

Universal UV LED Timer / Power Controller



1. Key performance feature and application

Key Performance Features	Application
<ul style="list-style-type: none"> • Both timer and current driving function • Easy set LED control timer and LED driving current value • Constant LED current diving, maximum protect LED overcurrent, working current adjustable. • Both manual and auto timer control once start to run • Auto save setting data value in internal Eeprom, do not need every time set when power turn on. • This controller has three control LED switch option : <ol style="list-style-type: none"> 1. Front panel switch 2. Rear panel output for handheld UV LED curing light push button control. 3. Foot pedal switch for UVLED curing light control. • Internal reverse, overcurrent, and rush pulse protection, low current ripple, which means it can safely drive expensive high current UV LED. • Economical price 	<ul style="list-style-type: none"> ❖ Ultraviolet LED light adhesive curing system ❖ Ultraviolet LED light coating, sealing ❖ Irradiation of biological samples ❖ Ultraviolet LED light in printing, PCB circuit board production, and 3D printing, nail art. ❖ Medical, biomedical and dental laboratory.

2. Specification

Specifications		
Electrical Parameters	Typical	Note
Timer range	1 ~ 3600 second	60 Hours timer is also available by order note
Timer set resolution:	1 second	1ms set resolution is also available by order note
Maximum LED driving current	5.0V/5.0A	Type : UTPC-5.0V-5.0A
	12V/3.0A	Type : UTPC-12V-2.1A
	24V/1.2A	Type : UTPC-24V-1.1A
	36V/1.2A	Type : UTPC-24V-0.75A
Input power	100~240V/AC 0.7A ; 50/60Hz	
Power consumption	0.2W ~1W with fully load	
Turn on /off Load LED method	Push button on front panel	
	K2 , a push button switch wire connection on output port on rear plane DB-9 female connector K2	
	K3, a foot pad switch port wire connection on output port on panel	
Mechanical Parameters	Typical	Note
Dimensions (L x W x H) :	197 x 165 x 60 mm	
Weight	0.9kg	
Operation temperature	-10 °C ~ +50 °C	
Storage temperature:	-10 °C ~ +75 °C	

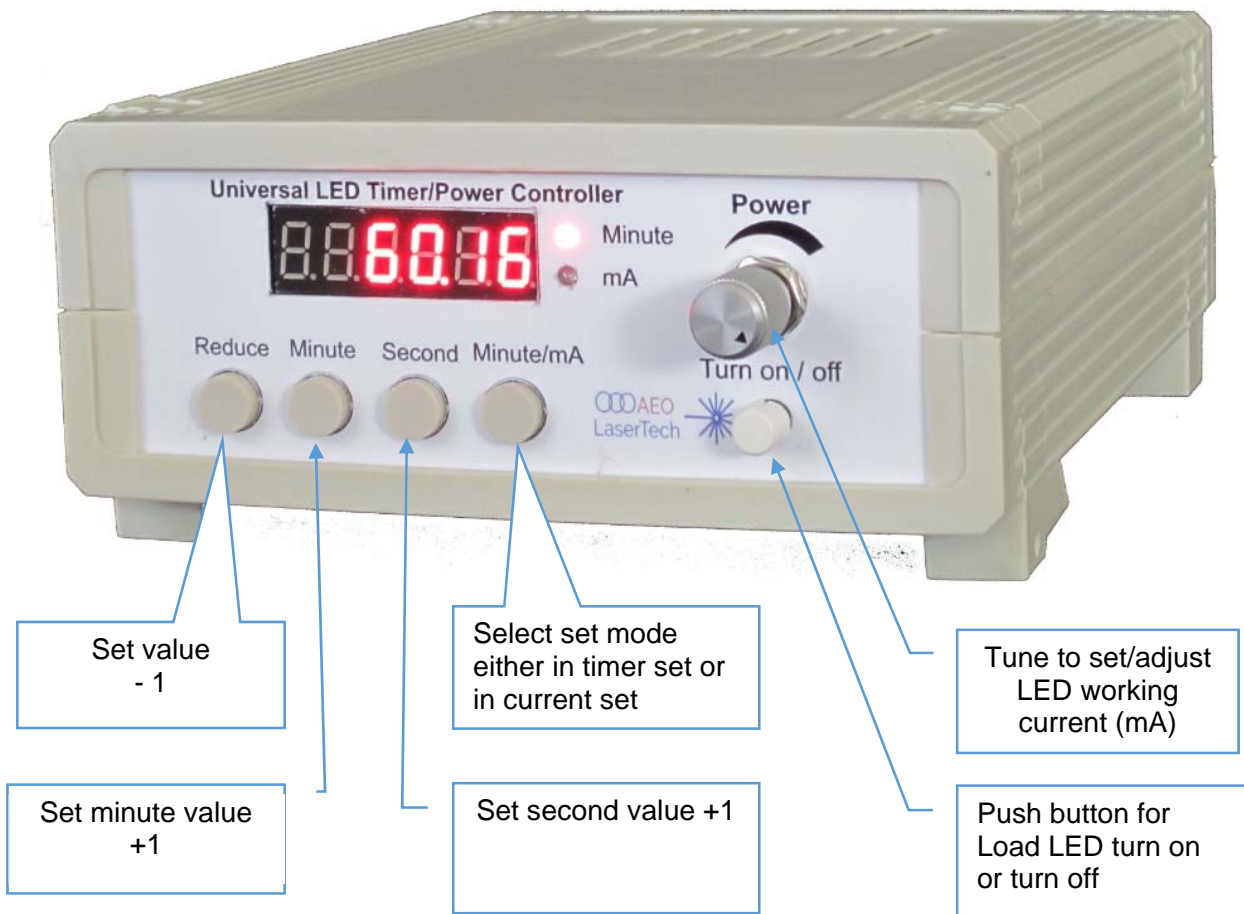
3. Product description

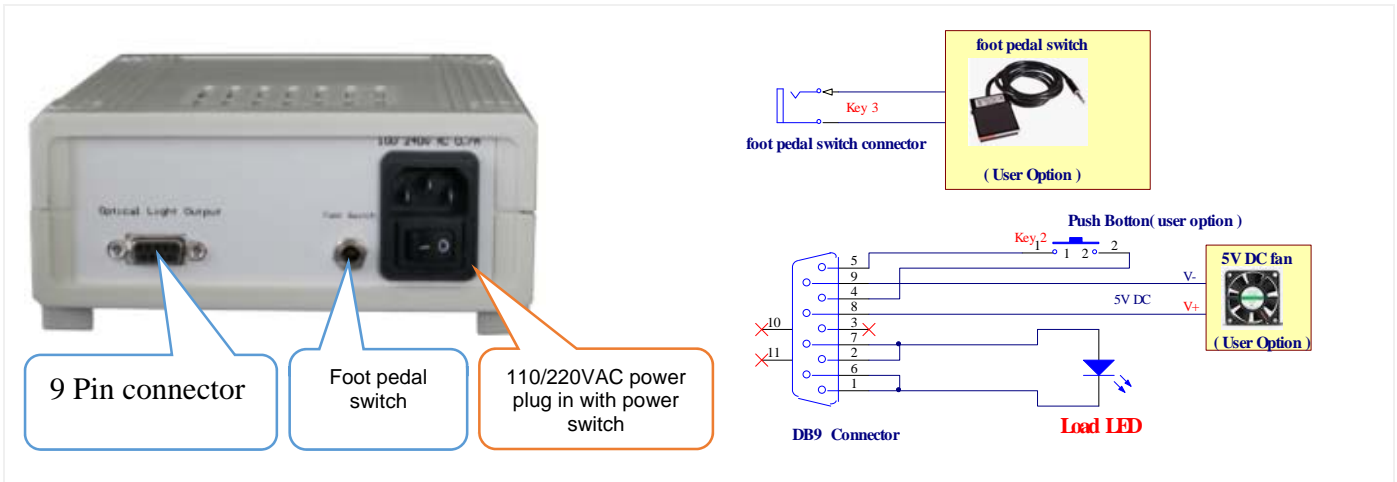
3.1 This UTPC series Universal Timer and Power Control is designed for variety power LED current driving. This controller makes user's Load LEDs work in constant current status, which maximally protect LED life time.

This type controller has unique control function in market both in tunable LED working current and precise timing set. It is widely used in various ultraviolet light adhesive fast and deep epoxy curing, especially good for hand held UV spot light use. Users can either use front panel push button or finger push button, also use foot pedal switch. These controller is also designed to meet the demands of precision assembly applications that can be easily integrated into both automated and stand-alone manufacturing environments.

4. Operation instruction:

4.1 Front panel key and LED display function





4.2 Operation step:

- 4.2.1** : Connect the Load LED based on rear panel wire diagram, user select whether need a push button switch on LED device, such as handheld UV curing lamp. If there is no push button on LED device, just use foot pedal switch or simply use push button on front panel.
- 4.2.2** : Connect a 5V DC fan for heat dissipation if need.
- 4.2.3** : Turn on AC power switch on rear panel.
- 4.2.4** : Push function key 'Minute/mA' to select working in current set status, 'mA' led indicator on LED display right side will be illuminated, then turn the function power knob and see led display value, which respective the LED working in mA value., for example : led panel displays '100' that means the LED Load working current is set to 100 mA.
- 4.2.5** : Push function key 'Minute/mA' to select working in time setting status, 'Minute' led indicator on LED display right side will be illuminated, then push 'Second' function key to set second +1, if need increase time to minute, just push 'Minute' function key, which respective the LED working timing set value, for example if want to set timer in 60 minute and 16 second, just push 'minute' key to increase the value to 60, and push 'second' key to increase value to 16, you can also push button 'Reduce' to -1 to reduce set value.
- 4.2.6** : Once the power and timer setting has done, for example set timer to 10 second, push button 'Turn on/off', the controller timer immediately start to run, and LED display will show timer is reducing number from 10 to 0 with 1 second step, and at the same time, the controller turn on LED and DC fan power, after timer reduce to 0, the controller will turn off Load LED and DC fan, also controller will return to 10 seconds set. User do not need set the timer and power again, every set value has been saved to internal EEPROM, even power off and power on again.
- 4.2.7** : If need turn off Load LED while timer is working, even timer has not reduced to zero, just push 'Turn on/off' button or foot pedal switch K3 or K2, both the Load LED and DC fan will turn off and timer and power set automatically return to previous set status.

5. CAUTION

5.1 User Responsibility



110/220 VAC high voltage inside

To avoid electrical shock, before powering device, make sure that the protective conductor of the 3-conductor power cord is correctly connected to the protective earth contact of the socket outlet. Improper grounding can cause electric shock resulting in severe injury or even death. Do not operate without cover installed.



If drive high power UV LED, avoid exposure UV light directly to eyes



6. Warranty:

AEO Lasertech guarantees its products to be free of defects for one year from the date of shipment. During the warranty period, AEO Lasertech will, at its option, either repair or replace products which prove to be defective. Opening, modification and or servicing of this device is expressly prohibited and will result in nullification of product warranty.