-2-PEI), 4 channels (POD-22024-4-PEI)
- Trigger link function (POD-22024-4-PEI)  
You can make the Light Units on multiple channels turn ON (or OFF) with a single trigger signal that is input through one of the pins of the trigger input connector.

A Specification Difference between POD-5024-2-PEI and POD-22024-4-PEI

In POD-22024-4-PEI (4-channel model), the lighting mode setting (Overdrive or PWM) is applied to all channels. Please note that the setting cannot be individually specified for each channel as in POD-5024-2-PEI (2-channel model).

● Registering Scenes (sets of parameters)

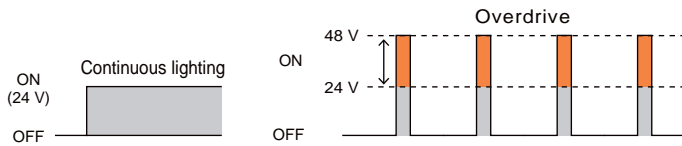


You can register sets of parameters called scenes that consist of the light control settings for all channels. By just applying a scene to the channels, you can easily change the settings. Up to 10 scenes can be registered. Refer to the "Instruction Guide" for details. For information on possible combinations of Light Units with a POD-series Control Unit, refer to our website.

● What Is "Overdriving"?

Overdriving is used to emit brighter light by applying a high voltage to an LED Light Unit.

This voltage exceeds the voltage for continuous lighting.

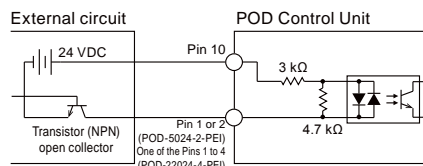


➤ Example Connections

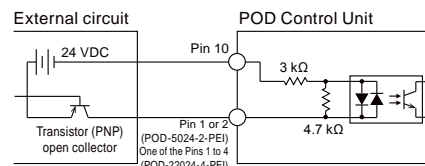
Refer to the "Instruction Guide" for details.

Example connections of external trigger signal

Sinking (NPN)



Sourcing (PNP)

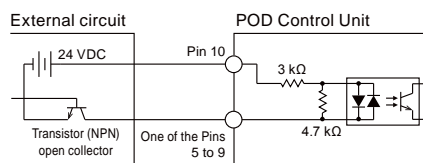


Connection specifications (for each terminal)				
Rated input voltage	Maximum input voltage	Photocoupler ON voltage / ON current	Photocoupler OFF voltage / OFF current	Response time
24 VDC	26.4 VDC	21.6 VDC min. / 6 mA min.	1.5 VDC max. / 1 mA max.	Refer to the sequence diagrams on the Instruction Guide.

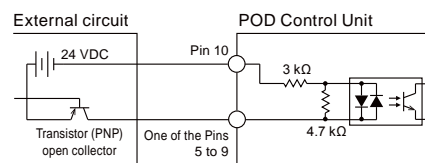
Setting of the LCG-TRG item on the COM Menu	Photocoupler	When lighting mode is set to O/D Mode, or when lighting mode is set to PWM Mode and lighting pattern is set to Strobe Lighting Pattern		When lighting mode is set to PWM Mode and lighting pattern is set to Continuous Lighting Pattern
		ON	OFF	Light Unit OFF
ACTIVE HI	ON	No change		Light Unit OFF
	OFF	Light Unit flashes for the strobe time.		Light Unit ON
ACTIVE LO	ON	Light Unit flashes for the strobe time.		Light Unit ON
	OFF	No change		Light Unit OFF

Example connections of external trigger signal (Applying scenes)

Sinking (NPN)



Sourcing (PNP)

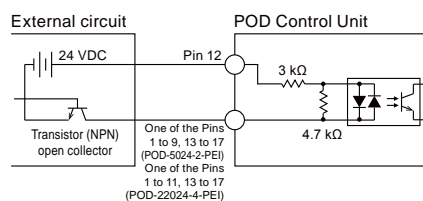


Photocoupler	Data	
	When the LGC-PAR item on the COM Menu is set to ACTIVE HI	When the LGC-PAR item on the COM Menu is set to ACTIVE LO
ON	1	0
OFF	0	1

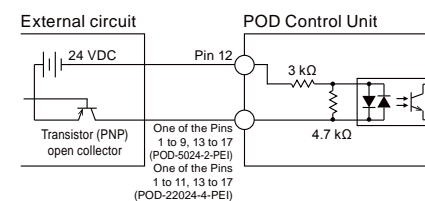
Scene number	Data				LCD
	SC3	SC2	SC1	SC0	
00	0	0	0	0	S01
01	0	0	0	1	S02
02	0	0	1	0	S03
03	0	0	1	1	S04
04	0	1	0	0	S05
05	0	1	0	1	S06
06	0	1	1	0	S07
07	0	1	1	1	S08
08	1	0	0	0	S09
09	1	0	0	1	S10

Example connections of external signal (Parallel communications)

Sinking (NPN)



Sourcing (PNP)



Photocoupler	Data		Connection specifications (for each terminal)				
	When the LGC-PAR item on the COM Menu is set to ACTIVE HI	When the LGC-PAR item on the COM Menu is set to ACTIVE LO	Rated input voltage	Maximum input voltage	Photocoupler ON voltage / ON current	Photocoupler OFF voltage / OFF current	Response time
ON	1	0	24 VDC	26.4 VDC	21.6 VDC min. / 6 mA min.	1.5 VDC max. / 1 mA max.	Refer to the sequence diagrams on the Instruction Guide.
OFF	0	1					

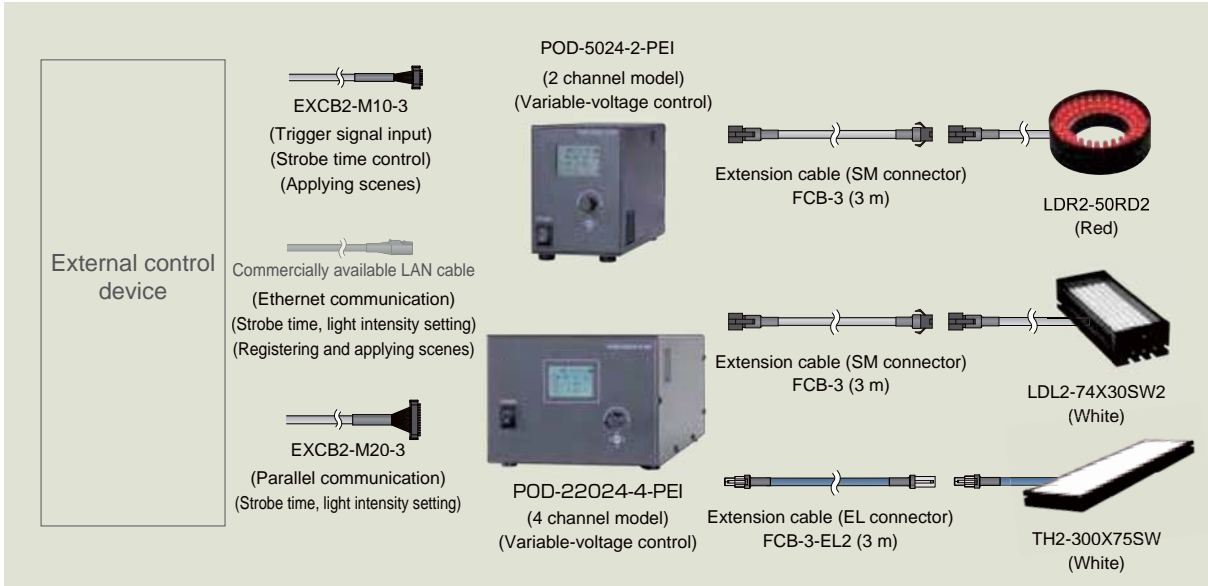
# POD Series



## Example System Configuration

Example:

External control device — External control cable — Control Unit — Extension cables — LED Light



## Specifications

Model name	POD-5024-2-PEI / POD-22024-4-PEI		
Lighting method	Strobe lighting (Overdrive mode), continuous lighting (PWM mode)		
Drive method	Constant-voltage system		
Intensity control method	Variable-voltage control or PWM control		
Number of channels	POD-5024-2-PEI: 2 channels / POD-22024-4-PEI: 4 channels		
Number of output connectors	POD-5024-2-PEI	L1: 1 (SM connector), L2: 1 (SM connector)	
	POD-22024-4-PEI	L1: 2 (EL connectors, SM connectors), L2: 2 (EL connector, SM connector), L3: 1 (SM connector), L4: 1 (SM connector)	
Output ratings <sup>*1</sup>	POD-5024-2-PEI		POD-22024-4-PEI
	When both channels are in O/D Mode	Output current: 10 A max. (total for 2 channels)	O/D Mode (peak)  <b>Total for 4 channels: 50 A max.</b> L1, L2: 15 A max./channel (EL connector: 15 A max./channel) (SM connector: 10 A max./channel) L3, L4: 10 A max./channel
	When both channels are in PWM Mode	Output power: 45 W max. (total for 2 channels)	
When the channels are used together with different lighting modes	Output current: 6.3 A max. and Output power: 36 W max. (total for 2 channels)	PWM Mode  <b>Total for 4 channels: 200 W max.</b> L1, L2: 100 W max./channel (EL connector: 100 W max./channel) (SM connector: 60 W max./channel) L3, L4: 60 W max./channel	
Output voltage (ratings)	Overdrive (O/D) mode: 24 to 48 VDC, PWM mode: 24 VDC		
PWM frequency	125 kHz		
Light control settings	Manual	Operation on the front panel	
	External	Command input via TCP/IP or UDP/IP communications Signal input through parallel port	
Strobe time settings	Manual	Operation on the front panel	
	External	Command input via TCP/IP or UDP/IP communications Signal input through parallel port	
Lighting delay settings	Manual	Operation on the front panel	
	External	Command input via TCP/IP or UDP/IP communications Signal input through parallel port	
Input power	100 to 240 VAC (+10%, -15%), 50/60 Hz		
Power consumption (typ.)	POD-5024-2-PEI: 65 VA, POD-22024-4-PEI: 260 VA		
Inrush current (typ.)	POD-5024-2-PEI: 15 A (at 100 VAC), 36 A (at 240 VAC) from a cold start POD-22024-4-PEI: 17 A (at 100 VAC), 40.8 A (at 240 VAC) from a cold start		
Ground leakage current	3.5 mA max. (264 VAC, 60 Hz, with no load)		
Insulation withstand voltage (input-output, input-FG)	1,500 VAC for one minute, Cutoff current: 10 mA, 500 VDC, 20 MΩ min.		
Overvoltage category	Category II		
Operating environment	Temperature: 0 to 40°C, Humidity: 20% to 85% (with no condensation)		
	Altitude: 2,000 m max., Protective ground class: Class I, Pollution degree: 2, Indoor use only		
Storage environment	Temperature: -20 to 60°C, Humidity: 20% to 85% (with no condensation)		
Cooling method	Forced air cooling		
CE marking	Safety standard: Conforms to EN 61010-1 EMC standard: Conforms to EN61000-6-2, EN61000-6-4		
Environmental regulations	RoHS compliant		
Material, coating, and surface processing	Steel sheet, Cover thickness: 1.6 mm, Chassis thickness: 1.0 mm, N3 (leather tone)		
Weight	POD-5024-2-PEI: 1,500 g max., POD-22024-4-PEI: 3,300 g max.		
Accessories	Instruction Guide x1, 2-m-long 3-prong AC power cord with ground terminal x1		

<sup>\*1</sup> For manual control and Ethernet communications: 1 to 1,000 μs (in steps of 1 μs), 1,002 to 3,000 μs (in steps of 3 μs)  
For parallel communications: 3 to 3,000 μs (in steps of 3 μs) for high strobe time range, 1 to 1,000 (in steps of 1 μs) for low strobe time range

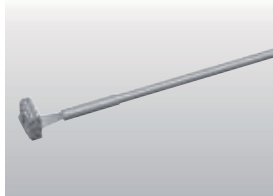
## Options

### External control cables

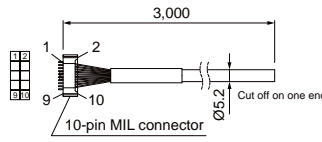
Dimensions (mm)

#### Trigger input cable

Used to input an external trigger signal of parallel bits. Used for performing strobe lighting and scene application.



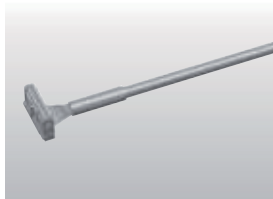
Model name: EXCB2-M10-3



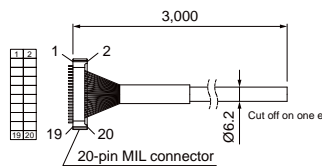
PIN No.	Line color	Marking
1	Orange	Black1
2	Orange	Red1
3	Gray	Black1
4	Gray	Red1
5	White	Black1
6	White	Red1
7	Yellow	Black1
8	Yellow	Red1
9	Pink	Black1
10	Pink	Red1

#### Parallel communication cable

Used for performing external control via parallel communication.



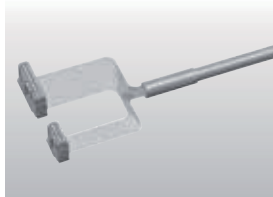
Model name: EXCB2-M20-3



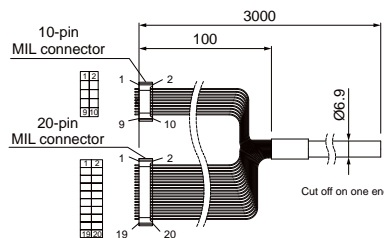
PIN No.	Line color	Marking	PIN No.	Line color	Marking
1	Orange	Black1	11	Orange	Black2
2	Orange	Red1	12	Orange	Red2
3	Gray	Black1	13	Gray	Black2
4	Gray	Red1	14	Gray	Red2
5	White	Black1	15	White	Black2
6	White	Red1	16	White	Red2
7	Yellow	Black1	17	Yellow	Black2
8	Yellow	Red1	18	Yellow	Red2
9	Pink	Black1	19	Pink	Black2
10	Pink	Red1	20	Pink	Red2

#### Parallel communication/Trigger input branch cable

Branch cable that combines parallel communication and trigger input cables into a single cable.



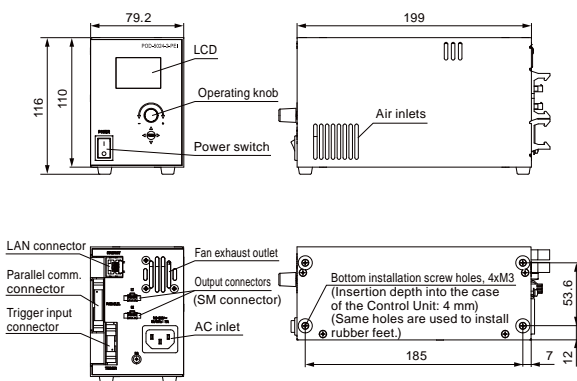
Model name: EXCB2-M10M20-3



10-pin MIL connector			20-pin MIL connector		
PIN No.	Line color	Marking	PIN No.	Line color	Marking
1	Orange	Black1	11	Orange	Black2
2	Orange	Red1	12	Orange	Red2
3	Gray	Black1	13	Gray	Black2
4	Gray	Red1	14	Gray	Red2
5	White	Black1	15	White	Black2
6	White	Red1	16	White	Red2
7	Yellow	Black1	17	Yellow	Black2
8	Yellow	Red1	18	Yellow	Red2
9	Pink	Black1	19	Pink	Black2
10	Pink	Red1	20	Pink	Red2

## Dimensions (mm)

### POD-5024-2-PEI



### POD-22024-4-PEI

