

About 'Dead-Legs' and Legionella

If urinals are being converted to waterless operation, then you should assess the legionella risk from the standing water in the cistern and flushpipes. The simple solution is to drain the pipes and cistern at time of conversion and then cap the supply to the section of water pipes no longer required (known as 'dead-legs'). As an indication of cost, Gentworks engineers usually charge £60 per washroom for this work.

The Control of Substances Hazardous to Health 2002 say that you must carry out an assessment which will enable you to identify and assess potential sources of exposure. The vulnerability of the user group and the water systems present should be considered when carrying out your assessment. You must then introduce a course of action to prevent or control any risk you have identified and have a plan or procedure to deal with any incidents and emergencies

Legionella are bacteria that are common in natural (rivers, lakes) and artificial water systems (storage tanks, pipework, showers). It can also be found in air conditioning systems and whirl pool spas. Legionnaires' disease is a potentially fatal form of pneumonia caused by the legionella bacteria. Breathing in water droplets contaminated by the legionella bacteria causes infection. It can affect anybody but mainly susceptible people such as the elderly, the young, the immunocompromised and those who are already ill. Legionella can survive in low temperatures, but thrive at temperatures between 20°C and 45°C. High temperatures of 60°C and over will kill them.

The standard procedure to deal with dead-legs is:

1. Trace along the water supply pipes from the urinal cisterns to the nearest "tee" joint and then isolate the water supply by closing the nearest service valve or "stop-tap" below the "tee" joint. This may temporarily stop the water supply to other facilities.
2. With water supply isolated, sever the water supply pipe spur to the urinal cisterns as close as possible to the "tee" joint and install an additional isolation valve and end stopper.
3. The service valve below the "tee" joint can then be reopened to restore water supply to other facilities.