LEGIONELLA RISK ASSESSMENT

Hot and Cold Domestic Water Systems

Site Name:	Example Site
Survey Date:	21st October 2025

Report Contents

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Risk Assessment Service Standard & Methodology

Our approach to delivering an industry-leading Risk Assessment focuses on producing a detailed report that forms the basis for tailored, site-specific water hygiene compliance. We achieve this by working closely with you, the customer, and by following established standards and legislation-

- ***BSI 8580-1:2019*** *– Water quality – Risk Assessments for Legionella control – Code of practice.*
- ***Health Technical Memorandum 04-01:*** *Safe water in healthcare premises*
- ***The Health and Safety Executive*** *– Legionnaires' Disease. The control of legionella bacteria in water systems. Approved Code of Practice* ***(ACoP L8)***
- ***The Health and Safety Executive*** *– Legionnaires' Disease. The control of legionella bacteria in hot, cold and other water systems* ***(HSG 274 Part 2)****.*
- ***Health and Safety at Work etc Act 1974*** *- (c.37) The Stationery Office 1974ISBN 978 0 10 543774 1*
- ***Control of substances hazardous to health (COSHH).*** *- The Control of Substances Hazardous to Health Regulations 2002 (as amended)*
- ***The Management of Health and Safety at Work Regulations 1999 -*** *SI 3242/1999 The Stationery Office*
- ***Reporting accidents and incidents at work:*** *- A brief guide to the Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 2013 (RIDDOR) Leaflet INDG453(rev1) HSE Books 2013 www.hse.gov.uk/pubns/indg453.htm*
- ***Consulting employees on health and safety:*** *- A brief guide to the law Leaflet INDG232(rev2) HSE Books 2013 www.hse.gov.uk/pubns/indg232.htm*
- ***Legionnaires' disease: A guide for duty holders*** *- Leaflet INDG458 HSE Books 2012 www.hse.gov.uk/pubns/indg458.htm*
- ***Managing for health and safety HSG65 (Third edition)*** *- HSE Books 2013 ISBN 978 0 7176 6456 6 www.hse.gov.uk/pubns/books/hsg65.htm*
- ***Water fittings and materials directory Water Regulations Advisory Scheme -*** *www.wras.co.uk/Directory*
- ***Water Supply (Water Fitting) Regulations 1999*** *- SI 1148/1999 The Stationery Office*
- ***BS 8558:2015*** *Guide to the design, installation, testing and maintenance of services supplying water for domestic use within buildings and their curtilages*
- ***BS EN 806 (Parts 1-5)*** *Specifications for installations inside buildings conveying water for human consumption British Standards Institution*
- ***Water systems: Health Technical Memorandum 04-01:*** *The control of Legionella, hygiene, 'safe' hot water, cold water and drinking water systems Department of Health 2006*
- ***Getting specialist help with health and safety Leaflet INDG420(rev1)*** *HSE Books 2011 www.hse.gov.uk/pubns/indg420.htm*
- ***Minimising the risk of Legionnaires' disease TM13*** *The Chartered Institution of Building Services Engineers 2013*

We also apply our own internal benchmarks for competence to maintain consistently high standards in our risk assessment services. This involves retaining industry-recognised certifications and aligning with the guidance of reputable regulatory and advisory bodies. Examples include:

- The Legionella Control Association
- CHAS Advanced
- Safecontractor
- Constructionline Gold

Key Assessment Details

Client and Site Information	
Client:	Example client
Client Address	Example address
Site Address	Example site
Site Contact	Example contact
Risk Assessment	
Suggested Review Date	21/10/2027
Risk Assessment Review Required	Risk assessment reviews should take place at least every two years or whenever there is reason to suspect that it is no longer valid due to. • Changes to the water system or its use • Changes to the use of the premises • New information about risks or control measures • Results indicating that control measures are no longer effective • A case of legionellosis associated with the system.
Risk Assessor	Paul Jamieson
Training	City & Guilds - Legionella risk assessment in water systems Water Regulations
Experience	20 years' experience in water hygiene/treatment from installation work to management of water systems

Site Responsibility Structure

Duty Holder **Contact Details** **Sufficiently Trained**	These records were requested from the client but were not supplied at the time of assessment. It is important to note that both HSE and LCA guidance require such records to be maintained and available for review within the Legionella Risk Assessment. The absence of this information should be addressed as a priority.
Responsible Person **Contact Details** **Sufficiently Trained**	These records were requested from the client but were not supplied at the time of assessment. It is important to note that both HSE and LCA guidance require such records to be maintained and available for review within the Legionella Risk Assessment. The absence of this information should be addressed as a priority.
Nominated Deputy **Contact Details** **Sufficiently Trained**	These records were requested from the client but were not supplied at the time of assessment. It is important to note that both HSE and LCA guidance require such records to be maintained and available for review within the Legionella Risk Assessment. The absence of this information should be addressed as a priority.
Water Treatment Company	Titan Water

Areas of Concern & Remedial Actions

Risk Rating Key-

High	A critical risk which, if not effectively controlled, poses an immediate and serious threat to the health of any individuals potentially exposed.
Moderate	A significant risk that, if not managed, could lead to harm or adverse health effects for individuals who may be exposed
Low	A low-level risk that is either fully controlled or poses negligible concern, requiring no additional mitigation beyond existing measures.

Management and Control Scheme Actions

Ref / Risk	Significant Findings	Remedial Action	Completion Date
M1	The site lacks a Legionella logbook and controls, leaving water systems unmanaged.	Implement the Legionella Logbook and log all controls in the site logbook.	
M2	There is no clear responsibility structure for Legionella control. A responsible person and deputy have not been formally nominated.	Nominate a responsible person and deputy, define their roles in writing, and ensure all relevant staff are adequately trained with certification recorded in the site logbook.	
M3	Personnel responsible for Legionella control are not sufficiently trained, increasing the risk of missed tasks and system contamination.	Ensure all staff involved in Legionella control are properly trained, with certification recorded in the site logbook.	

Mechanical and Remedial Actions

Ref / Risk	Significant Findings	Remedial Action	Completion Date
R1	Some hot water temperatures on site were too low (please see temperature table), creating conditions where bacteria can multiply.	Increase the temperature at the calorifier to 60 degrees and make sure outlets are achieving 50 degrees	
R2	Several areas/outlets are infrequently used, creating stagnant water that can support bacterial growth.	Flush all infrequently used outlets weekly for at least 2 minutes. Consider removing rarely used outlets and cutting back pipework to the live supply. Record actions.	
R3	CWST1 has a loose or missing lid, risking insect or vermin contamination.	Secure or install a close-fitting lid and log all remedial actions in the site logbook.	
R4	CWST1 has no safe access, preventing proper monitoring and maintenance.	Provide safe and suitable access for monitoring and maintenance and log all actions in the site logbook.	
R5	CAL1 has stored/flow temperatures out of specification, supporting bacterial growth.	Adjust stored and flow temperatures (stored ≈60°C, return ≥50°C) and log all remedial actions in the site logbook.	
R6	Bib Tap - Ground Floor - Outside hose pipe still connected may allow backflow contamination.	Disconnect and drain hose when not in use, and log all remedial actions in the site logbook.	
R7	No backflow protection on Mixer - First Floor - Bathroom, risking contamination of mains supply.	Install appropriate backflow prevention and log all remedial actions in site logbook.	
R8	No backflow protection on Bib Tap - Ground Floor - Outside, risking contamination of mains supply.	Install appropriate backflow prevention and log all remedial actions in site logbook.	
R9	No water services schematic drawings were supplied.	Provide full schematic drawings for the site	24.10.25 - Titan, see LRA
R10	The site has flexible hoses prone to microbial growth, especially EPDM.	Ensure all hoses are WRAS approved, replace with rigid alternatives where possible, remove hoses near vulnerable persons unless needed for moving assets, and log remedial actions.	

Asset Register

Hot and Cold Water Systems		No. Present
1.	Mains Water Supply to Site	1
2.	Other Water Supplies to Site	
3.	Cold Water Storage Tanks	1
4.	Domestic Hot Water Heater	
	▪ Calorifiers	1
	▪ Electric Water Heaters	
	▪ Point of use/Low Volume Storage Water Heaters	
	▪ Non-Storage Water Heaters	
	▪ Combination Water Heaters	
5.	Showers	
	▪ Mixer	1
	▪ Electric	
	▪ Cold Shower	
	▪ Spray Sink	
	▪ Emergency Showers	
Other Risk Systems		
6.	Humidifiers	
	▪ Steam Humidifiers	
	▪ Spray Humidifiers	
7.	Water Softeners	
8.	Fire Suppression Systems	
9.	Spa Pools	
10.	Whirlpool Baths	
11.	Vehicle Washes	
12.	Pressure Washer	
Outlets		
13.	Bath	1
14.	Bib Tap	1
15.	Little Used Outlet	1
16.	Sink	1
17.	Thermostatic Tap	
18.	Urinal	
19.	TMV	
20.	WC	2
21.	Wash Hand Basin	1
Other		
22.	Dead Leg	
23.	Dishwasher	1
24.	Expansion Vessel	
25.	Eye Wash Station	
26.	Pressurisation Unit	
27.	RPZ Valve	
28.	Washing Machine	1
29.	Water Boiler	
30.	Water Filter	
31.	Other Outlet Types	

Executive Summary

Risk Identifier	Comment
Property Description	The site is a small domestic house, containing a Ground and 1st floor, the system has a 1no calorifier and 1no CWST on site and is used by an elderly resident
Summary of Hot/Cold Water System	The following water services have been identified on site: Mains Cold Water Services (MCWS) Tanked Cold Water Services (TCWS) Hot Water Services (HWS)
Typical age group	50+
Occupancy vulnerability	High Risk
Number of occupants	1
Has a "responsible person" been appointed?	No
Has a "deputy responsible person" been appointed?	No
Do the relevant on site personnel have training records?	No records available at the time of the visit
From the records seen were personnel sufficiently Trained?	No records available at the time of the visit
Does the site have suitable and sufficient method statements for all work being carried out by their staff?	No records available at the time of the visit
Is there a suitable water services logbook in use, and is it kept up to date?	No records available at the time of the visit
Has a risk assessment been completed previously?	No records available at the time of the visit
Have all required actions from the previous risk assessment been completed?	No records available at the time of the visit
Are there copies of the water services drawings on site, and do they cover all the assets listed?	No records available at the time of the visit
Any online water treatment?	No
Up to date Calibration Certificates seen?	No

Details of Written Scheme

Risk Identifier	Comment/Action
Is there a Written scheme of control in place?	**No - Simple System** There was no written scheme in place. In-line with ACOP L8. Due to the simplicity of the water systems and current monitoring program in place a comprehensive written scheme is deemed unnecessary.
Does the written scheme of control correctly cover the purpose and scope for the site/systems?	N/A
Does the written scheme of control address the actual risks identified on any previous risk assessment for the site/systems?	N/A
Does the written scheme of control correctly document the management structure?	N/A
Does the written scheme of control correctly identify the operation and any controls in place to minimise risk?	N/A
Does the written scheme of control correctly identify the start-up and shut down procedures, plant rotation and flushing for little used outlets?	N/A
Does the written scheme of control correctly identify the start-up and shut down procedures, plant rotation and flushing for little used outlets?	N/A
Does the written scheme of control correctly detail the task method statements, for the various control tasks?	N/A
Does the written scheme of control contain • **Schedule of monitoring** • **Operational checks** • **Inspections and calibrations that are to be carried out** • **Frequency of tasks and the control limits to be employed.** • **Allocation of responsibilities clearly defined**	N/A

Risk Identifier	Comment/Action
Have the planning/completion of corrective actions in the written scheme of control for the various control tasks been implemented?	N/A
Does the written scheme of control have sufficient incident plans?	N/A
Are the lines of communication and the reporting structure are clearly stated in the written scheme of control?	N/A
Is there any legionella susceptible plant brought on to site by third parties?	N/A

Matters of concern beyond the scope of the report

Risk Identifier	Comment/Action
Were there any system areas or equipment identified that are not included within the agreed scope of this assessment?	No
Were there any access restrictions during the assessment?	Yes- Unable to access the cold-water storage tank in the roof space due to limited boarding

Existing Control Measures

A review was completed on the current and historic control and management procedures to the property where the reported planned maintenance activities were referenced against the services installed and the associated requirements placed upon these assets in relation to the current legislation.

Risk Identifier	Comment/Action
Date Range of Records Observed	These records were requested from the client but were not supplied at the time of assessment.
In line with ACOP L8 all water monitoring records must be kept for 5 years plus the current year and available for review.	These records were requested from the client but were not supplied at the time of assessment.
Flushing of Infrequently Used Outlet Records	These records were requested from the client but were not supplied at the time of assessment.
Temperature Monitoring Records	These records were requested from the client but were not supplied at the time of assessment.
Shower Head and Hose Disinfection Records	These records were requested from the client but were not supplied at the time of assessment.
Cold Water Storage Tank Inspection Records	These records were requested from the client but were not supplied at the time of assessment.
Cold Water Storage Tank Cleaning and Disinfection Records	These records were requested from the client but were not supplied at the time of assessment.
Calorifier & Water Heater Inspection Records	These records were requested from the client but were not supplied at the time of assessment.
Calorifier & Water Heater Disinfection Records	These records were requested from the client but were not supplied at the time of assessment.
Point of use Water Heater Inspection Records	N/A
Expansion Vessel Blow Down Records	N/A
TMV and Thermostatic Tap Servicing Records	N/A
Water Softener Maintenance Records	N/A
Filter (including UV and POU filters) Records	N/A
Inline Strainer Service Records	N/A
Are non-conforming results from monitoring escalated and resolved?	These records were requested from the client but were not supplied at the time of assessment.
Were the correct actions taken?	N/A
Were the actions taken within a timely fashion?	N/A
Were results rechecked after remedial actions?	N/A
Did the actions result in better control?	N/A
Was an escalation procedure invoked to ensure conditions were eventually controlled?	N/A
If not, is there an escalation procedure in place?	N/A
Were there lessons learned or a new procedure put in place to prevent recurrence?	N/A
Are there suitable records of the maintenance history on the systems from the records seen?	N/A
Are the current control measures used seen to be effective from the records seen?	N/A
From the records seen are the individuals involved in legionella control competent for their roles?	N/A
Have there been any significant deviations from operating procedures?	N/A

Required Monitoring Program

Monitoring Task	Frequency	Part of existing monitoring program?	Are records up to date in the site logbook?
Flush Little-used outlets- minimum of two minutes	Weekly	No	No
Sentinel Hot and Cold temperatures (Hot>50 degrees within 1 minute, cold maximum of 20 degrees after 2 minutes	Monthly	No	No
Representative Hot and Cold temperatures (Hot>50 degrees within 1 minute, cold maximum of 20 degrees after 2 minutes	Monthly to cover all outlets over 12 months	No	No
Calorifier /water heater flow (and return water temperatures	Monthly	No	No
Showerhead head and hose, clean, descale and disinfect spray nozzles	Quarterly	No	No
CWST – Temperatures(Max 20 degrees)	6 Monthly	No	No
Log book Audit	6 monthly	No	No
CWST- Inspection	12 Months	No	No
Calorifier- Blowdown	12 Months	No	No
Calorifier- Internal inspection	12 Months	No	No
Pipe work insulation inspection	12 Months	No	No

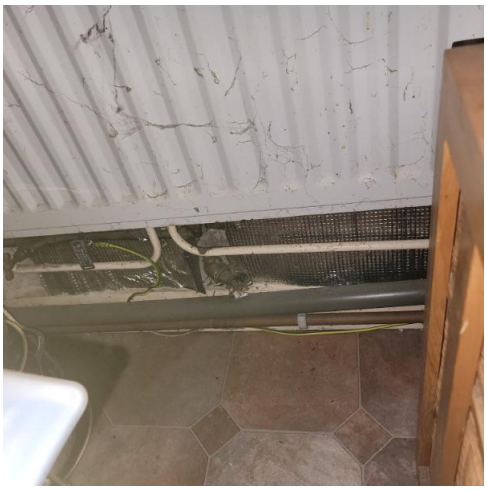
Water Systems & Outlets

Sentinel Outlets

Location	Details	Photo
Ground Floor - Kitchen	Nearest MCWS Cold; Furthest Hot; HOT SOURCE- Hot water Cylinder- indirect, COLD SOURCE- Mains	
First Floor - Bathroom	Nearest Hot; Nearest TCWS Cold; HOT SOURCE- Hot water Cylinder- indirect, COLD SOURCE- CWST	

Water Supply to Premises

MCWS	
Risk Identifier MCWS	**Comment**
Location	Ground Floor - Kitchen
Mains water supplied from	Affinity water
Mains water stopcock	Yes
Mains water meter	No
Mains water size	22mm
Incoming supply fitted with a DCV	No
Areas Supplied by Mains Water	Ground floor and CWST
Construction materials WRAS compliant	Yes
Access for pipe work Inspection	No
Pipe work runs direct	Yes
Pipe work insulated	No
Pipe work labelled	No



Cold Water Storage Tank

CWST 1 **Local Ambient Temperature ^{0}C**

Risk Identifier	Comment
Location	Second Floor - Attic
Can it be accessed safely?	**No**
What does it serve?	HWS (all building) and CWDS(1st floor)
Materials	Unknown
Dimensions (Length x Width x Height)	Unknown
Nominal Capacity (L)	Unknown
Actual Capacity (L)	Unknown
Is the amount of stored water excessive?	Un known
Is the vessel insulated?	Yes
Does it have a close fitting lid?	**No**
Is the lid vented?	**No**
Open vent to tank (size and materials)?	Yes
Supply pipe work and size?	Unknown
Does supply pipe work have isolation valve fitted?	Yes
Is the supply pipe work insulated?	Yes
Outlet pipe work and size?	15mm Copper
Is the outlet pipe work insulated?	Yes
Does outlet pipe work have isolation valve fitted?	Yes
Does it have an early warning pipe?	Unknown
Overflow fitted (size and materials)?	Unknown
Does the overflow have a screen fitted?	Unknown
Does it have good cross flow?	Unknown
Supply water temperature?	Unknown
Stored water temperature?	Unknown
Scale	Unknown
Corrosion / Scale	Unknown
Biofilm	Unknown
Sludge / Debris	Unknown
Water Appearance	Unknown
Additional comments	CWST in roof space has poor access, require safe boarding to complete inspection, consider converting to MCWS or move CWST to near the loft hatch

Tank Photos

External

Install better loft boarding to allow safe inspection

Storage Water Heater/Calorifier

Calorifier No: 1 **Brand: Unknown**

Risk Identifier	Comment
Location	First Floor - Airing Cupboard
Safe access for inspection	Yes
Access hatch present	**No**
Where is it fed from	CWST
What does it serve	HWS- all site
How is it heated	Indirect and immersion
Connected to another CAL	No
Capacity (L)	100
Materials of Calorifier	Copper
Adequate Insulation of Calorifier	Yes
Materials of Pipe work	Copper
Adequate Insulation on Pipe work	Yes
General Asset Condition	Good
Drain point fitted	**No**
Recirculating System	No
Standby Pump Present	No
Stored Water Temperatures	**48.8°C**
Flow Water Temperatures	**48.6°C**
Return Water Temperatures	N/A
Additional Comments	Yes, cylinder reaching >48 degrees at the time of the visit, no heating or immersion on, boiler contractor booked in to rectify the Boiler

Calorifier Photos

Located in airing cupboard

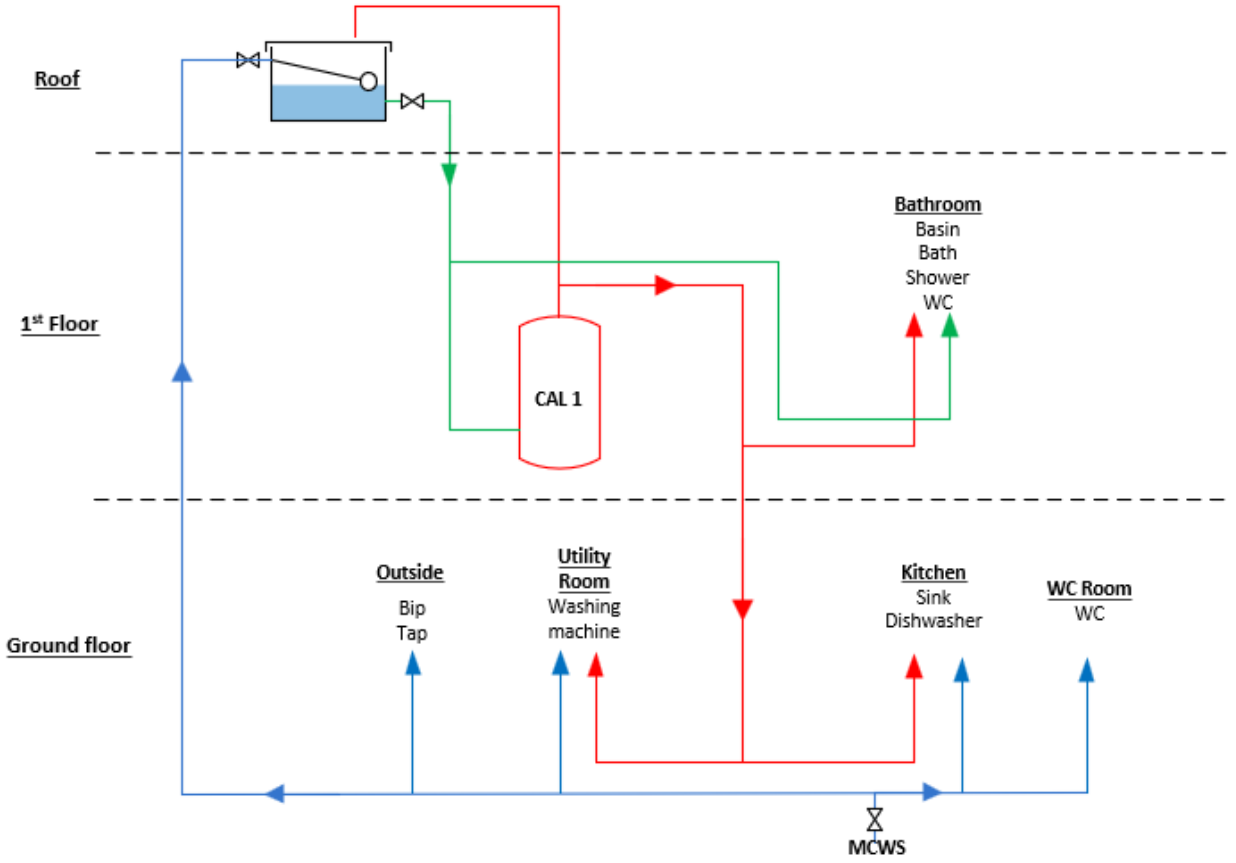
Dead legs

Location	Length (mm)	Supply Pipework Diameter (mm)	Dead-Leg Diameter (mm)	System	Can it be locally isolated	Photograph
None were identified within the scope of this risk assessment.						

Outlet Register

	Outlets Present											Cold		Hot		Pre TMV							
Location	Sink	WHB	Bath	WC	Urinal	Sluice	TMV	TMT	Electric Shower	Mixer Shower	Other	°C	Source	°C	Source	°C	Sentinel	Inf Used Outlet	Scaled outlet	Spray Tap	Flexible hoses	Dead legs	Expansion vessel
Ground Floor - Kitchen	1											13.9	Mains	49.9	Hot water Cylinder-indirect		Yes				2		
Ground Floor - Outside											1 Bib Tap	12	Mains		N/A		Yes						
Ground Floor - Utility Room											Washing machine-HWS and MCWS fed x 1		Mains		Hot water Cylinder-indirect		No						
Ground Floor - WC				1									Mains				No				1		
First Floor - Bathroom		1	1							1		15	CWST	49	Hot water Cylinder-indirect		Yes						

Schematic Drawings



Additional Photos

Photo	Location	Comment
	Second Floor - Attic	Poor access to the CWST, loft boarding required
	Ground Floor - Kitchen	Oil boiler located in the outside building
	Ground Floor - Outside	No backflow prevention present
	Ground Floor - Outside	The length of hose is approximately 8m

Photo	Location	Comment
	First Floor - Bathroom	Showerhead clean