WWHRS Technical & Installation Guidance Update: 14/10/24

Updated Guidance: Double Check Valve/Non-Return Valve

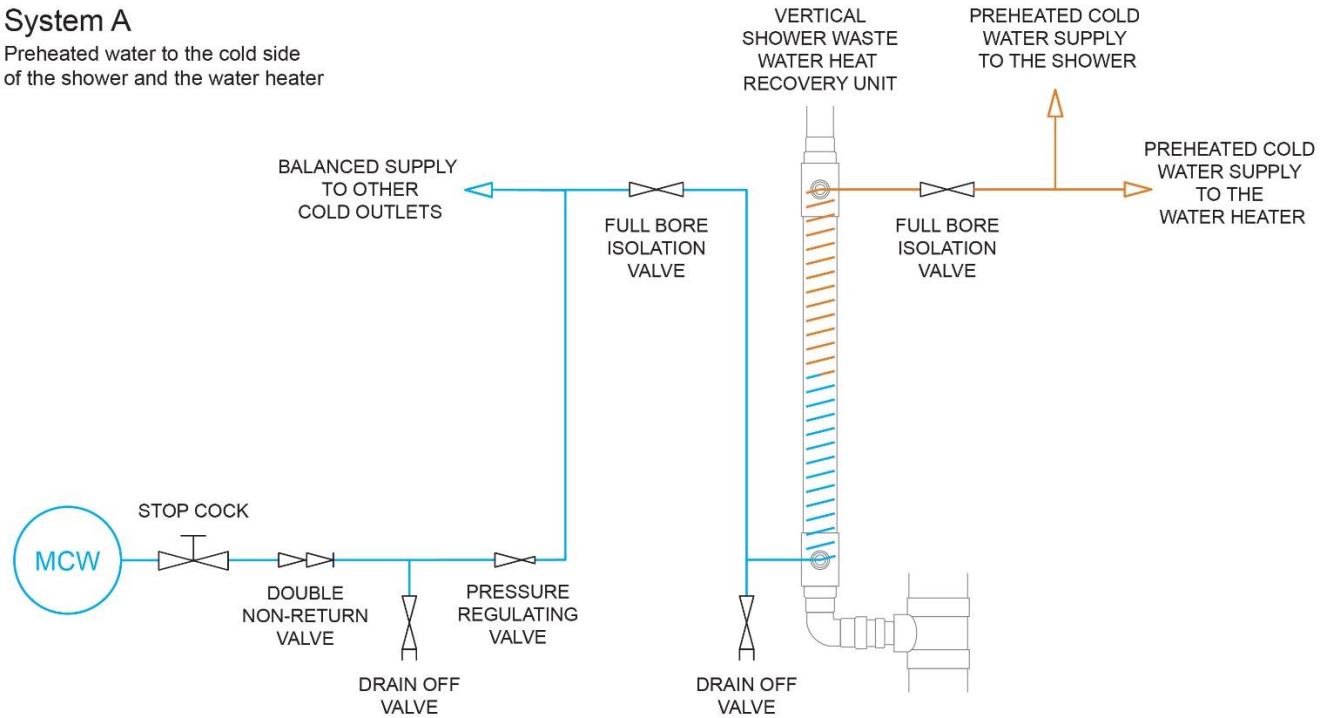
Recoup and Showersave are the UK's market leading suppliers for Waste Water Heat Recovery for Showers (WWHRS). Together, through discussion with Water Regs UK we have recognised that **there is no requirement for a non return valve to be installed on the potable water inlet to the WWHRS.** The preheated water created by the WWHRS will not be drawn back into the cold water pipework in normal circumstances. When the shower is stopped the water will no longer be heated, meaning no increase of pressure or expansion of warm water into cold supply pipework that could be drawn to cold outlets. The requirement for installers and homeowners to protect the water undertakers mains supply into the property against backflow still remains. Measures and devices should remain in place for other appliances within the property.

Benefits to installers/developers

- Access panels not required
- Mechanical backflow prevention device not required for WWHRS

Updated Guidance: Concealed Isolation Valves

- Full-bore isolation valves are required to be installed with WWHRS installations.
- Isolation valves should be installed to both the incoming CWM feed to the WWHRS and the out-flowing Preheated CWM feed from the WWHRS.
- If isolation valves are to be concealed (ie located within the plasterboard boxing), they MUST be manufactured of corrosion resistant materials (such as CR brass).
- Access to the valves is not required other than for initial pressure testing. Best practice dictates that concealed isolation valves should be placed at the same height, typically just above the Preheated CWM connection.
- The homeowner document should reflect this position.
- Access Panels are not required.



Overview and background

Waste Water Heat Recovery Systems (WWHRS) for showers have been installed in the UK for 10+ years and the guidance offered by manufacturers has followed guidance that was available from WRAS in relation to the UK water regulations.

The WWHRS works on a completely passive basis, with no mechanical or electrical components or joints that require access for servicing or maintenance, with waste water passing through the system on one side of a heat exchanger and potable water passing on the other, effectively, a combination of waste pipe and water pipework.

Planned Maintenance:

There is no planned maintenance for the WWHRS and they have a life expectancy in line with that of the plumbing pipework within the property.

Pressure Testing:

All WWHRS should be pressure tested to the manufacturers requirements during installation to ensure connections are leak free before being concealed.

Current guidance from UK Water Regulations

UK Water Regs, Guidance: here on the 23.07.2024.

Our collective interpretation of Paragraph 7 (3) is that with the use of isolation valves made of corrosion resistant materials (such as CR Brass), WWHRS installations can be concealed within SVP boxing, as we are also stating that the isolation valves are not operated for maintenance of the WWHRS unit and therefore not an 'operational fitting' after first fix and pressure testing of the complete system. Access to the valves is not required unless the WWHRS is to be removed, replaced or upgraded, at which point the isolation valves are accessible, so no access panels are required in the boxing.

This is supported by the 'Guidance Paragraph 7' (If behind plasterboard is not deemed accessible as it previously was) and would be similar to new build scenarios where valves for showers are behind plasterboard and tiles or under a bath that has been tiled in.

This guidance update is based on the following regulation from WRAS and UK Water Regs:

a. The Water Supply (Water Fittings) Regulations 1999 Paragraph 7 - here
b. The December 2023 document on the UK Water Regs website – here
c. The previous guidance from WRAS since WWHRS started to be installed in the UK (Specifying what finishes were and were not deemed as accessible)

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