



# WarmTrace™

## Hot Water Temperature Maintenance Systems

### Application:

A hot water heat tracing system provides an alternative to the design and installation of recirculation systems for prompt delivery of hot water at the fixtures.

Self-regulating cables eliminate some of the problems associated with conventional commercial hot water systems - providing the end user with instant hot water without the need for recirculation pipework, balancing valves and pumps.

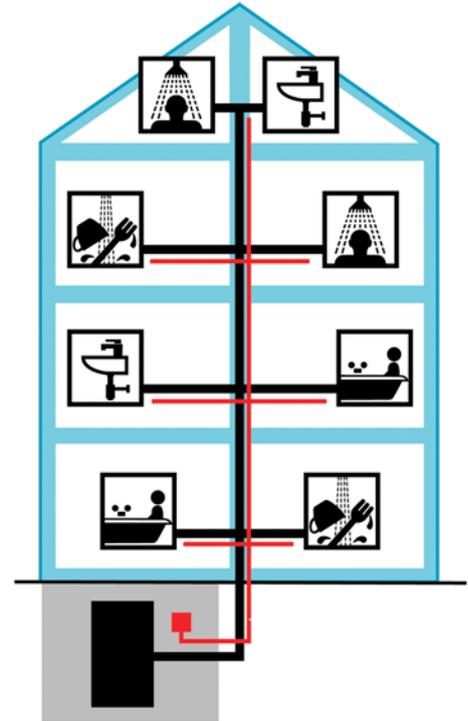
More importantly a Thermon [WarmTrace](#) system provides the end user with a hot water system that offers significant energy savings. No more over heating at the source and no more water wastage due to waiting for hot water at branch outlets.

### The System:

Electric heat tracing systems replace the heat lost through the thermal insulation on hot water supply piping to maintain the water at desired nominal temperatures (e.g. 50°C, 60°C), preventing stagnant water in dead leg lines from cooling. It also ensures that hot water is readily available when required at fixtures.

With a conventional recirculation piping system, the time spent waiting for hot water to reach a fixture can result in significant waste. It takes approximately 48 seconds for hot water to travel 3 meters from a 20mm recirculation line to a fixture, resulting in the loss of 1½ liters of water while the fixture runs. If the recirculation line is 8 meters from the fixture, 3½ liters of water are wasted before hot water reaches the user.

Self-regulating cables are simply taped to the supply piping and insulated. The cable can be cut to length and terminated on site without the need for special tools.



The self-regulating effect occurs along the entire length of the heat traced supply line to balance the heat output of the cable with the heat loss of the insulated pipe. This means heat is applied only where it is required, without the need for thermostat control.





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## For the Engineer:

- Reduces layout time compared to recirculation systems
- Easily adapted to buildings with different temperature zones
- Greater flexibility for buildings with complex designs
- Excellent for retrofit or building additions
- Helps meet stricter environmental requirements for more 'green' building designs



## For the Plumbing Contractor:

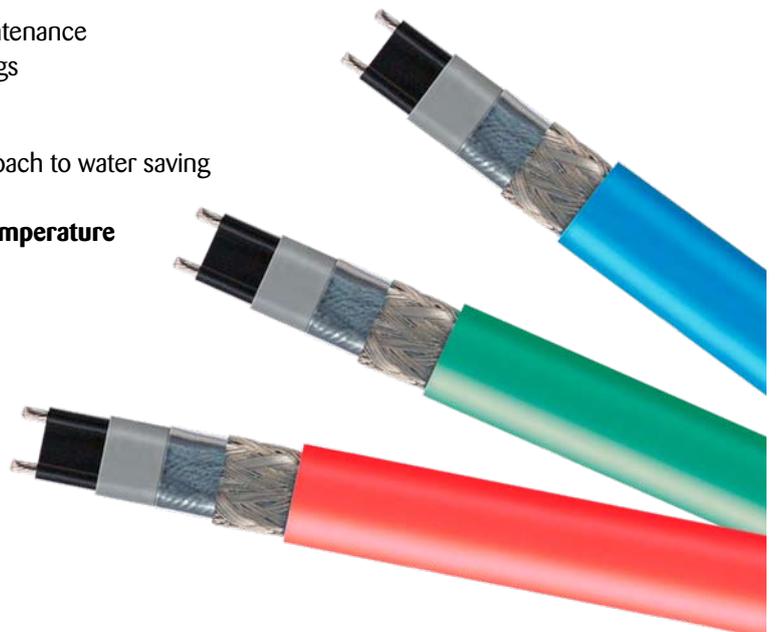
- Faster and less expensive to install when compared with a recirculation system
- Metallic and non-metallic pipes can be heat traced
- Simple to use pipe mounted connections which require no special tools
- Can complete a project in stages

## For the owner:

- Saves water by maintaining hot water at the fixtures
- Lower operating cost
- No moving parts means no maintenance
- Realises significant energy savings

For an advanced, cost effective approach to water saving and water heating consider a

**THERMON WarmTrace hot water temperature maintenance system.**



**THERMON . . . The Heat Tracing Specialists®**  
[www.thermon.com](http://www.thermon.com)