



Spa salt water sanitizing

A salt water spa pool seems a great concept and is marketed aggressively as an alternative to using “chemicals” but has a host of issues that need to be explained:

- First things first, salt (chemically known as sodium chloride – NaCl) is broken down into chlorine by passing salted water over an electrical current. So contrary to popular belief, a salt water swimming pool or spa pool contains chlorine
- Any salt swimming pool or spa pool needs an electrically operated cell where the salt in the water is converted to chlorine. One of the major reasons we no longer sell salt-water spa pools is that the salt cell in these spa pools has been extremely unreliable. As a result, we have had many customers extremely dissatisfied with the short life of the cell and the replacement cost (RRP NZ\$800 just for the cell – fitting is extra). The warranty on these salt cells is only one year. We have had some customers who have had up to 3 cells replaced in a year! Although these were initially done under warranty, once that warranty expires, there’s no comeback. We have been left with justifiably unsatisfied customers and the importer of these spas unwilling to assist us in making these problems right
- Unlike a swimming pool salt chlorinator, there is no feedback mechanism on a spa pool salt chlorinator. This means you have to manually turn up or down the amount of chlorine you require in your spa. All good if you are a regular user with the same frequency. But if you forget to turn it down and don’t use the spa pool, the levels of chlorine just keep going up. High levels of chlorine in warm water can cause oxidation damage to the jets, plumbing, headrests and underside of the cover. On the other hand if you suddenly have friends around or a party of kids and all use the spa, there would insufficient levels of chlorine to maintain sanitised water and you’d have to remember to manually add some (it takes 24 hours to complete a boost cycle and create additional levels of chlorine)
- Salt levels although low, are sufficient to cause rusting and corrosion of metal componentry in the spa (and the surrounding area – the owner manual recommends washing the area around the spa to remove salt build up from splashing). When these salt cells were introduced into New Zealand, the salt level concentration in the water was set at 750 parts per million (ppm). This level was chosen to reduce the effects of salt on the spa components (heater, circulation pump, jets etc). Because the salt cell life became an issue the recommended salt level was raised to 1500 ppm. That still hasn’t solved the problems with cells consistently lasting less than 18 months. The recommended salt level is now 1700 ppm, almost two and a half times the level initially used and recommended as preventing damage to the components
- It appears that even with this higher salt level, cell life is still a major issue. Overall the running cost of the salt water sanitising cell system can be as high as \$10-12.00 per week for the cell alone (based on an 18 month life and RRP of at least \$800 + fitting). There is an additional cost of the balancing chemicals and Nature 2 which is now recommended in conjunction with the salt chlorine system. This can bring the weekly cost to over \$15.00 before power consumption is calculated, making the claims as “the cheapest lifetime ownership” extremely hard to prove. You also still need to balance your water and maintain correct pH (through use of chemicals).