DIY GUIDE

AUTOMATING YOUR WATERING
Three ways to automate your garden

Choose the style to suit your system

Automating your watering is an ideal way to ensure your garden gets the amount of water it needs and avoid over watering. In many regions automating your garden watering can assist you in complying with water restrictions. You can automate your garden watering using manual tap timers, automatic tap timers or with a fully automated watering system.

**MANUAL TAP TIMERS**

The simplest way to automate your watering.
- No batteries required
- Connect directly to the garden tap
- Suit tap based watering systems or hose and sprinklers

Easy.

**AUTOMATIC TAP TIMERS**

Can be programmed to turn on and off automatically at set times.
- Connect directly to the garden tap
- Battery operated
- Step by step programming
- Allow multiple start times
- Suit tap based watering systems

Simple, instructions are included.

**FULLY AUTOMATED WATERING SYSTEMS**

Control the irrigation for an entire garden.
- Fully automate garden watering
- Many components including; auto controllers, solenoid valves and other accessories
- Suits gardens with multiple separate watering areas (zones)
- Connects to mains water and power

Some areas may require professional assistance.
The easiest way to time your garden watering

**MANUAL TAP TIMERS**
- Suit hose and sprinklers
- Suit drip and spray systems
- Connect directly to tap
- Easy to operate — just turn dial to time required
- Save time, money and minimise water wastage
- Must be turned on while at home
- Turns off when the time set has expired
- 2hr or 6hr versions

**SELECT THE TIMER TO SUIT YOUR NEEDS**

NB: During periods of water restrictions choose a timer that complies with local regulations. Check with your local authority to determine the requirements for your area.

**INSTALLATION AND USE**

1) Connect tap timer to tap.
2) Set timer by turning dial and then turn tap on.
2) Timer will shut off the flow of water once time has elapsed.
The simple way to automate your garden watering

**AUTOMATIC TAP TIMERS**

- Suit hose and sprinklers
- Suit drip and spray systems
- Suit lawn pop-up systems
- Connect directly to garden tap
- Are simple to install and program
- Are battery operated
- Operate whether you’re at home or away
- Offer set and forget watering
- Have multiple start times available
- Save time, money and minimise water wastage
- Are available in different styles for different needs

**SELECT THE TIMER TO SUIT YOUR NEEDS**

NB: During periods of water restrictions choose a timer that complies with local regulations. Many Pope Automatic timers allow you to select calendar watering (e.g. Mon, Wed, Fri) or interval watering (e.g. every 2nd or 3rd day). Check with your local authority to determine the requirements for your area.

Digi Flow Tap Timer
Installation and use of automatic tap timers

When can’t I use an Automatic Tap Timer?

Automatic Tap Timers can be used in most normal household applications that use mains water. However you should not use an Automatic Tap Timer:

- if you use bore or unfiltered water;
- if you use any kind of pump to draw water;
- for commercial applications; or
- if it is likely to be subject to more than “seasonal” amounts of water (eg. in the path of sprinklers or other emitters, or with a leaking tap.)

**TIP!**

For greater watering efficiency consider using a Rain Sensor with your watering system.

Simple, instructions are included.
Installing an automated system

FULLY AUTOMATED WATERING SYSTEMS

• Suit gardens with multiple watering areas
• Allow you to water separate garden areas independently
• Turn the water on and off automatically
• Connect to the mains water and power
• Have many components including auto controllers, solenoid valves and accessories

1 WATERING ZONES

Automated systems are programmed to water one garden area (or zone) at a time. Solenoid valves open and close one solenoid at a time, according to the programs set in your Auto Controller.

2 SELECTING THE CORRECT VALVE ACCORDING TO WATERING NEEDS

25mm Solenoid Valves can be used for pop up sprinklers, drippers and spray systems.

13mm Mini Barb Solenoid Valves can be used for spray and drip systems only.

13mm Mini Barb Solenoid Valves cannot be used for pop up sprinkler systems.
Installing an automated system

3 ASSEMBLING YOUR MANIFOLD AND SOLENOID VALVES

25mm Solenoid
Screw the 25mm Solenoid Valve directly into the manifold.

13mm Solenoid
Screw the 13mm adaptor to the manifold, then screw the 13mm Mini Barb Solenoid Valve to adaptor.

Only screw manifold together after solenoid valves are attached.

Make sure the arrow points in the direction of the water flow.

4 CONNECTING TO THE WATER MAINS

Connect your manifold to the off-take with PVC Pipe. The pressure rating of this pipe must meet local regulations. Do not connect the manifold to your garden tap.

Engage a Licensed Plumber to connect into the potable mains and to install a backflow device. Ask the Plumber to install an off-take with an isolation valve for the irrigation system so that the normal household main is not interrupted if the irrigation system needs servicing.

A master valve can help prevent water wastage from leaks or damaged pipework. Install directly after the isolation valve.

Some areas may require professional assistance.

Use PVC Pipe up to the Manifold and Solenoid Valves … not poly tube!
Installing an automated system

5 CONNECTING SPRINKLERS AND POLY PIPE

Use directors to connect either 19mm poly pipe (for pop-up sprinklers) or 13mm poly pipe (for sprays and dripper systems). Lay poly pipe and connect sprinklers, sprays or drippers as per your plan. Remember to use locking or Loc-Sure™ clamps on all barbed fittings.

Once the solenoid valve is installed, connect the director to the solenoid valve, then connect the poly pipe.

6 TESTING THE SYSTEM

When the solenoid valves and manifolds are connected and the glue on the PVC Pipe has set, test the system for leaks. First, flush the manifold and PVC pipe of any debris, by removing the screwed plug on the manifold. Reinstall the screwed plug, re-apply the pressure and check all fittings for leaks. This is best done before trenches are backfilled.
Installing an automated system

7 CONTROLLER LOCATION

Automatic Controllers must be mounted in a weatherproof area. The controller should be installed at least 2 metres away from other electrical devices to reduce the chances of electrical interference.

8 CONNECTING THE SOLENOID VALVES TO THE CONTROLLER

Each valve is connected to the controller via two wires, known as common and active wires.

At the Solenoid Valve
Select either of the two leads coming out of the solenoid coil and connect the active wire to it. Repeat this for all valves. Connect the remaining lead from each solenoid coil to the common wire. Loop the common wire from one coil to the next.

Active Wire Connections

Common Wire Connections
Installing an automated system

9 CHECKING THE FLOW CONTROL

Where fitted, the flow control handle on the solenoid valve is used to adjust the pressure available to the emitter. To adjust operating pressure, firstly turn the flow control handle clock-wise as far as it will go. At the controller, turn the valve on using the manual valve on feature. Turn the flow control handle counter clock-wise until the emitter is operating correctly. Repeat this step for each valve fitted with flow control.

WATER AUTHORITY

In most States it is legal for the DIY installer to connect an irrigation system downstream of the backflow prevention device. However, check with Local Regulatory Authorities for regulations in your state before beginning any irrigation work.
Useful Hints and Tips

Handy hints

Never overtighten your tap timer when connecting to the tap.
As taps can sometimes vary slightly in size, water may leak from some connections. Use thread tape instead of overtightening.

Using a pressure reducer with your tap timer will ensure the water pressure is at a suitable level to correctly operate a drip system.

Always use a filter with your fixed watering system, to prevent particles from blocking drippers, sprays and pop ups. We recommend cleaning your filter regularly.

For tap timer controlled watering systems, consider using a dual outlet tap timer or a two way tap to give you more versatility.

Using a RainSensor with your fixed watering system helps save water by suspending programmed watering during periods of rain. Rain Sensors are suitable for use with automatic tap timers and controllers.

Water smart checklist:
1. Avoid watering in the middle of the day. This will reduce water loss due to evaporation.
2. Check the placement of pop ups, drippers and sprays. Ensure they apply water to your garden areas and not pathways!
3. Weed! Weeds compete with the plants in your garden for water. Be water wise and keep on top of your weeding.