

# Reef Spas User Manual

November 2020

# Table of Contents

<b>INTRODUCTION:</b>	<b>4</b>
<b>MAIN FUNCTION AND PRODUCT CHARACTERISTICS:</b>	<b>4</b>
• Hydrotherapy Function:	4
• Heating Function:	4
• Filter and Circulation Function:	4
• Lighting:	4
• Stereo:	4
<b>IMPORTANT INSTRUCTION:</b>	<b>5</b>
• Drainage Requirement:	5
• Risk of Electric Shock:	5
• Temperature:	5
• Medical Conditions:	5
• Soak and Cool Time:	5
• Alcohol Use and Medication:	5
• Child/Disabled Persons Safety:	6
• Preventing Slips:	6
• Electrical Appliances:	6
• Weather Conditions:	6
• Ventilation:	6
• Chemicals:	6
<b>SPA INSTALLATION:</b>	<b>6</b>
• Positioning and Location of the Spa:	6
• Electrical Installation (IMPORTANT ATTENTION):	7
<b>SPA OPERATION:</b>	<b>7</b>
• Filling your Spa:	7
• Draining your Spa:	8
• Jets Instruction:	9
• Air Valve Instruction:	9
• Water Diverter Instruction:	10
• Water Flow Switch Instruction:	10
• Spa Cover Instruction:	10
• Control Panel Instructions	11
• Basic Operation	11
• Programming	11



<b>SPA WATER MANAGEMENT &amp; MAINTENANCE:</b>	<b>12</b>
• The effect of pH:	12
• pH adjustment:	12
• Disinfection of the Water:	13
• The Application of Other Special Chemical Products:	13
<b>SPA CLEANING AND MAINTENANCE:</b>	<b>14</b>
• Spa Surface Clean and Maintenance:	14
• Control Panel Maintenance:	14
• Pillow Maintenance:	14
• Spa Cover Maintenance:	15
• Skimmer Maintenance:	15
• Filter Cleaning:	15
• Pump Maintenance (Air Locks):	16
• LED Lights Maintenance:	16
• When your Spa is Not in Use:	16
<b>REEF SPAS LIMITED WARRANTY</b>	<b>17</b>
• Spa Structure (5 years)	17
• Shell Surface (3 years)	17
• Standard Equipment (2 years)	17
• Stereo (1 year)	17
• Cabinet (2 years)	17
• Cover (1 year)	18
• Warranty Performance	18
• Exclusions	18
• All Warranties	19
<b>TROUBLESHOOTING</b>	<b>20</b>
<b>PURCHASE DETAILS</b>	<b>22</b>
<b>NOTES</b>	<b>23</b>

## INTRODUCTION:

Welcome to your new spa. With the correct preparation and care, your new spa will provide you with many years of fun and relaxation. Please find the “User Manual” and “instruction of control system” in the product attachment.

This manual has been developed to provide you with the information that you need regarding the preparation, installation, care and operation of your new spa. Please take the time to carefully read the entire manual to ensure that your spa preparations are carried out correctly. Also make sure that you familiarize yourself with the important safety instructions before using your spa.

If you have any question or doubt on the operation or maintenance of this product, please contact your local dealer.

## MAIN FUNCTION AND PRODUCT CHARACTERISTICS:

### Hydrotherapy Function:

- The product comes with special hydrotherapy seats which are designed according to ergonomic engineering, different kinds of jets in the seat to help to achieve body therapy. Adjust the massage pressure by adjusting the face, water diverter and air regulator.

### Heating Function:

- The spa comes with a thermostatically controlled heater, once the user sets the temperature, the heater will start to maintain the temperature set and ensure the spa is available for all seasons. Make sure to put the insulation cover on the spa when it is heating or the spa is not in use.

### Filter and Circulation Function:

- The spa comes with a filter which can help remove contamination in the water. The control system will run the filter cycle programming automatically, to kill the bacteria via the ozone released by the ozone generator.

### Lighting:

- The spa is fitted with an perimeter LED light. The colour and mode of the light can be changed via the control system touch panel, helping you create an ambiance to suit your mood.

### Stereo:

- The Bluetooth stereo connects to your Bluetooth device or smartphone to allow you to enjoy music while relaxing in the spa.

**IMPORTANT DECLARATION:** All functions mentioned above are a general introduction to Reef Spas products. The spa you purchase may be different specification. Please check it thoroughly before purchasing. The manufacturer reserves the right to modify and improve the product when necessary without prior notice and without entering any obligation.

## **IMPORTANT INSTRUCTION:**

It is essential to familiarize yourself with general spa pool safety and water treatment procedures. Please make sure to familiarize below contents:

### **Drainage Requirement:**

- Ensure that the spa is not in a low or floodable position as this could cause electrical equipment shortage or be dangerous to spa users.

### **Risk of Electric Shock:**

- As with all electrical appliances there is a risk of electrocution. The engine room within the cabinet, houses the control unit that operates the spa. The door enclosing the unit should always remain shut. If water happens to enter the engine room, turn the spa off at the power outlet and make sure all the components are dry before attempting to power the spa back up.

### **Temperature:**

- Keep your spa water temperature no higher than 40°C. Higher water temperatures can cause strain on the cardiovascular system. If the water temperature is higher than 40°C, get out of the spa and contact the dealer as soon as possible. It is recommended that the water temperature be no higher than body temperature i.e. 37.5°C.

### **Medical Conditions:**

- People with diabetes, high blood pressure, heart disease or other cardiovascular conditions should consult their physician before using a spa.
- People with open sores or any type of infection should not use the spa.
- Hot water is an ideal environment for spreading infection, especially if sanitizer levels are not properly maintained.
- Women who are pregnant should consult their physician before using a spa.
- To reduce the risk of contaminating spa water and minimize health risks, shower with soap and water prior to using the spa.

### **Soak and Cool Time:**

- Limit spa use to no more than 15-20 minutes at a time. Some spa pools are equipped with a cooling seat. When you feel you are getting too hot, sit on the cooling seat and allow your body to cool. When you feel comfortable you may submerge yourself back into the spa pool. Sitting in the spa with your head above the water level will dramatically decrease the time it takes to cool down. Hyperthermia may be fatal. Do not expose your body to prolonged exposure in water above normal body temperature.

### **Alcohol Use and Medication:**

- The consumption of alcohol in and around the spa is a hazardous practice. Never use glass drinking vessels near the spa pool. Alcohol can cause drowsiness and lead to drowning. Any person taking medication should consult their physician before entering the spa.

## Child/Disabled Persons Safety:

- This appliance is not intended for use by persons (including children) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsible for their safety. Children should be supervised to ensure that they do not play with the appliance.

## Preventing Slips:

- Always take care when entering and exiting a spa due to slippery, uneven surfaces. Handrails and non-slip surfaces will help to minimize the risk of slipping and falling. In some cases steps may be needed to make entering the spa easier.

## Electrical Appliances:

- Never have any electrical devices within 2 metres of the spa.

## Weather Conditions:

- Do not operate or soak in the spa during severe weather conditions i.e. thunderstorms, cyclones or electrical storms.

## Ventilation:

- If the spa is not sufficiently ventilated some people may experience throat irritations. Make sure that the spa is properly ventilated if you are installing it in an enclosed area.

## Chemicals:

- Ozone disinfection helps reduce the amount of chemicals required in the spa but spa chemicals must be added routinely to control bacteria, prevent infection and maximize the life of your spa and its equipment. However, in concentrated form of these chemicals, like other household chemicals, can be hazardous. Always handle and use them with care. Refer to the product's label for safety and handling information. A more in-depth explanation on how to use chemicals in your spa can be found in the Chemical Management section.

## SPA INSTALLATION:

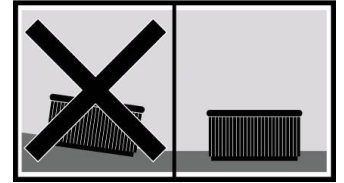
Please always find a professional to install your spa. The manufacturer shall not be responsible for any damage caused by an improper installation or an installation performed by non-qualified personnel.

### Positioning and Location of the Spa:

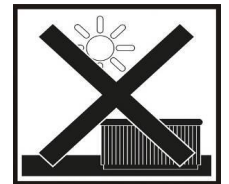
- Position your Hot Tub in an area that is very well supported and solid enough to take the weight of the tub including the water and the people enjoying the product. Please take advice from a structural engineer or your builder if in any doubt. Ensure that the hot tub is properly supported by either a level concrete pad or a properly constructed deck capable of supporting 1220kgs /m<sup>2</sup> (250lbs./ft.<sup>2</sup>).
- A concrete base should be at least 4" thick. It is not advisable to put your spa on an elevated wooden platform without sound advice, again due to weight issue, the general message is "these things are heavy".



- Avoid placing the spa where water could flood into the electrical equipment compartment and to protect the unit from direct contact with very damp areas.
- It is recommended to place the spa away from trees, as falling leaves may block the filter.
- Your spa needs to be positioned so that the spa's equipment is easily accessible. The equipment is located (in most cases) at the front of the Spa and will need to be accessible for service and power connection. It is recommended
- You must have access to all sides allowing at least 0.5 Metres access around all 4 sides of your Spa for future access if required. It will be the owner's responsibility to make sure this is completed prior to the service being carried out. All portable Spa equipment must be ventilated. Do not obstruct any vents in the cabinet..



**IMPORTANT NOTE: DO NOT leave your spa empty of water in direct sunlight for extended periods of time. Doing so may void your warranty. The Spa has covered insulation foam over the shell and pipe work. If left exposed to direct sunlight the surface temperature can build up to 200°C causing damage to your spa. It is suggested that you not only have the hard cover over your Spa while not in use but also have the Spa in an area which is sheltered from extreme and harsh weather conditions. Leaving the Spa uncovered and exposed may void your warranty on your Spa and its accessories.**



## Electrical Installation (IMPORTANT ATTENTION):

- The electrical supply to your new spa will require a dedicated circuit with no other appliances or sockets sharing the power. Electrical burnout due to incorrect amperage WILL NOT be covered by warranty. Ask for a qualified electrician for electrical connection.
- Ensure the main power supply has installed high sensitive leakage protectors. Recommend 30mA leakage protectors (RCD)
- Ensure your new spa is safely earthed as the right figure. Please refer to the control system instruction manual before electrical installation.
- You are advised to drill a dia. 26mm cable hole on the bottom of one corner skirt that is near the control box as the right figure for the cable.

## SPA OPERATION:

To avoid any misunderstanding or damage on the spas, please follow below procedure carefully before enjoying your spa.

### Filling your Spa:

- Before filling your spa please check and tighten all the live connectors, they may go loose during transportation.
- Please check and make sure all the check valves are all in the open position.
- Check that the drainage valve is shut off.
- Check that all jets are in the open position. Swivel anti- clockwise to turn your jets on.
- Fill your spa with water.
- **Make sure to fill the water through the filter area every time to prevent air block in the pumps**

- Fill water to the line on the water level indicator as the figure which is 4" to 6" (100 to 150mm) below the top edge of the spa. Do not overfill as the spas water level will rise as each person enters the spa.

**NOTE:** To avoid any damage to the components, **DO NOT** fill hot water over 40°C into your Spa.

### Draining your Spa:

- If you use your spa once or twice a week, the need to drain your spa will be less frequent than a spa owner who uses their spa three or more times a week. Therefore, it would be recommended that a spa be drained at least every 3 months.
- There are two kinds of drainage valves as per different spas: the side drain valve is on the skirt panel and the corner drain valve is positioned at one corner of the bottom base



### Details for drainage are as follows:



1. Open the skirt panel of drain valve to open the red ball valve (the ball valve connecting to the black drain valve is closed out of factory).

2. Remove the cap move the cap of the drain valve by turning it anti-clockwise.

3. Connect a 3/4 inch hose or screw a standard male hose fitting onto the valve and connect your hose.

4. Turn the valve anti-clockwise to the end and then pull out the valve forward to drain the water.

**NOTE:** Ensure the power is shut off before draining. Equipment damage caused by dry running will not be covered under warranty.

**DISPOSAL OF WATER:** Do not drain water onto your lawn or plants unless all the bromine or chlorine has dissipated from the water. The sanitizer in your water will dissipate quickly by leaving the cover off and exposing the water to direct sunlight.

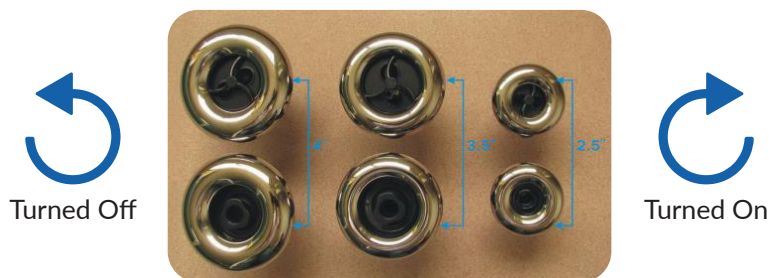


## Spa Control Panel Instruction:

- Refer to "Control Panel Operation Guide" together with the product.

## Jets Instruction:

- Jets are the main parts in which massage comes into effect. Almost all of the jets in your spa are adjustable except the 1" jets. You can adjust the water flow through by rotating the jet face.
- Turn the jet face clockwise about 1/4 of a turn, the jets are turned on.
- Turn the jet face anti-clockwise about 1/4 of a turn, the jets are turned off.



**NOTE:** Some jets and the air jets are not adjustable. Do not rotate these jets with force. It may cause damages to the jets.

## Air Valve Instruction:

- There are different styles of air valve as per the requirement of dealers. Your spa may have one of the air valves in the figure below. Air controls affect the pressure of your jets by adding air. You may have more than one air valve on your spa, each of which will be associated to a certain group of jets. By opening an air valve when the pump is on, air will be drawn into the water flow to increase the massage strength.
- When the air valve is turned clockwise, it will decrease the power of the massage jets.
- When it is turned anti-clockwise, it will increase the power of the massage jets.



**NOTE:** For better heating efficiency, please turn the air valves off when not using the spa. The air may cool the spa water temperature over time.

## Water Diverter Instruction:

- Your spa may be equipped on one of the below water diverter. Rotating the water diverter, you will divert the massage power between different seats.



## Water Flow Switch Instruction:

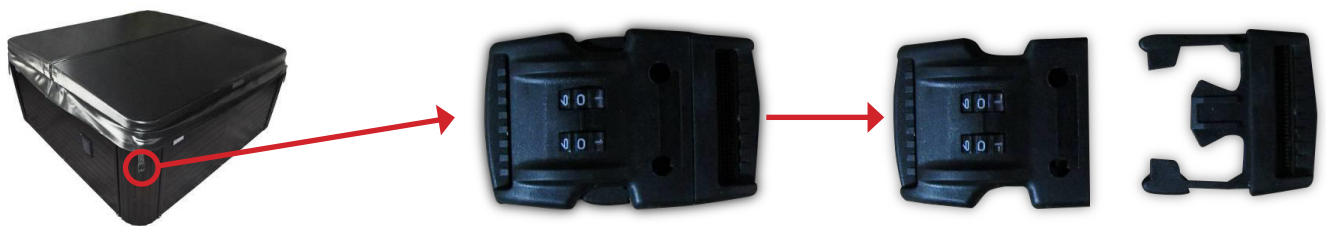
- The water flow switch controls the flow of water to the options, such as waterfalls and fountains. Rotating the water flow switch will turn on, turn off and adjust the water flow.



**NOTE:** For better heating efficiency, turn the water flow controls off when the spa is not in use.

## Spa Cover Instruction:

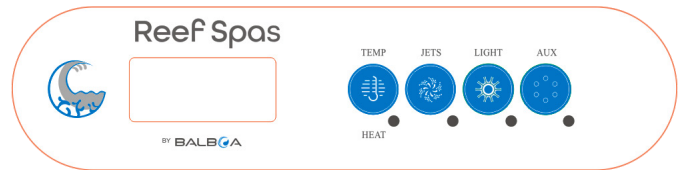
- There is one coded lock on each corner of the insulation cover. Please fix the male part of the lock on the spa corner panel with 3x15mm round head screws. Set the password to 0-0 and then press the two buckles on the sides to open the coded lock.



**NOTE:** Please put the cover on the spa when the spa is heating and after use. Remember to lock the cover to preventing children from entering the spa unattended.

## Control Panel Instructions

BP Series TP400/TP600 Quick Reference Card BALBOA



## Start Up

- When the RCD for the spa is switched on to supply power, a start-up sequence of numbers will appear on the display. If no button is pressed, LINK will appear after the start-up sequence.
- The spa will enter Priming Mode. After Linking, press the Jets Button(s) to turn the pumps on and off to verify that all air is purged from the plumbing, particularly the plumbing associated with the heater. The spa uses a circulation pump. The Light Button turns the Circulation Pump on and off during Priming Mode.
- Priming Mode will end automatically in 4 minutes. Pressing a Temperature Button will exit Priming Mode manually. The water temperature will not appear for a minute or so. Once the water temperature is recognized by the system, and if it is below the Set Temperature, the heater will start.

## Basic Operation

- Press a Temperature Button once and the current Set Temperature will begin to flash on the LCD. (The Set Temperature and the actual water temperature are often different.) While the numbers are flashing, press the Temperature Button again to change the Set Temperature.
- Press-and-hold for faster adjustment. After the new Set. Temperature stops flashing, in about 10 seconds, the actual temperature is displayed again and the new Set temperature is programmed. The spa will now heat to the new Set temperature as needed.
- The Light Button turns the spa light on and off and is also used in conjunction with the Temperature Button(s) to navigate the system menus.

## Programming

- Refer to the Balboa TP400 User Guide (40940) for detailed operation, programming and message instructions.
- Navigating the deeper menu structure is done with only 2 or 3 buttons on the control panel.
- Pressing the light button while the Set Temperature is flashing will enter the menus.
- Pressing light after that will proceed through the menu choices. Pressing a Temperature Button while any menu item is showing will either edit it directly or begin an editing sequence.
- Depending on the screen displayed, waiting between 10 and 30 seconds will allow the panel to return to normal operation and a display of spa status.

## SPA WATER MANAGEMENT & MAINTENANCE:

- Please note that these instructions are just a guide to maintain the spas water quality. Before any actions, please consult your local spa specialist for the proper amount of sanitiser to use, and take proper action depending on the capacity of the spa.
- You should never use pool grade chemicals in your spa. Any damage to equipment caused by using pool grade chemicals or other improper chemicals will not be covered under warranty.
- Spa water should be tested at least once a week, often more frequently depending on usage. When adding chemicals to the spa, make sure the pumps are running and allow 20-30 minutes for the chemicals to mix. Test the water after the chemicals are sufficiently mixed into the water.

**NOTE:** Do not cover the Spa for at least 30 minutes after adding chemicals.

### The effect of pH:

- Low pH (below 7.2) causes sanitizers to dissipate more rapidly, increases corrosion of surfaces and equipment, and may make water irritating to spa users. If pH is high (above 7.6) chlorinating sanitizers are less effective, surfaces and equipment can scale, water may cloud and shorter filter runs may occur.

**ATTENTION:** The pH level measures the acidity and alkalinity: Values above 7 are alkali and below 7, are acid. A pH index of between 7.2 and 7.6 is recommended.

**WARNING:** Please make sure that the correct pH level is maintained, any damage caused by an inadequate pH level is not covered by your spa guarantee.

### pH adjustment:

- Check the pH of the spa water daily using the pH tester. (Not supplied).
- If the pH is above the above-mentioned indexes, do not enter the Spa temporarily. Wait for two hours and re-do the pH test.
- If the pH is below the above-mentioned indexes, let the pumps prime. Wait for two hours and re-do the pH test.
- If the proper pH level cannot be maintained by the above instructions, please add appropriate amount of acidity-alkalinity balance reagent into the water, uncover the spa cover, leave it mix in for 20 minutes, then re-do the pH test;

## Disinfection of the Water:

- Disinfection of the water is of utmost importance to destroy algae, bacteria and organisms that could develop in the water. However, excessive disinfection could cause skin and eye irritation.
- Ozone disinfection:** Ozone or O<sub>3</sub>, is an oxidizing chemical compound, which is highly effective for disinfecting water. The main advantage of ozone is that it leaves no chemical trace and is odourless. The spa is equipped with one ozone generator which produces 50mg ozone per hour. Ozone disinfection is an automatic process and resulting ozone is injected into the water through the ozone injector, ozone mixer and coming out from the ozone jet (it is one of the four circulation jets at the bottom of the tub, you can see there are air bubbles coming out from it in the water). The ozone generator works automatically once the circulation pump is running. The indicator light of the ozone generator will be on when it is working. You can open the skirt panel to check it.



**NOTE:** You are advised to replace the ozone generator every two years to get better disinfection effect.

## The Application of Other Special Chemical Products:

Besides the pH adjustment and the above-mentioned disinfection ways, there are some cleaning products which can be used in spa water.

- ANTI-SCALE:** it can be used to prevent/reduce precipitation of calcium salts (scale), especially in hard water areas. Use it once a week and whenever the water is renewed.

## WARNING:

- Add the exact amounts to the water, as specified. Do not mix products, to avoid possible reactions.
- Do not smoke while handling these products - they may be flammable.
- Do not add chemical products to the water if there is someone in the spa.
- Keep containers tightly closed in dry, well-ventilated places, and keep these products away from children.
- Do not inhale chemical products and take care not to let them come into contact with the eyes, nose or mouth.
- Wash hands after use.
- Follow the emergency instructions on the product label in the event of an accident or ingestion.

## SPA CLEANING AND MAINTENANCE:

Owning a spa is fun, relaxing and therapeutic, but more importantly we must look after our investment to keep it healthy and economical, thus avoiding unnecessary premature repair costs. Detail below is a simple step by step procedure to follow.

### Spa Surface Clean and Maintenance:

- The spa surface is made of high-glossy acrylic and must be kept clean. You are suggested to clean the spa outside the water line once a week and clean the whole spa after the drain. Details steps as below:
- Clean the dirt with a wet towel, we can use the neutral detergent and soft towel, and cannot use the detergent with ketone or chlorine water.
- If the surface has some light scratch, please polish it with 2000# sandpaper and then make it with toothpaste, re-polish it with a soft towel.
- Please do not clean the spa surface with any chemical solution or crude tools; do not scratch the spa surface with hard material or knives.
- Please do not clean the spa surface with nail polish, nail polish remover, dry detergent, acetone, paint remover etc. It will damage the surface.
- Do not touch the spa surface with any heat source over 70°C.

### Control Panel Maintenance:

The control panel is glued on the tub shell by silicon sealant. If you need to replace it, use a blade to take it out from the shell. In daily use, do it as follows:

- Do not touch the control panel with hard objects to avoid scratching.
- Avoid prolonged direct sunshine on the control panel.
- Keep the control panel covered when not in use.

### Pillow Maintenance:

Your spa may be installed one of the two kinds of pillow as below. You can remove the pillows for cleaning and maintenance quickly and easily.

- **Fixed pillow:** Grab the lower edge of the pillow with both hands firmly and pull up. As you do this, the pillow inserts will pop out of the holes. Reseat the pillows by aligning the pillow inserts with the holes and striking the pillow hard enough to insert the pegs back into the holes.



**NOTE:** Clean the pillow with neutral detergent; Excessive chemical levels and ozone may cause fading of

14 headrests. Fading is not covered by warranty.

## Spa Cover Maintenance:

- Clean the cover with soapy water. Make sure to not let the soap water go inside the spa.
- Do not pull off the cover by catching the linker in the middle of the cover. It is easy to be broken.
- Do not sit, lie and jump on the cover. Damage caused from this is not covered by warranty

**NOTE:** Please put the cover on the spa after use or clean. Leaving the spa uncovered and exposed may void the warranty on your spa and its accessories.

## Skimmer Maintenance:

There are two styles of skimmer on different spa-lifting skimmer and wall- mounting skimmer.

- How to remove the paper filter from the wall mounting skimmer:



1. Unscrew the fixing screw anticlockwise.



2. Take out the protection grating upwards.



3. Pull out the filter screen to wards.



4. Swivel the paper filter anticlockwise.



5. Take out the paper filter upwards.

## Filter Cleaning:

- Turn off the power of the spa.
- Remove the filter by turning it counter clockwise (please check the skimmer instruction before doing it).
- Clean the filter by spraying water from top to bottom at a 45° angle to remove loose debris. You should clean your filters regularly.
- Remove your filters and spray the debris out of it with a garden hose once a week. Monthly soak your filters in a cartridge filter cleaning solution and follows the manufacturer's instructions.

**NOTE:** Contact your dealer to replace the old filter every 3-6 months.

**WARNING:** Always ensure that the power to your spa is off before removing the filters. Something may be sucked into the circulation pump or heater and cause failure. This fault will not be covered by warranty.



## Pump Maintenance (Air Locks):

- If you have emptied and refilled your spa and the pump comes on but there is no water movement in your spa, the spa is probably suffering from an air lock. This situation is more often for circulation pumps than other massage pumps. To get the air out of your pump, turn the spa off and find the circulation pump, which is situated inside the spa cabinet. Locate the pipe which goes into the top of the pump. This has a large nut, which is called the barrel union. Undo anticlockwise until you hear the air escape. When the water comes out, re-tighten. This should fix the airlock. Sometimes you have to start the pump again to remove the air.



**NOTE:** To prevent this from happening, always fill the spa through the filter box.

## LED Lights Maintenance:

Your spa will be equipped with one kind of LED lights as below. If the LED lights are not working or its colour is different from other lights, you need to replace it. Please follow the below steps to replace the LED lights.

- **How to replace the plug-in style LED lights:** Pull out the defective LED light from its holder on the tub shell and the white socket. Then insert the new light to the holder and socket accordingly.



## When your Spa is Not in Use:

If you are going away for a period longer than 2 months, it is recommended that you turn your spa off and empty it. It is important to remember to leave the cover on even while empty to protect the shell. If you are going away for a few days or weeks, do not turn your spa off completely. Turn the temperature down to 15 degrees, so that the filtration cycles are still functioning but the spa doesn't heat.



## REEF SPAS LIMITED WARRANTY

This Limited Warranty is intended for the customer of Reef Spas who purchases with On-Board-Date on Bill of Lading after January 1, 2020.

### Spa Structure (5 years)

- Reef Spas warrants spa structure (refer in particular to stainless steel frame structure) against damage (rust is not included) due to defects in the spa structure for five years to the customer from On-Board-Date on Bill of Lading.

### Shell Surface (3 years)

- Reef Spas warrants the shell surface to the customer against water loss due to material failure including cracks, blisters, peeling and delaminating for a period of 3 years from On-Board-Date on Bill of Lading.

### Standard Equipment (2 years)

- Reef Spas warrants the spa's standard equipment (included the pump(s), heater and control system, LED lighting system and O3 generator, jets, topside control valves and pipes against malfunctions due to defects in materials and workmanship for a period of 2 years to the customer from On-Board-Date on Bill of Lading. Include only parts necessary to repair.
- Jet inserts (including stainless steel) are not warranted against discoloration or fading.
- Ozone system, pillows are warranted to be free from defects in materials and workmanship for a period of 1 year.
- Fuses, Filter cartridges, waterproof spa protecting bags are wearing parts, which are not covered by this Warranty..

### Stereo (1 year)

- Reef Spas warrants the Bluetooth Stereo and speakers to be free of defects in workmanship and materials for a period of 1 year to the customer from On-Board-Date on Bill of Lading. Include only parts necessary to repair.

### Cabinet (2 years)

- Reef Spas warrants the cabinets to be free from defects in materials and workmanship for a period of 2 years to the customer from On-Board-Date on Bill of Lading. Include only parts necessary to repair.
- Scratches, as well as fading and weathering from exposure to direct sunlight on the cabinet side panels are considered normal wear and tear, which will occur naturally over time, and are not defects.

## Cover (1 year)

- Reef Spas warrants the spa cover against malfunctions due to defects in materials and workmanship for 1 years to the customer from On-Board-Date on Bill of Lading. Include only parts necessary to repair.
- Normal wear and tear is not a defect, when used with the cover lifter, the wear & tear for the cover's joint point will be considered normal wear & tear.

## Warranty Performance

- To obtain service in the event of a defect or malfunction covered by this Limited Warranty, notify Reef Spas manufacturer as soon as possible and use all reasonable means to protect the spa from further damage. Meanwhile, send the spa serial number (located on the top of control box), a thorough description of the problem and photographs of the part with problem to the Reef Spas manufacturer. Upon proof of the purchase and the proof of the defect or malfunction, Reef Spas manufacturer will correct the defect or malfunction subject to the terms and conditions in this limited Warranty. There will be no charge for parts necessary to repair within this Limited Warranty. Include only parts necessary to repair (including the express fee). Reef Spas reserves the right to request the customer to send back the broken parts for examination (the express fee for sending back the part should be paid by user/customer).
- If Reef Spas determines the spa shell repair for the defect is not feasible, we reserve the right to provide a replacement spa equal in value to the original purchase price of the defective spa. Spa replacement is done only at the discretion of Reef Spas. Reasonable costs for the removal of the defective spa, and delivery and installation will be the responsibility of the customer. The replacement spa will carry the balance of the original spa's warranty. Spa shell surface warranty as follows: For the first and second year dated from On-Board-Date on Bill of Lading, 100% reimbursement equals to a new standard configuration spa (based on current UK price); For the third year, 50% reimbursement equals to a new standard configuration spa (based on current UK price). Balboa control system, Spa cover, step and other spa options are not included. Reef Spas reserves the right to check the replaced spa at spot and request the customer to send back the cut piece of the spa shell. If the customer does not cooperate, Reef Spas reserves the right not to reimburse.

## Exclusions

- All warranties hereunder are void if the spa has been subject to alterations (including after-market accessories), misuse or abuse or any repair of the spa has been attempted by a non-certified electrician. Alterations include but not limited to, any change to the components, replacement of components or addition of components without the written authorization from Reef Spas. Misuse includes careless handling of the spa, damages caused by improper and/or non-certified electrical hook-ups, failure to operate the spa in accordance with the instructions contained in the owner's manual provided with the spa, including incorrect start-up procedures, any use
- of the spa or any of its components in an application for which it was not designed, and damage caused by improper chemical balance( including any damage to spa components caused by scale build up to due to poor water chemistry), ice in the spa, damage to the spa surface by allowing un-dissolved sanitizing chemicals to lie on the surface or if our spa has been used for commercial purposes. Spa cover is not warranted against water

absorption or any damage resulting from water absorption. Any damage resulting from the mishandling of the spa cover in any way is not covered under warranty. Any damage caused by moving of the spa or improper installation (including insufficiently prepared or un-leveled ground) is considered abuse and any damage to the material or workmanship of spa cabinetry and floor in shipping or handling are expressly excluded from the Limited Warranty.

- External appearance quality feedback for spa including damage to assembly parts or lack of assembly parts on the spa (including pillows, cabinets, jets, LED lights, pumps etc) reported after ninety days (90 days) of receipt are not covered under warranty.
- Reef Spas will not be responsible for power company issues or improper electrical installations, damage or lack of performance resulting from high or low voltages outside operating parameters.
- Reef Spas will not be responsible for software and product upgrades throughout the life of the spa.
- Reef Spas expressly excludes warranty coverage on any of the following: Acts of nature including but not limited to damage resulting from lightning, storm, flooding, freezing, fire and any other acts of nature. Any spa installed in a commercial application. Any failure caused by improper cover use or damage to the spa surface by leaving the spa outdoors without the hot tub cover in place. The heat created by leaving the spa in direct UV light without a cover may cause surface damage with the acrylic and may also cause plastic parts to warp some fittings will leak or cease working as a result. These occurrences are not covered under warranty. The hot tub cover must be kept on the hot tub when not being used.
- Scratches or micro-crazing in the spa shell surface is not covered under this Limited Warranty, Micro-crazing is defined as an area of tiny shiny lines visible in areas on the surface of some thermo-plastic sheets. This phenomenon, although rare, is known to occur in many types of plastic sheet materials. The surfaces of thermoformed acrylic hot tubs are not immune to this possibility.
- Damage caused by unapproved sanitisers such as tri-chlor, acids, calcium hypochlorite, sodium hypochlorite, peroxides, any sanitising chemical that may remain undissolved on the spa surface. Any and all sanitisation systems used in the spa must be factory approved prior to installation or your warranty is void.

### All Warranties

- The warranties contained herein are all of the warranties provided by Reef Spas to the customer, and to the extent permitted by law. All warranty claims must be submitted within the warranty period. Reef Spas reserves the right to repair or replace components or materials at its option. The manufacturer will not be responsible for any statements or representations made in any form that go beyond, are broader than, or are inconsistent with any authorized literature or specifications furnished by Reef Spas.

## TROUBLESHOOTING

Description of Trouble	Analysis	Solution
An error message appears on the LCD display	<ul style="list-style-type: none"> <li>• Error detected by digital diagnostics function.</li> </ul>	<ul style="list-style-type: none"> <li>• Please check the error message trouble shooting in the control system manual, and then contact your local dealer if you are unable to resolve the issue.</li> </ul>
Spa can't start in any mode	<ul style="list-style-type: none"> <li>• Power off.</li> <li>• Control panel is locked.</li> <li>• Control panel failure</li> </ul>	<ul style="list-style-type: none"> <li>• Check the power switch on or leakage switch is turned on.</li> <li>• Check the control panel is unlocked.</li> <li>• Check the failure code in control system manual for solution, and then contact your dealer to do the maintenance.</li> </ul>
Spa starts automatically	<ul style="list-style-type: none"> <li>• Filtration program is operating.</li> <li>• Heating function is operating.</li> <li>• Anti-freezing function is operating.</li> </ul>	<ul style="list-style-type: none"> <li>• The control system will automatically stop when the program finishes.</li> </ul>
The water pump turns off	<ul style="list-style-type: none"> <li>• The pump running time is more than the system default maximum running time.</li> <li>• The pump motor is overheating protected.</li> </ul>	<ul style="list-style-type: none"> <li>• Repress pump button to restart the pump.</li> <li>• Stop running pump more than 1 hour until cool and then start the pump.</li> </ul>
Pump running after filling spa but no water coming through jets	<ul style="list-style-type: none"> <li>• The jets are closed.</li> <li>• Air blockage in the water pump.</li> </ul>	<ul style="list-style-type: none"> <li>• Check whether the jets are closed. If yes, open it.</li> <li>• Turn pumps on and off several times to drain the blocked air. Unscrew the live union on the water pump to release the air and then screw on tightly.</li> </ul>

Description of trouble	Analysis	Solution
Heater heating slowly or failing to heat	<ul style="list-style-type: none"> <li>• Temperature setting is low</li> <li>• Filter cartridge dirty and blocked</li> <li>• No spa cover on the spa causing heat loss</li> <li>• Circulation jets is closed</li> <li>• Heater broken</li> </ul>	<ul style="list-style-type: none"> <li>• Set the temperature up</li> <li>• Clean or replace paper filter core</li> <li>• Put the cover on the spa</li> <li>• Turn on the jets</li> <li>• Contact the local dealer for maintenance</li> </ul>
Weak water flow through the jets	<ul style="list-style-type: none"> <li>• Jets are not fully opened.</li> <li>• Jets are blocked.</li> <li>• Air valve is turned off.</li> <li>• Water diverter closed to the seat.</li> <li>• Water pump ball valve is not fully opened.</li> </ul>	<ul style="list-style-type: none"> <li>• Turn on the jets fully.</li> <li>• Turn counter-clockwise to take off the jets fitting and clean the jets chamber if blocked.</li> <li>• Turn on the air valve switch.</li> <li>• Divert the water diverter to the seat jets wanted.</li> <li>• Check the water pump ball valves are fully opened.</li> </ul>
Uneven water flow from jets	<ul style="list-style-type: none"> <li>• Suctions or filter are blocked.</li> </ul>	<ul style="list-style-type: none"> <li>• Clean the suction or filter.</li> </ul>

**PURCHASE DETAILS**

Please fill in the correct details for below:

**Purchase Date**

.....

**Purchased From**

.....

**Contact Details**

.....

**Installed By**

.....

**Spa Serial Number**

.....

**Spa Model**

.....

## This image shows a full page of white paper with horizontal ruling lines. The lines are evenly spaced and extend across the width of the page, typical of notebook or legal stationery. There are no margins, text, or other markings present.

