

SALT CHLORINATORS AND THE REST

It's clear that there's a lot of hype in the swimming pool industry and a great deal of misinformation. So let's take a closer look at the various water sanitation systems on the market.

Salt water chlorination is the most commonly used system for pool water purification in Australia. It works by adding salt to the pool water. This is then converted to chlorine using an electrolysis process as water passes through the treatment cell. What you end up with is a chlorinated pool.

The main reason salt chlorinators are popular is that they reduce the costs and handling hassles associated with conventional chlorine treatment. They provide automated chlorination while pool equipment is running, making life a bit easier for the pool owner. But like adding chlorine to your pool, salt chlorination brings with it a variety of problems.

It requires ongoing expensive chemical back up including stabiliser, algaecides, flocculants and all the associated costs of a regular chlorinated pool. It's difficult to maintain the correct residual chlorine level in extreme conditions of heat, sunlight and bather load.

It only works when the pump is running resulting in lengthy run times and high energy costs.

Salt is corrosive. The higher the salt levels, the more corrosive it can be. This can have a detrimental effect on pool equipment, pipes and fittings. Then you have to deal with splash outs. Splashing normal tap water onto grass, plants and pool furniture is no cause for concern, but years of splashing salt water can lead to sterile soil. So while the industry does its best to convince you that the salt chlorinator is a safer, greener and easier option to dumping chlorine in the pool, the facts tell us otherwise.

Let's look at the ozonator. Ozone is an effective oxidiser but it has a short life. The ozonator produces ozone gas that is injected in to the pool circulation system to aid the residual sanitiser. Ozone is becoming a popular back up for chlorine systems and salt chlorinators.

Again, there has been some clever marketing at work to promote the ozonator as the greenest of green. What they fail to mention is that while the ozonator is a good oxidiser and sanitizer, it can only disinfect the pool water at point of contact. As the water goes through the machine, it sanitises but it leaves no residual sanitiser in the main pool to protect the bathers. So when you use ozone there needs to be a residual sanitiser such as chlorine. What they're doing is taking an old technology and dressing it up to make it appear as an eco-friendly pool cleaner. But you still get a chlorine pool at the end of the day.

There are other drawbacks: the ozonator is not cheap.

Ozone gas is highly toxic, so the ozone generator must be installed in a way that it will prevent the ozone gas getting into the main pool water. It only works when the pump is running thereby driving up your electricity bill. In conclusion: the ozonator is an expensive add-on that promises more than it can deliver.

A better option is ionisation. Copper and silver are nature's mineral sanitisers and have been used for thousands of years. Copper is a powerful algaecide and silver is an effective biocide.

Several factors make copper and silver a more effective alternative to chlorine and other chemical sanitisers. Unlike these chemicals, copper and silver remain unaffected by heat and UV. This makes it a lot easier to maintain a residual level in pool water. The copper and silver ions continue to work as an algaecide and biocide in the pool water even when the equipment is turned off.

The competition in the swimming pool industry has tried to discredit the use of copper and silver in pools by smearing it with the 'heavy metal' label. They suggest that the levels of copper and silver in the water are dangerous. But this is just not true. The amounts required to sanitise a pool are minuscule and well below the recommended amounts for municipal drinking water. It's just another example of how confusing this industry can be and how the public is being misinformed.

However there is a problem with using only copper and silver to treat water. On their own, they do not oxidise the organic compounds in the pool such as oils, dust, urine. This is why people who use ionisers often end up adding a residual oxidiser usually chlorine. Ionisers have to be monitored carefully to ensure they don't cause problems with staining. There have been instances of copper staining pool surfaces and equipment which have given them a bad reputation.

So we have added another breakthrough technology to take care of these issues: a combination of electronics and ultrasonics.

The results are clear:

“I highly recommend Enviroswim. For the **cleanest water** without any added chemicals, **this unit is it.**”

