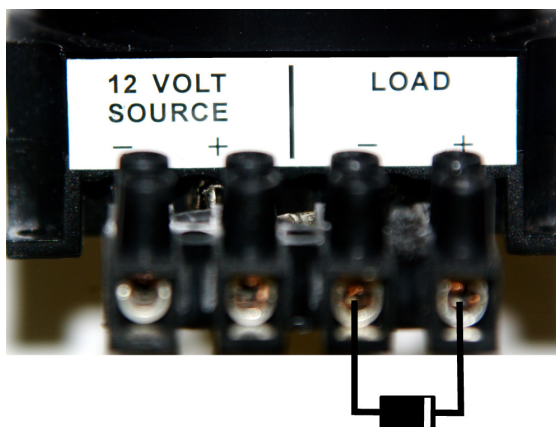


# 12V Digital Timer

## Programmable Switch with LCD Display

### Features

- Can switch a 12 volt light or appliance **ON** and **OFF** up to 8 times per day and up to 11 variable weekly cycles.
- Can switch up to 10 amps of current. Note: please incorporate a 'catch diode' as per diagram below if the timer is to be used to switch a motor **ON** and **OFF** (e.g. a water pump).
- Timer has 24 hour internal clock and date settings.
- Day of the week is denoted by indicator pointing to numbers 1 to 7 across the top of the LCD display ... Monday to Sunday as follows:- 1=Mon, 2=Tues, 3=Wed, 4=Thurs, 5=Fri, 6=Sat, 7=Sun.
- Timer can be set for 8 different "ON" and "OFF" cycles using 16 different program numbers alternating between "ON" and "OFF" times (eg even numbers "ON", odd numbers "OFF").
- Timer has an internal 1.2 Volt NiMH battery that is recharged when timer is connected to a 12 volt supply. This internal battery enables the timer to save the program settings for about 1 month, if ever disconnected from the power source for any reason.



End view of terminal showing position of 'catch diode' which would be required if the timer is to operate a motor.

- The day or days of the week that a certain switching program operates, can be selected either individually or in certain groupings. There are 11 options:
  1. Every days (1-7)
  2. Monday only (1)
  3. Tuesday only (2)
  4. Wednesday only (3)
  5. Thursday only (4)
  6. Friday only (5)
  7. Saturday only (6)
  8. Sunday only (7)
  9. Weekdays (1 to 5)
  10. Saturday and Sunday (6 and 7)
  11. Monday to Saturday (1 to 6)
- Backup Battery included.



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## Connect timer to a 12 volt supply with correct polarity.

1. Please install a 15 amp fuse in the supply circuit to protect the cables and the timer.
2. If the timer is to be mounted on a metal or other electrically conductive material, then please place plastic or other insulating material behind the timer before screwing or sticking it in position.


## Setting the internal clock to correct time

Sliding the "Run" switch to the "clock" symbol on the left and then pressing the "OK" button selects the units to be set (Day, Hr, Min, Sec). The ( + ) and ( - ) buttons then increment or decrement the flashing digits to set the correct time.

## Procedure to set internal clock

1. Do 'Reset' of timer. (Push the recessed "R" button with say the end of a paperclip)
2. Move slider switch on top right hand side to "clock" symbol.
3. Press "OK" button once: A triangle symbol will flash under the "1" at the top of the display. This indicates Monday.
  1. (1 to 7 are the days of the week, Monday to Sunday)
4. Press the ( + ) key until the correct day is flashing, (i.e. 1 to 7 = Mon to Sun)
5. Press "OK" again and the "HRS" digits will flash.
6. Press ( + ) or ( - ) button to set clock hours time of day. (24 hour clock)
7. Press "OK" again and "Mins" digits will flash.
8. Press ( + ) or ( - ) button to set the clock mins time. (0 to 59)
9. Press "OK" again and "Secs" digits will flash.
10. Press ( + ) or ( - ) button to set correct clock seconds time.
11. Press "OK" again and display indicates current time that you've set.
12. Return the slider switch to ' RUN ' position for normal operation.

## Setting the TIMER " ON " time

1. Slide the "Run" switch to **P** for program (-01- is displayed indicating program 1)
2. Press "**P**" momentary push-button at lower left of timer panel. Display indicates -- -- : -- -- (It may display some digits, if previously programmed). Note: the  button will delete previous program.
3. Press " + " or " - " button. A small graphic symbol for a light globe is displayed on the right hand side of screen, and one or more of the triangle " Day " pointers will flash at the top of the display.
4. Using the + and - push-buttons, cycle thru the "day" options, until the desired day or combination of days is indicated by displayed triangle pointer. (Day 1 to 7 = Monday to Sunday)
5. Press the "**OK**" button, and the "Hrs" digits flash. Using the + and - buttons, set the desired "Hrs" turn-on time.
6. Press "**OK**" to lock it in and now the "Mins" digits will flash. Using the + and - buttons, set the desired "Mins" turn-on time.
7. Press "**OK**" to lock setting and now "Secs" digits will flash. Using the + and - buttons, set the desired "Secs" turn-on time.
8. Pressing the "**OK**" button now completes the setting of Program 1 On-Time.
9. The "Run" slider switch is left in the "**P**" position until the "Off-time" is set.

## Setting the TIMER " OFF " time

To set the "Off-Time" for the operation that was just set in the above steps:-

10. Press "**P**" button at bottom left of Timer. (-02- is displayed)
11. Press "**P**" push button again. Display indicates -- -- : -- -- (It may display some digits if previously programmed)
12. Press " + " or " - " button. Note the small graphic symbol for a light globe has gone from R/Hand side of screen,
  1. and one or more of the triangle " Day " pointers will flash at the top of the display.
13. Using the + and - push-buttons, cycle through the "day" options, until the desired day or combination of days is indicated
  2. by displayed triangle pointer. (1 to 7 = Mon to Sun)
14. The remaining steps in setting the 'Off-time' for Day, Hrs, Mins and Secs are identical to steps 5 to 9 above, used to set
  3. the "On" time.
15. After completion, a successful ON/OFF program has been set. Return the "RUN" Slider switch to the centre "**RUN**" position.

## Operation

For normal operation, the slider switch marked "I – AUTO – O" will be left in the "AUTO" position.

The "I" and the "O" positions provide a timer-override facility, so that you can force the load device (light, pump etc) to be either **ON** or **OFF** irrespective of the timer program. Moving the switch to "I" forces it to be **ON**, and to "O" forces it to be **OFF**. If the timer program was for the device to be switched **ON** and you force it to be **OFF** with the slider switch, then when the slider switch is returned to 'AUTO' the device will **NOT** turn back **ON** until the next "ON" program sequence occurs. If you want it back **ON** immediately, then move the slider to "I" before returning it to the "AUTO" position.