

# WARNING

## Health Risk in Irish Spas

The last thing hoteliers need right now is an outbreak of Legionnaires' Disease or MRSA in their spa or leisure centre, but experts warn that there has been a significant lapse in standards of health and safety in some Irish spas and, as a result, such a disaster could happen at any time.

SARAH GRENNAN reports.

Dr Ronnie Russell, marine biologist, Trinity College professor and Government advisor, candidly reveals that he has stopped visiting a lot of Irish leisure centres and spas. Through the course of his work he has widely consulted with health and leisure spas throughout the US, Europe, Morocco and South Africa and explains: 'The expertise and professionalism in these places impressed me so much.' Unfortunately, however, he feels he cannot say the same for spas and leisure centres in his native Ireland.

'I would feel far happier in a public swimming bath than I would in a private one,' he tells *Hotel & Catering Review*. 'The trouble is that businesses invested in these elaborate spas and leisure centres, but these are just bricks and mortar, and no one seems to be responsible for overseeing the health and safety of the facility once it is up and running. What we really need is someone from Fáilte Ireland, or EHOs, to carry out spot checks in spas. These should not be done in a penal way but they should be conducted to help spas and to show them what they need to do to ensure the health and safety of their clients.'

According to Dr Russell, health hazards borne through inadequate plumbing and engineering facilities are endemic in Irish leisure centres as well as other major industrial units which use high demand hot water systems. In particular, Legionella is a massive concern, and is prevalent in hospitals, dental practices and, most worryingly for the hospitality industry, in spas and leisure centres. 'I spend my life troubleshooting on Legionella and most of these cases don't make it into the paper. You can deal with it and

stop it within 48 hours if you know what to do. It is easy to do if you understand biology.'

The trouble is that many engineers and plumbers in Ireland don't understand biology as they are not taught it in college or training, says Dr Russell. As a result, many spa and leisure facilities built in recent years can be breeding grounds for germs, infections and diseases, from the simple verruca to the deadly Legionnaires' Disease and, more recently, MRSA.

'While MRSA in hospitals is on the decline, changing rooms in gyms and leisure centres are being identified as common places to pick up MRSA and scientific and medical journals are now studying what is termed "community acquired MRSA". The US, UK and Ireland have all had recent examples. It is not regularly monitored in these places but in some where studies have been done it is almost as prevalent as hospitals,' warns Dr Russell.

The main problems arise through water systems, and Dr Russell reminds hotels, spas and leisure centres that they are legally responsible for maintaining the standard of potable water once it has been delivered to their premises from the mains. Problems can occur with source water (through the municipal treatment plant or distribution system) such as sediment, colouration or taints which can contaminate the heated distribution systems used for spas and Dr Russell underlines the importance of monitoring the quality of water in facilities regularly, and to make sure the tests are appropriate to their system. While there may be questions about the quality of water sourced, often good quality water delivered to a spa or leisure centre may become

### LESSONS FROM ABROAD

The multi-million dollar Melbourne Aquarium opened at the beginning of 2000, quickly becoming one of the city's most popular tourism destinations.

However, just a few months later, in April, there was a devastating outbreak of Legionnaire's Disease in the complex, resulting in the death of three people, while a further seven were hospitalised in critical condition and a total of 93 people were confirmed as having contracted the disease.

News of the outbreak and resulting casualties was carried in every major newspaper and on television networks around the world. Despite replacement of the water-based air-conditioning system with a non-water-based one, and a health official declaring the facility to be 'the safest place in Melbourne to visit', attendance dropped by close to 50% in the aftermath of the outbreak. The aquarium also faced a class-action lawsuit seeking compensation for those who became infected.



contaminated once stored in a tank system or run through biofuelled or corroding pipes, improperly maintained water softeners, reverse osmosis (RO) systems or filters or 'dead legs' (unused pipes still connected to the distribution system).

This will not come as good news to operators who spent many millions of euro on glittering spa facilities in the boom years and are now juggling the massive costs of operating them with a rapidly diminishing consumer spend. It is yet another concern to add to the mounting woes facing businesses in light of the recession.

But this, according to spa consultant Aoibheann Gallen, is where the danger lies. With many hotels and spa operators scrutinising costs in the recession, the temptation is to cut corners. This is a false economy, particularly if it leads to a very public outbreak of Legionella or MRSA which can cause significant health problems – and even the death of clients and staff – and can irreparably damage a hotel's business.

Aoibheann became increasingly alarmed about health and safety standards in Irish spas when undertaking recent audits through her Irelandspas consultancy. Swimming pools, jacuzzis, saunas and other thermal areas such as laconiums and calderiums offer a hotbed where germs can multiply. If thorough cleaning and regular maintenance is not carried out, spas and leisure centres are risking the health of their clients, as well as their staff.

'Some thermal areas are operating without proper maintenance of the plant and the physical product. We found aroma steam rooms operating at the wrong temperature, with no aroma smell and instead this was replaced with a bad odour, which can be the result of bacteria harbouring in the pipes,' explains Aoibheann Gallen. Other health and safety concerns included pools of water left unattended in thermal areas, posing a risk to clients who may slip and injure themselves.

So concerned was Aoibheann about what she found during the course of her inspections, that she approached marine biologist Dr Ronnie Russell for help and the pair are now offering hotels and spas expert advice on maintaining standards

through Aoibheann's Irelandspas Spa Audit programme. Through the audit, which reviews the entire spa operation from service and treatments to training and standards, Irelandspas will test the spa's water and every aspect of their heat and water treatments to ensure they are danger-free.

Whoever they approach it is clear that many spas need to look for further advice on this critical area and Dr Ronnie Russell worries that hoteliers and spa owners underestimate the scale of the threat. 'If I was making sandwiches and I had conditions like some of these spa and leisure centres have, I would be shut down in five minutes. I can think of two very upmarket leisure centres I was in recently where I could actually scrape the biofilm off the side of the pool. It seems like no one has been put in charge of health and safety in any of these facilities which is very worrying. You need to constantly monitor and maintain your plant to avoid any outbreaks.'

Dr Russell also worries that hoteliers, who perhaps may not fully understand how spa work, may be preyed upon by disreputable sales people. 'The big problem is that they are at the mercy of sales teams, particularly from the UK, who come in selling products which quite often are more of a hindrance than a help. Sometimes they [the spas or leisure centres] don't require anything and these new products actually end up causing problems.' He underlines that operators should always look for independent, expert advice before agreeing to purchase any costly new products or services.

Ignorance, however, is not an excuse in not dealing with the issue – particularly in the wellness industry where customers are very knowledgeable. 'Customers will identify problems very quickly, particularly people coming from continental Europe who are very clued into spas. In many cases these people know more about what is required than the people actually running the spas and they will ramble around and check behind the scenes to make sure everything is okay,' says Dr Russell.

If this happens, are you confident that they will find nothing amiss in your spa? If not, perhaps it's time to look for some advice before it's too late. ♦

## WHAT IS LEGIONELLA?

*Dr Ronnie Russell explains:*

Legionella consists of a group of bacteria commonly occurring in moist soil and in fresh water. They can live at a wide range of temperatures (4°C-50°C) but they specifically multiply at very high rates between 20°C and the mid 40s°C, particularly if they have certain nutrients including traces of iron and other biofilm to dine on.

They usually occur in small numbers in the environment and present no hazard to humans as they must be inhaled in large numbers to initiate disease. Only in certain circumstances in nature do they occur in large numbers, eg in warm moist places with their trace nutrients. The best examples of these are in natural warm spas, hot mud pools and volcanic geysers or in close vicinity to these.

However, with the development of hot water systems and complex plumbing, we have created an environment for Legionella to thrive in. By flowing out of a shower head or coming out of a tap at high pressure, aerosols are created which contain the bacteria in tiny droplets. Fountains, water features and humidifiers have also caused outbreaks.

If inhaled, the tiniest droplets penetrate far down into the lung and can set up infections in some people. The most susceptible group to contract Legionellosis are males, middle aged and upwards, who smoke or have other lung conditions. However, if the dose is large, anyone can contract the disease.

There are outbreaks on a weekly basis worldwide, often featuring hotels, schools, hospitals and care homes, but particularly leisure centres, spas and domestic jacuzzis. Some notable cases have had many hundreds hospitalised and numbers of deaths among them. This carries the risk of closure, lost business, corrective measures and a lingering reputation.

*The Guidelines for Management of Legionnaires' Disease for Ireland* is currently undergoing an extensive rewrite and will be published later this year. In Britain, the charge of corporate manslaughter has been introduced for managers failing to control Legionella and causing casualties. It may not be long before similar sanctions exist here for leisure centre management.