

# CHRONO-B1

## recycling - repeat timer



### Specs

Input voltage	120 Volts AC
Maximum amperage	14.5 amps @ 120 VAC
On Time range	15 seconds to 5 hours
Off Time range	15 seconds to 13 hours
Timing accuracy	+/- 5% of fixed scale
Timing repeatability	+/- .3%
Weight	< 1 lbs
Dimensions	3" x 6" x 3.5"

### Basic Description

The CHRONO-B1 is a simple repeat / recycling timer. That means that when it is connected to a power source, the timer will recycle or "repeat" its ON and OFF timing schedule until power is \*removed. Once the CHRONO-B1 is connected to a power source, and your chosen device is connected to the CHRONO-B1 power outlet, the device connected will be automatically turned ON and OFF based on the settings you select using the two adjustment knobs.

\*The built-in photocell may also play a role in when the timer is activated. The user can select Day, Night or 24-hour mode.

The two adjustment knobs make it easy to change the timer settings and to provide a quick visual verification of the set-points. The LEDs on the front of the unit will turn ON and OFF to show the user the current conditions of the CHRONO-B1.

**NOTE: This unit is water-resistant however...**

**Keep it away from water!!! It is NOT WATER PROOF.**

### Installation

Plug the unit into a standard NEMA 5-15 wall outlet. A 120 volt power supply is required. For more permanent installations, the mounting tab at the top of the unit can be secured to a wall.

Ensure that the device being connected to the CHRONO-B1 has the proper voltage and will not exceed the maximum amperage rating of this unit. Connect the device to be controlled into the power outlet on the front of the unit.

**NOTE: If you are trying to control multiple devices, a power expansion module can be used to increase the total amount of power that can be controlled.**

**DO NOT EXCEED THE MAXIMUM RATING!!!**

## Selecting Day Night or 24-hour Mode

Before using this unit, the user must decide if they want the timer to function during the Day, Night or 24-hours (continuous). The built-in photocell will sense the lighting level and activate the timer based on the selected "Mode". The 2 knobs on the unit are used to select the desired timer mode.

*\* The unit must be connected to power to select the mode.*

**To select DAY mode:** Rotate both knobs fully COUNTER-clockwise. After a couple seconds the LEDs on the front of the unit will start flashing On / Off. After the LEDs stop flashing, the selected mode is indicated by the LED that remains illuminated. (\*Verify the **Day** mode LED is ON.)

**To select Night mode:** Rotate both knobs fully clockwise. After a couple seconds the LEDs on the front of the unit will start flashing On / Off. After the LEDs stop flashing, the selected mode is indicated by the LED that remains illuminated. (\*Verify the **Night** mode LED is ON.)

**To select 24-hour mode:** Rotate the left knob fully COUNTER-clockwise and the right knob fully clockwise. After a couple seconds the LEDs on the front of the unit will start flashing On / Off. After the LEDs stop flashing, the selected mode is indicated by the LED that remains illuminated. (\*Verify both the **Day** and **Night** mode LEDs are ON.)

## Changing Timer Settings

After the timer mode is selected, the timer settings can now be adjusted. Rotate the On and Off timers to the desired setting.

The CHRONO-B1 allows a wide range of time settings, but it may take some trial and error to get them adjusted correctly. A stop-watch or other timer can be used to check the actual recycling times. Once the actual time is known, the user can make small adjustments to get to their desired settings.

## Q & A

**How can I tell if the photocell is working?** There is a built-in 30 second time delay for the photocell to change status. A green LED on the top RIGHT edge of the unit that says "Daytime" will light up when the photocell is in Daytime mode.

**Can I connect more than one device to the unit.** Yes... As long as the total amperage of the devices connected to the unit do not exceed the maximum rating of the unit. We recommend the total amps not to exceed 75% of the rating.

**The timer setting does not seem to be correct?** Because of the wide range of timer set-points, any small adjustment can result in a large change in time setting. If the timer does not seem to be turning on and off at the correct times, make small adjustments using another timer such as stop-watch or analog clock as a reference.

**What if there is no power?** Ensure the unit is getting power. Check the device that is connected to the unit by plugging it directly into a known power supply. If the unit will not turn on and no LEDs will illuminate, contact your distributor for repair and warranty issues.

**The timer is turning on and off only some of the time, or ALL of the time.** Verify that you have selected the correct timer "mode". Depending on what timer "mode" is selected, the timer will work when the photocell is activated by the available light level. Ensure enough light (or darkness) is present to change the status of the photocell from night to day status.