



## Water Treatment and Anti-Scalding Safety Policy

<b>Reference</b>		<b>Version</b>	<b>2</b>
<b>Policy Reviewer</b>	<b>Compliance Officer</b>	<b>Effective date</b>	<b>Aug 2017</b>
<b>Policy Owner</b>	<b>Head of Property</b>	<b>Review date</b>	<b>Aug 2019</b>

## **1. Purpose**

- 1.1 The purpose of this policy is to set out specific guidance to ensure the control and management of legionella bacteria in water systems and the prevention of scalding within dwellings which are owned and managed by the organisation. Water systems in our dwellings are installed, maintained and serviced to required standards and inspected at appropriate frequencies to minimise the risk of infectious diseases and scalding due to high water temperatures.
- 1.2 For the purpose above, a water system includes all plant/equipment and components associated with that system, eg all pipework, pumps, feed tanks, valves, showers, heat exchangers, quench tanks, water softeners, chillers etc.
- 1.3 A specific water testing regime has been implemented and is undertaken by specialist contractors procured to ensure suitably qualified, competent and accredited individuals undertake the works. The competent contractor employed, manages all aspects of the delivery of water treatment testing and anti-scalding, associated testing, repairs, upgrades and the provision of new installations.
- 1.4 Client management and monitoring systems are in place to ensure necessary provisions are carried out in a timely and compliant manner.

## **2. What is Legionellosis/legionnaires disease?**

- 2.1 Legionellosis is the collective name given to the pneumonia-like illness caused by legionella bacteria. This includes the most serious Legionnaires' disease, as well as the similar but less serious conditions of Pontiac fever and Lochgoilhead fever. Legionnaires' disease is a potentially fatal form of pneumonia and everyone is susceptible to infection. However, some people are at higher risk, including:
- people over 45 years of age
  - smokers and heavy drinkers
  - people suffering from chronic respiratory or kidney disease
  - anyone with an impaired immune system

## **3. Aims & Objectives**

- 3.1 This policy aims to ensure that we effectively meet our legal obligations and seeks to provide assurance that water treatment and anti-scalding is adequately managed and that ultimately the safety of our tenants, leaseholders and our staff is maintained.
- 3.2 The main objectives of this policy are listed as follows;
- set out a clear approach for the maintenance and servicing of hot and cold water installations
  - ensure a prompt, efficient and cost effective repair, servicing and inspection service
  - comply with statutory requirements
  - promote good practice
  - prioritise remedial works and carry them out in appropriate timescales so that homes and water systems remain safe
  - outline an approach for the safe use of stored water including provision for inspection and monitoring
  - ensure adequate records are kept

- outline requirements to ensure the risks associated from stored water are managed and the likelihood of scaling is reduced
- provide a commitment for training and development of staff involved in monitoring and managing these works
- provide a clear statement to take all practical measures to control the risk of water contamination and scalding

#### **4. Legislation**

4.1 We are committed to ensuring that our tenants and leaseholders homes' remain safe and fit for purpose. In achieving this we will comply with all relevant legislation and regulations. The following list sets out the key legislation and requirements;

- Landlord and Tenant Act 1985
- Housing Act 1988
- Management of Health & Safety at Work Regulations 1999 (the Management Regulations)
- Workplace (Health, Safety & Welfare) Regulations 1992 (as amended)
- The Construction (Design and Management) Regulations 2015
- The Health and Safety at Work Act 1974
- Approved code of practice L8 Legionnaires' disease: the control of Legionella bacteria in water systems inc (HSG274)
- Control of Substances Hazardous to Health Regulations 2002 (COSHH)
- The Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 2013 (RIDDOR)
- Water Supply (Water Fittings) Regulations 1999
- The Provision and Use of Equipment Regulations 1998
- Building Regulations 2000 (amended)
- British Standard (BS8580)

#### **5. Scope**

5.1 This document is not intended to provide detailed technical guidance on dealing with all water treatment or anti scalding issues. Detailed guidance is available and should be referred to in respect of managing the risks associated and can be found at the Health and safety Executives website at: [www.hse.gov.uk](http://www.hse.gov.uk)

5.2 Guidance states that a suitable and sufficient risk assessments must be carried out to all appropriate properties to identify and assess the risk of exposure to legionella bacteria. We will comply fully with this requirement and will regularly review and update risk assessments and undertake any precautionary measures needed. We will record and prioritise any remedial works and issue instructions as required to our appointed specialist contractors. Risk assessments will include control measures needed to prevent scalding through excessive hot water temperatures.

5.3 If a risk is identified, a written scheme will be prepared for preventing or controlling it. In particular, the written scheme will contain the information about the water system and actions needed to control the risk and prevent exposure. The responsible person (named below) will review risk assessments regularly.

5.4 Lead staff will receive relevant training in order that they obtain and maintain the level of competence needed to manage legionellosis and anti-scalding in buildings.

5.5 We will maintain specific call-out arrangements and emergency procedures which will be regularly communicated.

5.6 Written schemes of work will be developed to provide clear instruction on how to use and carry out the various control measures and water treatment regimes, these will include:

- physical treatment programme; e.g. using temperature control for hot and cold water systems
- chemical treatment programme where required, including a description of the manufacturer's data on effectiveness, the concentrations and contact time required;
- health and safety information for storage, handling, use and disposal of chemicals used
- system control parameters, together with allowable tolerances physical, chemical and biological parameters, together with measurement methods and sampling locations, test frequencies and procedures for maintaining consistency
- remedial measures to take in case the control limits are exceeded, including lines of communication
- cleaning and disinfection procedures
- emergency procedures
- commissioning and recommissioning procedures
- shutdown procedures
- checks of warning systems and diagnostic systems in case of system malfunctions
- maintenance requirements and frequencies
- operating cycles, including when the system plant is in use or idle

5.7 Typical checks and timescales are as follows timescales may vary depending on risk assessment findings;

- inspection of water storage tanks – annually
- visual inspection of hot water calorifiers – annually
- check calorifier flow temperature and settings – monthly
- temperatures of hot and cold water outlets at Sentinel taps – monthly
- Legionella water samples taken as required – annually
- cleaning and disinfection of shower heads - quarterly
- flushing of infrequently used outlets – weekly
- thermostatic mixing valve (where risk assessment requires they be fitted) cleaning, decaling and disinfecting – annually
- expansion vessels flush and purge – monthly/six monthly
- checking other outlets on a rotational basis over a 12 month period recording temperatures in a log book

## **6. Discovery of Legionella Bacteria**

6.1 In the event of the discovery of legionella bacteria within a water system emergency action will be taken to eliminate or contain any risk. Specialist advice and guidance will be sought as required from specialist consultants/contractors by the duty holder or responsible person who will take the lead in managing the situation.

## **7. Roles and Responsibilities**

### **7.1 Chief Executive**

The Chief Executive and ultimately the Board have overall responsibility for this policy and ensuring compliance, but duties will be delegated to the duty holder and the responsible person and other support staff. The following actions relate to designated staff and contractors acting on behalf of Red Kite;

- ensuring adequate resources are allocated to managing the risks associated to this policy
- ensuring adequate processes and procedures are in place to manage the risks arising.
- ensuring sufficient information, instruction and training is carried out
- monitoring the performance of staff and contractors
- ensuring that members of the public, staff and contractors are not unnecessarily exposed to risk
- ensuring appropriate risk assessments are undertaken and that regular review is carried out
- ensuring appropriate inspections and monitoring are undertaken and that statutory requirements are carried out

### **7.2 Deputy Chief Executive**

The Deputy Chief Executive will assist and deputise for the Chief Executive and are responsible for the overall effectiveness of this policy. In doing so they are required to;

- ensure adequate resources are allocated to manage risk arising
- monitor the performance of their subordinates against the policy
- advise the Chief Executive of any problem arising in connection with the management of risk
- ensuring adequate finance is secured for the delivery of this service

### **7.3 The Head of Property**

Shall be the identified duty holder for the associated procedures this includes responsibility for monitoring, review, and policy development and ensuring that the person who carries out the risk assessment and provides advice must be competent to do so. The duty holder will take all reasonable steps to ensure the competence of those carrying out work who are not under their direct control and that responsibilities and lines of communication are properly established and clearly laid down.

They will also ensure that all employees or other person involved in work that may be exposed to legionella are given suitable and sufficient information, instruction and training. This includes information, instruction and training on the significant findings of the risk assessment and the appropriate precautions and actions they need to take to safeguard themselves and others.

Further duties include;

- implementation and the continuing review of this policy
- ensuring that all appropriate staff are kept fully informed of developments in legislation and good practices relating to the
- management of legionella
- ensuring only competent staff are employed in delivering the procedure

- ensuring a 'Duty of Care' to tenants, leaseholders, employees and contractors is robust
- appointing a competent 'responsible person'

#### 7.4 The Assistant Compliance Manager

The Assistant Compliance Manager is identified as the 'responsible person' and will lead on the operational delivery this policy, staff awareness, training, and communication to customers. The Compliance Manager will take the lead on contract management for the main service areas involving water treatment testing, servicing, installation and anti-scalding provisions and all appropriate, associated activities. They will regularly review risk assessments to ensure that they are suitable and sufficient.

The Assistant Compliance Manager will ensure that organisations such as water treatment companies or consultants, and staff employed are competent and suitably trained and have the necessary equipment to carry out their duties as detailed in the 'written scheme' safely.

Other duties involve;

- ensuring all involved in the management of the works are suitably trained and competent and have relevant in date qualifications/accreditation
- that all employees are adequately informed and instructed regarding
- the identification, management and risk from exposure to legionella and scalding
- ensuring tenants/residents are adequately informed and instructed regarding the identification, management and risk from exposure to legionella bacteria.
- maintaining a Training Matrix, recording and planning the training
- needs required by the team or an individual involved in the works which reflect the tasks undertaken and describe the training required
- appoint a designated deputy as appropriate to provide cover in their absence
- ensure adequate processes and procedures are in place to manage the risks arising from water treatment and anti-scalding works
- ensure sufficient information, instruction and training is carried out
- ensure appropriate risk assessments are undertaken and that regular review is carried out
- ensuring appropriate inspections are made to assess the condition of water storage systems, installations and equipment
- responsibility for implementing any written schemes of work

#### 7.5 The Technical Officer - Statutory Compliance

The 'Responsible Person' with the support of the Technical Officer Statutory Compliance is responsible for the day to day running and implementation of this policy and they will;

- provide advice on the application of this policy on an individual case by case basis and take day-to-day responsibility for its implementation
- ensure that required information is fed back to the appropriate managers
- ensure that relevant records and information is maintained and up to date
- provide related information to staff, contractors, tenants, leaseholders and members of the public as required

- ensure adequate training is maintained organisationally and in accordance with current regulations
- ensure a designated deputy is appointed to provide cover in their absence
- ensure information is readily made available to contractors and consultants they are responsible for
- monitoring the performance of staff and contractors
- maintaining property records and relevant certification
- maintain an up-to-date knowledge of legislative requirements and best practice

## 7.6 Employees

All employees, irrespective of their position shall;

- take reasonable care for their own health and safety and that of other persons who may be adversely subjected to infectious diseases or scalding including members of the public, tenants, visitors and contractors
- co-operate as appropriate with other staff and agencies to ensure compliance with this policy and all other legal requirements
- halt works that, in their opinion, may present a serious risk to health and safety
- report any concerns that they may have in relation to the management of works covered by this policy.

## 8. Training

8.1 Training regarding legionella and anti-scalding will be completed following a training needs analysis produced by the responsible person, the Compliance Manager. Training will be cascaded through the organisation as appropriate.

8.2 Training is an essential element of an employee's capability to carry out work safely, but it is not the only factor: instructions, experience, knowledge and other personal qualities are also relevant to perform a task safely.

## 9. Detailed records

9.1 Appropriate records will be kept and include details about;

- the appointed responsible person(s) for conducting the risk assessment, managing, and implementing the written scheme
- any significant findings of the risk assessment
- the written scheme and its implementation
- details about the state of operation of the water system, i.e. in use/not in use
- the results of any monitoring inspection, test or check carried out
- the dates undertaken

9.2 These records should be retained throughout the period they are current and for at least two years afterward. We will retain records of any monitoring inspection, test or check carried out, and the dates, for at least five years.

The following items should normally be recorded;

- names and positions of people responsible, and their deputies for carrying out the various tasks under the written scheme
- a risk assessment and a written scheme of actions and control measures
- schematic diagrams of the water systems

- details of precautionary measures that have been applied/implemented
- Including enough detail to show that they were applied/implemented correctly and the dates on which they were carried out
- remedial work required and carried out, and the date of completion
- a log detailing visits by contractors, consultants and other personnel
- cleaning and disinfection procedures and associated reports and certificates
- results of the chemical analysis of the water
- results of any biological monitoring
- information on other hazards, e.g. treatment chemicals
- training records of personnel
- the name and position of the person or people who have responsibilities for implementing the written scheme, their respective responsibilities and their lines of communication
- records showing the current state of operation of the water system, eg when the system or plant is in use and if not in use, whether it is drained down either the signature of the person carrying out the work,
- or other form of authentication where appropriate

All risk assessments are a living document that must be reviewed to ensure they remain up-to-date specifically whenever there is reason to suspect they are no longer valid. An indication of when to review the assessment and what to consider should be recorded. This may result from,

- changes to the water system or its use
- changes to the use of the building in which the water system is installed
- the availability of new information about risks or control measures
- the results of checks indicating that control measures are no longer effective
- changes to key personnel
- a case of legionnaires' disease/legionellosis associated with the system

## **10. Tenants responsibility**

- 10.1 Under the terms of their Tenancy Agreement, tenants must allow access to their property for maintenance and/or inspection to be carried out. In order to undertake works it may be necessary disrupt hot and cold water supplies.
- 10.2 Prior to planned works being undertaken and where consistency of service is to be disrupted, written confirmation will be provided in accordance with our general Consultation Strategy. It is the tenant's responsibility to ensure that;
- any contingency arrangements arising from the absence of supplies must be highlighted and agreed in advance of works
  - appropriate access and relocation/removal of any obstacles will need to be undertaken and in situations where the tenant is unable to manage support will be agreed
  - temporary provision of cold and hot water is identified
  - clearance of work areas including loft space
  - notify any repair/ fault in a timely manner
- 10.3 Any defective or unauthorised works needing rectification may incur a recharge. If any installation has been undertaken without our permission, and is found to be defective the supply may be terminated or a recharge incurred for any rectification work.

10.4 Where tenants carry out property alterations and improvements, which include additions or improvements authorisation must be sought prior to any works being undertaken. If works are approved, tenants are responsible for ensuring appropriate safety checks are carried out and all relevant certificates are supplied following the works/installation as set out in the Tenancy Agreement.

## **11. Risk**

11.1 Prior to commencement of any work activities, the appointed competent person or contractor shall undertake a suitable and sufficient risk assessment covering the full scope of works. This assessment will include the impact of works on all tenants/leaseholders affected, especially those with vulnerability.

11.2 What are the risks?

Any water system that has the right environmental conditions could potentially be a source for legionella bacteria growth. There is a reasonably foreseeable legionella risk in water systems if:

- water is stored or re-circulated as part of a system
- the water temperature in all or some part of the system is between 20°C - 45°C
- there are sources of nutrients such as rust, sludge, scale and organic matters
- the conditions are likely to encourage bacteria to multiply
- it is possible for water droplets to be produced and, if so, if they can be dispersed over a wide area, eg. showers and aerosols

11.3 Preventing and controlling the risk

The risk of legionella in the first place will be assessed by considering the type of water system. The key point is to design, maintain and operate water services under conditions that prevent or adequately control the growth of legionella bacteria.

In order to achieve this we will;

- ensure that the release of water spray is properly controlled
- avoid water temperatures and conditions that favor the growth of legionella and other micro-organisms
- ensure water cannot stagnate anywhere in the system by keeping pipe lengths as short as possible or by removing redundant pipework
- avoid materials that encourage the growth of legionella by compliance with The Water Fittings and Materials Directory which references fittings, materials, and appliances approved for use on the UK Water Supply System by the Water Regulations Advisory Scheme
- keep the system and the water in it clean and treat water to either kill legionella (and other microorganisms) or limit their ability to grow
- introduce appropriate controls and a course of action that will help to control any risks from legionella by identifying:
  - the system, e.g. developing a written schematic
  - who is responsible for carrying out the assessment and managing its implementation
  - the safe and correct operation of the system
  - control methods and other appropriate precautions

- what checks will be carried out to ensure risks are being managed and how often

## **12. Contractor's responsibility**

- 12.1 Contractors will comply with our Contractor Code of Conduct. When undertaking any maintenance or installation works, the contractor will also be required to conform in full with the requirements of this policy.
- 12.2 Every effort will be made to arrange a convenient time and date with the tenant for access to complete the works. Appointments will be made and in certain situations written notice will be required. In cases where access is denied on a number of pre-arranged occasions and following several written notifications, we will consider using legal action to gain access.
- 12.3 Contractors who provide water treatment or maintenance services will make clear to the responsible person any deficiencies in the water system or measures that may pose a significant risk of exposure to legionella bacteria. They should also make the duty holder or the responsible person aware of any limitations in their own expertise, products or services so they can make arrangements to ensure that these deficiencies or limitations are addressed.
- 12.4 Contractors and consultants will also ensure that their staff are competent to carry out tasks safely. They should be properly trained to a standard appropriate to the various tasks they perform, such as risk assessment, advising on water treatment measures, sampling or cleaning and maintaining water systems. The Legionella Control Association administers a Code of Conduct for organisations providing services to occupiers/owners of water systems. This Code of Conduct does not have legal status but will give guidance to duty holders about the standards of service expected. Suppliers are required to abide by the Code.
- 12.5 All staff and contractors will be suitably trained, managed and supervised and given appropriate resources or support. In particular, they should be aware of the action to take in situations outside their knowledge or experience.

## **13. Auditing and review**

- 13.1 Quality of work is assessed in four ways:
- assessment of a percentage of works by a suitably experienced and qualified officer
  - assessment by a nominated consultant as and when required
  - self-assessment and quality assurance by the contractor
  - tenant feedback and satisfaction survey
- 13.2 The condition and performance of all systems will need to be monitored. The appointed responsible person will oversee and manage this or where appropriate, an external contractor or an independent third party will be appointed.

Management will involve;

- checking the performance and operation of the system and its component parts

- inspecting the accessible parts of the system for damage and signs of contamination
- monitoring to ensure that the treatment regime continues to control to the required standard

13.3 Internal auditing arrangements are required to be implemented by the contractor which include the contractor's qualified supervisor officer reviewing all certification arising from maintenance inspections and checking relevant information and results prior to submission. A sample of submitted records will be checked for accuracy by our appropriately qualified and experienced staff.

#### **14. Equality and Diversity**

14.1 All involved will recognise their ethical and legal duty to advance equality of opportunity and prevent discrimination on the grounds of; age, sex, sexual orientation, disability, race, religion or belief, gender reassignment, pregnancy and maternity, marriage and civil partnership.

#### **15. Publicising this Policy**

15.1 Communications and documentation will be translated or interpreted as required and provided in accessible formats such as large print or Braille according to customers' needs. Further information can be found in our translation information document.

15.2 We will make arrangements and inform tenants and leaseholders, where appropriate in writing of any works that may affect them.

15.3 Policy and procedures relating to water treatment and anti-scaling will be publicised widely and specific details included in the following documents

- Tenant Handbook
- Tenant and Leaseholder Newsletter
- Our Website
- Policy Briefings
- Training briefings

15.4 We will take every opportunity to promote the importance of water safety and anti-scalding to all our tenants, leaseholders and stakeholders.