

Cal Spas[®]
SINCE 1978

THE CHILL SPA



Patio™ Series

2025
Owner's Manual

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Congratulations! You are now the owner of the finest chill spa built. Now you will experience health benefits and relaxation as you never had before. We at Cal Spas focus on quality, design and comfort in order to create a truly luxurious experience like no other.

Welcome to the Cal Spas® family.

It is important that you register your Chill Spa product as soon as possible. By taking just a few quick minutes to register, you can enjoy product alerts, more efficient support, and quicker service, Go to <https://calspas.com/register-your-spa.php>. Fill in your information and click "SEND WARRANTY INFO"

Locating the product serial number

The serial number of your spa is located on a metal plate attached to the right side of the spa panel. You will need this number to properly register your spa and activate coverage. Write this information in the space provided below

Spa Model: _____

Spa Serial Number: _____

Date Purchased: _____

Date Installed: _____

Dealer's Phone Number: _____

Dealer's Address: _____

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LTR20251170

CONTACT INFORMATION

For customer service, please contact your authorized dealer immediately. If you need additional information and/or assistance, contact:

Lloyd's Material Supply Inc.
Customer Service Department
1462 East Ninth Street
Pomona, CA 91766

Toll Free: 1-800-CAL-SPAS
Fax: 1-909-629-3890


IMPORTANT SAFETY INSTRUCTIONS

READ AND FOLLOW ALL INSTRUCTIONS CAREFULLY!

When using installing and using this spa, basic safety precautions should always be followed, including:

KEEP UNIT UPRIGHT, DO NOT STORE OR MOVE UPSIDE-DOWN OR ON ITS SIDE.

- 1. ⚠️ DANGER: RISK OF SEVERE INJURY OR DROWNING!**
 - DO NOT allow children to be in or around a spa unless a responsible adult supervises them.
 - Keep the spa cover on and locked when not in use.
 - See instructions enclosed with your cover for locking procedures.
- 2. ⚠️ DANGER: RISK OF SEVERE INJURY OR DROWNING!**
 - The suction fittings in this spa are sized to match the specific water flow created by the pump. Should the need arise to replace the suction fittings, or the pump be sure the flow rates are compatible.
 - Never operate the spa if the suction fitting or filter baskets are broken or missing. Never replace a suction fitting with one that is rated less than the flow rate marked on the original suction fitting.
- 3. ⚠️ DANGER: RISK OF SEVERE INJURY FROM ELECTRIC SHOCK OR DEATH FROM ELECTROCUTION!**
 - Install the spa at least 5 feet (1.5 meters) from all metal surfaces. As an alternative, a spa may be installed within 5 feet (1.5 meters) of metal surfaces if each metal surface is permanently bonded by a minimum #8 AWG solid copper conductor to the outside of the spa's control box.
 - DO NOT permit any external electrical appliances, such as lights, telephones, radios, televisions, and etc., within 5 feet (1.5 meters) of the spa. Never attempt to operate any electrical device from inside the spa.
 - Replace a damaged power cord immediately.
 - DO NOT bury the power cord.
 - Connect to a grounded, grounding-type receptacle only.
- 4. ⚠️ WARNING: RISK OF HYPERTHERMIA (OVER-HEATING) CAUSING SEVERE INJURY, BURNS, WELTS OR DEATH!**
 - Water temperature in excess of 104°F (40°C) may be injurious to your health.
 - The spa water should never exceed 104°F (40°C). Water temperatures between 100°F (38°C) and 104° F (40°C) are considered safe for a healthy adult.
 - Lower water temperatures are recommended for young children and when spa use exceeds 10 minutes.
 - Before using the spa, the user should measure the water temperature since the tolerance of water temperature-regulating devices varies.
- 5. ⚠️ WARNING: TO REDUCE RISK OF INJURY**
 - Prolonged exposure to hot air or water can induce hyperthermia. Hyperthermia occurs when the internal temperature of the body reaches a level between 3°F (2°C) to 6°F (4°C) above the normal body temperature of 98.6°F (37°C). While hyperthermia has many health benefits, it is important not to allow you body's core temperature to rise above 103°F(39.5°C).
 - High water temperatures have a high potential for causing fetal damage during pregnancy. Women who are pregnant, or think they are pregnant should always check with their physician prior to spa usage.
 - The use of alcohol, drugs or medication before or during spa use may lead to unconsciousness, with the possibility of drowning.

-  **5.5 Hypothermia:** Hypothermia occurs when the body's temperature drops below 95F (35C)
 Signs of mild Hypothermia (body core temperature 95F to 89.6F // 35C to 32C)
 Shivering and chattering teeth
 Exhaustion
 Clumsiness, slow movements, and reactions, prone to falling
 Sleepiness
 Weak Pulse
 Fast heart rate
 Rapid breathing
 Pale skin color
 Confusion, poor judgment, and lack of awareness.

DO NOT USE THE CHILL SPA FOR EXTENDED PERIODS OF TIME

Extended use of the chill spa in temperatures below 60F can increase your risk of hypothermia.

Contact medical services if symptoms of hypothermia arise.

Call 911 in a medical emergency.

6  Proper Ventilation: Proper ventilation of Chill Spa necessary for optimal operation.

The Chill Spa uses a water chiller which will generate warm exhaust air from the cooling of the Chill Spa. The Chill Spa is designed for outdoor use, for proper airflow allow up to 3' - 5' feet of space around the unit without obstructions. **DO NOT OBSTRUCT THE EXHAUST VENTS**, blocking these vents will be detrimental to the operation of the Chill Spa, with higher energy consumption and slower cooling speeds.

Never install the unit in a closed room with a limited air volume in which the exhaust air expelled from the unit will be reused, or close to shrubbery that could block the air inlet. Such locations hinder the continuous supply of fresh air, resulting in reduced efficiency and possibly preventing sufficient cooling/heating output.

 **WARNING:** The use of alcohol drugs or medication can greatly increase the risk of fatal hyperthermia.

7.  DANGER: RISK OF ELECTRIC SHOCK

Do not permit any electric appliance, such as a light, telephone, radio, or television within 5 feet (1.5 m) of a spa.


8.  WARNING: people with infectious diseases should not use a spa or hot tub.

9.  WARNING: to avoid injury exercise care when entering or exiting the spa or hot tub.

10.  WARNING: Do not use spa or hot tub immediately following strenuous exercise.

11.  WARNING: Prolonged immersion in a spa or hot tub may be injurious to your health.

12.  CAUTION: Maintain water chemistry in accordance with manufacturer's instructions.

13.  CAUTION: This cold spa enables the user to determine the temperature and duration for which they are immersed in the spa. Before using a cold spa, you should always ask a qualified professional if use of this spa is safe and appropriate for you

Note: The Patio Chill Spa can only cool, not raise in temperature. It is only designed to stay cold and within its selected range.

Electrical Requirements

In order to ensure proper operation of the Chill Spa, the unit must operate on a dedicated electrical circuit. Avoid connecting the Chill Spa on a circuit connected to other appliances or light fixtures. Failure to do so may result in poor operation of the chill spa, and damage to the chiller unit within the chill spa.

The Chill Spa when installed in the United States must meet the requirements of the NEC 70 and any applicable local, state, and federal codes. The spa must operate on an independent circuit as required by NEC 70 with no other appliances or lights sharing the power within that circuit. Use copper wire with THHN insulation only, **do not use aluminum wire.**

Cal Spas is not responsible for damages or injury caused by not following the recommended table below. Follow all national & local codes when installing the spa.

Imperial Measurements

Distance	Gauge Wire	Amperage
Up to 25' Feet	14 Gauge	15 Amps
Up to 50' Feet	12 Gauge	15 Amps
Up to 100' Feet	8 Gauge	15 Amps

Metric Measurements

Distance	Gauge Wire	Amperage
Up to 7.50 meters	2.5 mm ²	15 Amps
Up to 15.25 meters	4 mm ²	15 Amps
Up to 30.50 meters	10 mm ²	15 Amps

Any modification done to the provided GFCI cable or removal or replacement of the provided cable must be done by a certified electrician/technician. Failure to properly follow the electrical requirements stated by Cal Spas poses the risk to cause damage or injury to persons operating the spa. Failure to follow these requirements will void your warranty.

Preparing for Your Spa

Pre-Delivery Checklist

Most cities and countries require permits for exterior construction and electrical circuits. In addition, some communities have codes that require residential barriers, such as fencing and/or self closing gates on property to prevent unsupervised children from entering the property. Your dealer can provide information on which permits may be required and how to obtain them prior to the delivery of the spa.

Before Delivery

- Plan your delivery route
- Choose a suitable location for the spa
- Lay a 5-8 cm concrete slab
- Install dedicated electric supply

After Delivery

- Place spa on Slab
- Connect electrical components

Planning the Best Location

Pre-Delivery Checklist

Do not place your spa within 10 feet (3m) of overhead power lines.

Consider How You Will Use Your Spa

How you intend to use your spa will help you determine where you should position it. For example, will you use your spa for therapeutic purposes? Recreational use? If your spa is intended for recreational use make sure to leave plenty of room around it for activity. If you intend to use the spa for relaxation and therapy, you will probably want to create a specific mood around it

Plan for Your Environment

If you live in a region where it snows in the winter or rains frequently, place the spa near a house entry. By doing this you will have a space to change clothes and not be uncomfortable.

Consider Your Privacy

In cold-weather climate, bare trees won't provide much privacy. Take into consideration year round climate when looking for the best privacy options for your spa. Consider the view of your neighbors as well

Provide a View with Your Spa

Think about the direction you will be facing when sitting in your spa. Do you have a special landscaped area in your home you find enjoyable? A area that takes advantage of a good view, or a favorite spot that catches a soothing breeze throughout the day.

Keep Your Spa Clean

In planning your spa's location, consider a location where the path to and from the house can be kept clean and free of debris. Prevent dirt and contaminants from being tracked into the spa. Place a bath mat next to the spa entrance to allow users to clean their feet before going into the spa. Sunscreen and tanning lotions that don't properly absorb into the skin will contaminate the water, adjust filtration times if needed.

Note: some sunscreens require application 15-20 minutes before exposure to water.

Allow for Service Access

Make sure the spa is positioned with access to all side panels to access internal equipment. It is important that all side panels are not blocked.

Many people choose to install a decorative structure around their spa, if you are installing your spa with any type of structure on the outside, such as a gazebo, remember to allow access for service. We recommend designing surrounds for your spa that can easily be moved or lifted off the ground.

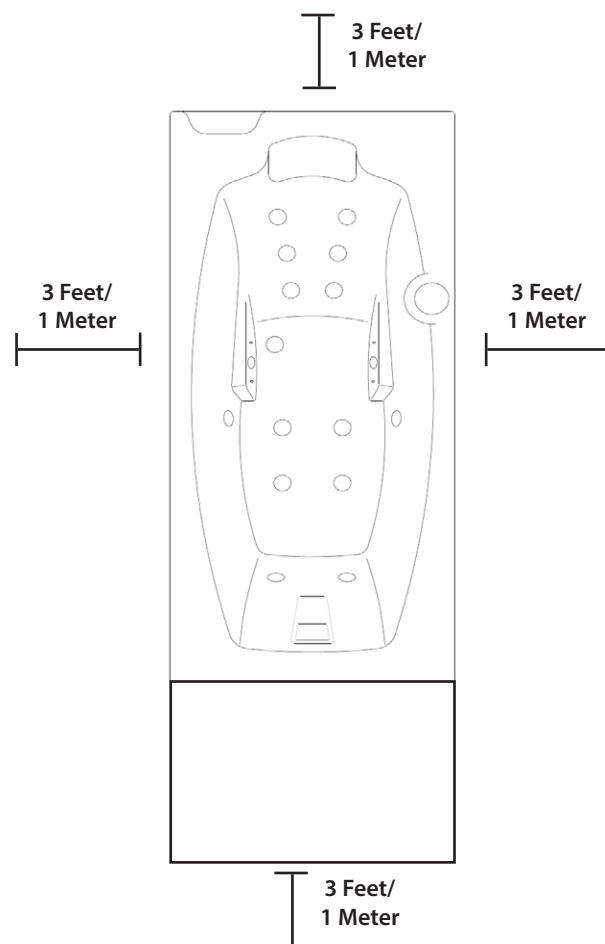
Clearance for Service Access

While you are planning where to locate your spa, you need to determine how much access you will need for service.

All spa models require a minimum of three feet (one meter), of access to all sides of the spa for potential service. For this reason, the spa should never be placed in a manner where any side is permanently blocked. Examples include placing the spa against a building, structural posts, columns, walls, fences, or raised embankments.

If the spa is surrounded by a deck, ensure that there is easy access for service or repair. Decks should have the ability to be accessed or removed easily, some decks are built in segments for easy removal.

Spas require access in all sides in case they need service or repair. Additional service costs can be applied by the servicing dealer if a crane or additional manpower and equipment is needed to access the internals of the spa.



Preparing a Good Foundation

Note: We strongly recommend that a qualified, licensed contractor prepare the foundation for your spa. Damage caused by an inadequate or improper foundation support is not covered by the warranty. It is the responsibility of the spa owner to provide a proper foundation.

The Chill Spa requires a 3-4 inch cement slab as a foundation to support the unit. The cement foundation must be level. Your spa needs a solid and level foundation, the area that it sits on must be able to support the weight of the spa, with water, and full weight of occupants accounted for. If the foundation is inadequate, it may shift or settle after the spa is in place, causing stress that can damage the spa shell and the spa finish. We recommend placing the spa on an elevated 3-4" concrete slab. Pavers, gravel, brick, sand, timbers, or dirt is not a suitable foundation. If you are installing a spa on an elevated wood deck, or other type of structure. Consult with a structural engineer or contractor to ensure the structure can support a weight of 150lb per square foot. If wood or other organic/inorganic porous material is used, it may lead to damage of the foundation, and harbor other issues including mold, rotting foundation, and algae. Cal Spas is not responsible for damages caused by condensation of the Chill Spa unit. Vinyl flooring and other synthetic materials placed on top of the concrete slab can be used at your own risk.

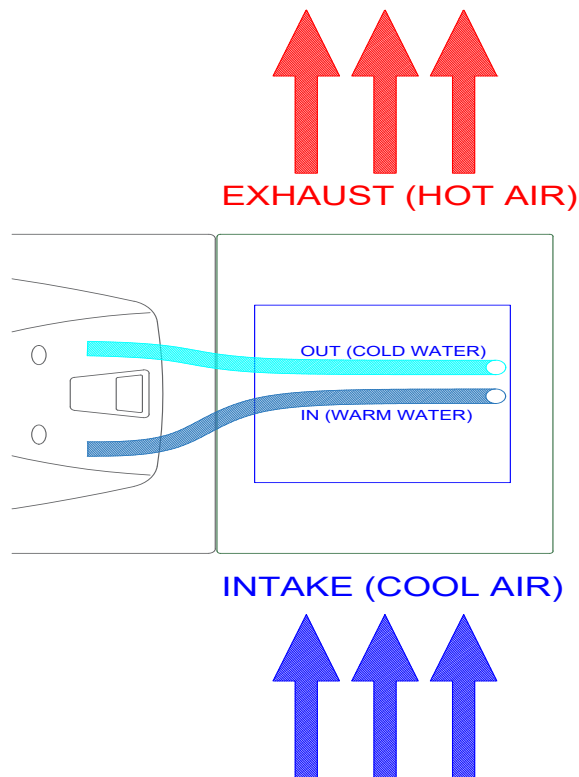
Never install a chill spa indoors, proper ventilation and evaporation of collected condensation must be available in order for the chill spa to operate properly. Installation of a Chill Spa inside an enclosed space will void your warranty.

When preparing to place your Chill Spa never place the Chill spa on any of its sides or upside down, the Chill Spa must remain in its original position. Obey all shipping labels and signs on the packaging of the Chill Spa. Refrigerant leaks can occur when the chill spa is not in its intended shipping/placement position. Failure to follow these requirements will void your warranty.

Chill Spa Rate of Cooling

The Chill Spa uses a water chiller to lower the water temperature within the Chill Spa. The chiller operates similarly to a HVAC system. The chiller operates efficiently when ambient temperature is at or below 90°F, when the ambient temperature is above 90°F the heat generated by the condenser has nowhere to go. This causes the cooling capability of the chiller to go down.

In optimal conditions the chill spa can bring room temperature water to 39°F within 8-10 hours. With Chill Spas that have heating capabilities, it takes about 3-4 hrs to heat up from room temperature to reach 104°F. When water within the chill spa is cooling from 104°F to 39°F, the expected waiting time can be anywhere between 8-16 hours. This figure varies based on ambient temperature, and ventilation.

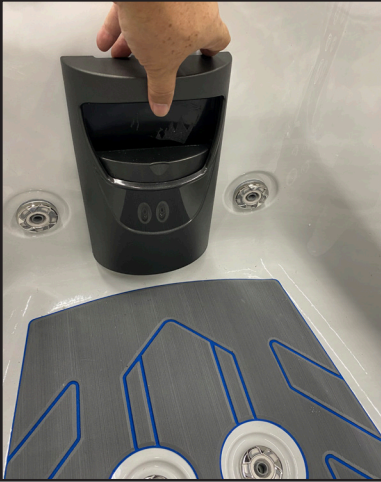


With any chiller or refrigeration system, when the ambient temperature is above a certain threshold, the heat generated by the refrigeration system has no where to go. This causes a problem where hot air is being used to cool down the unit when it is operating. When this occurs the water within the chill spa will still cool, but the rate of cooling is less than when the chill spa is operating in its ideal conditions below 90°F.

Note: If the Chill Spa is filled and activated during a heatwave or a sudden hot weather event, the rate of cooling will decrease exponentially, in some cases the lowest temperature the chiller can achieve during a heatwave can be around 45-55°F after continuous operation.

Note: The Chill Spa is designed to maintain the cold water within the spa, if heatwave conditions are occurring the chill spa will cool the fastest during the evening/night. The chill spa may take up to 24-36hrs to properly cool when it is first filled. In optimal conditions

Chill Spa Quick Start Guide



1. Remove Filter Skimmer.

Remove the Skimmer from the filter housing by gently pulling upward, this must be reinstalled after the spa has been filled up and primed.



2. Remove The Filter .

Once the skimmer is removed, the filter can be removed by holding the filter by the tab, turning counter-clockwise. Once the filter is removed, soak the filter in water for about 15 minutes before re-installation.



3. Filling the Chill Spa.

Preventing air-pockets in the plumbing is essential, for this reason insert the hose through the filter canister to prevent air pockets from forming. Failure to do so can cause damage to the refrigeration system.

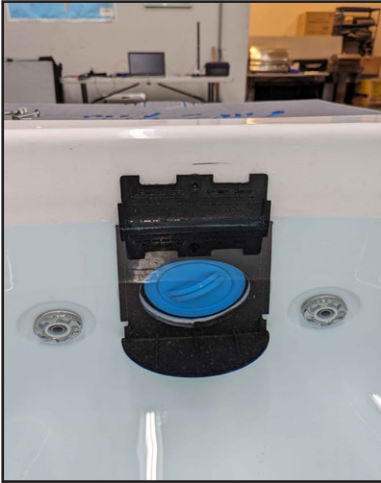
NOTE: Never fill your spa with soft water.

Soft water makes it impossible to maintain the proper water chemistry and may cause the water to foam, which will ultimately harm the finish of the spa and void your warranty.

You may fill your fill your spa with well water provided the following conditions are met: Have a Total Dissolved Solids (TDS) and metals test performed by a qualified person after the fill-up process but before any spa use

Note: Images are for illustration purposes only, images show similar procedures, for chill spas or spas with a vertical filter housing.

Chill Spa Quick Start Guide



4. Water level

Fill the spa up to 4-6" from the rim of the spa. Once the Chill Spa is filled reinstall the filter clockwise. **DO NOT OVER TORQUE/TIGHTEN** this can damage the filter housing over time. Once the filter is back in its place you can slide the skimmer back onto the filter housing. The skimmer slides into the filter housing with two sliding tabs on the top of the skimmer.

The water level will shift once a person enters the Chill Spa, adjust your water level based on the shift of the waterline once the unit is being used.



5. Connect the Chill Spa to power.

Using the supplied 15 amp GFCI plug, connect it to the outlet running from the dedicated 15 amp circuit. Once connected press the "jets" button to prime the internal pump.

Note: Images are for illustration purposes only, images show similar procedures, for chill spas or spas with a vertical filter housing.

Note: The Chill Spa uses a condensation drain hose to prevent moisture from collecting inside of the spa shell while in operation. Pooling of water is normal near this clear vinyl hose.

Note: Cal Spas is not liable for any damages caused by condensation generated by this unit, if foundation requirements are not followed. This includes wooden floor foundations, rubber composite, and synthetic turfs.

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InkBird Smart Control

The Patio Chill Spa is designed to be a fully wireless experience. The spa can be controlled and monitored anywhere using Wifi or mobile data.

With the InkBird app you can monitor and lower your chill spas temperature through the app.

QR Code Ink Bird Google Play.



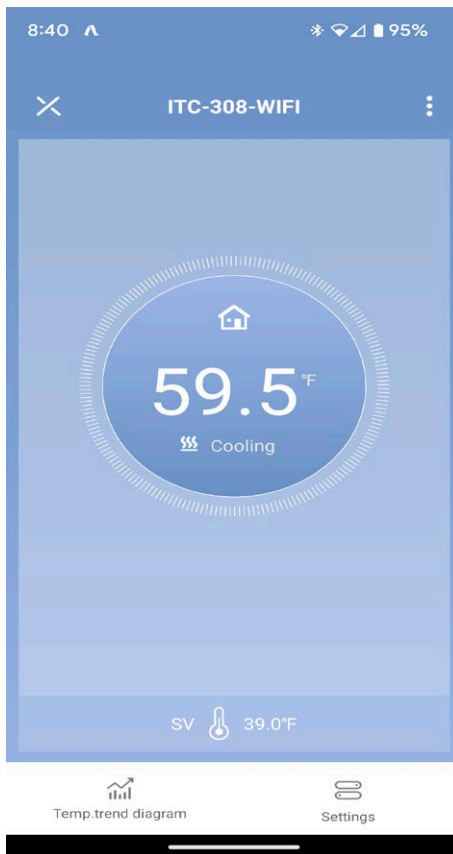
QR Code Ink Bird Apple App Store.



Download the app off of the App Store or the Google Play Store.

Insure that you are connected to your home Wifi network before opening the app for the first time.

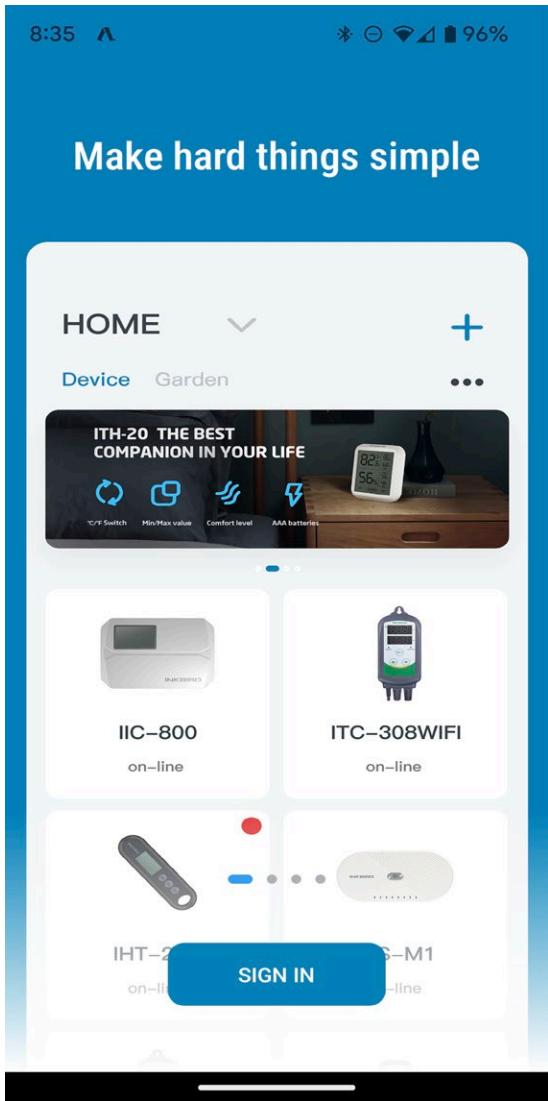
To begin the process of pairing the Wifi control, ensure that the chill spa is powered on.



Note: The Patio Chill Spa can only cool down, not raise in temperature. It is only designed to stay cold and within its selected range.

The Escape & Platinum versions offer a heat mode to raise water temperature up to 104F°

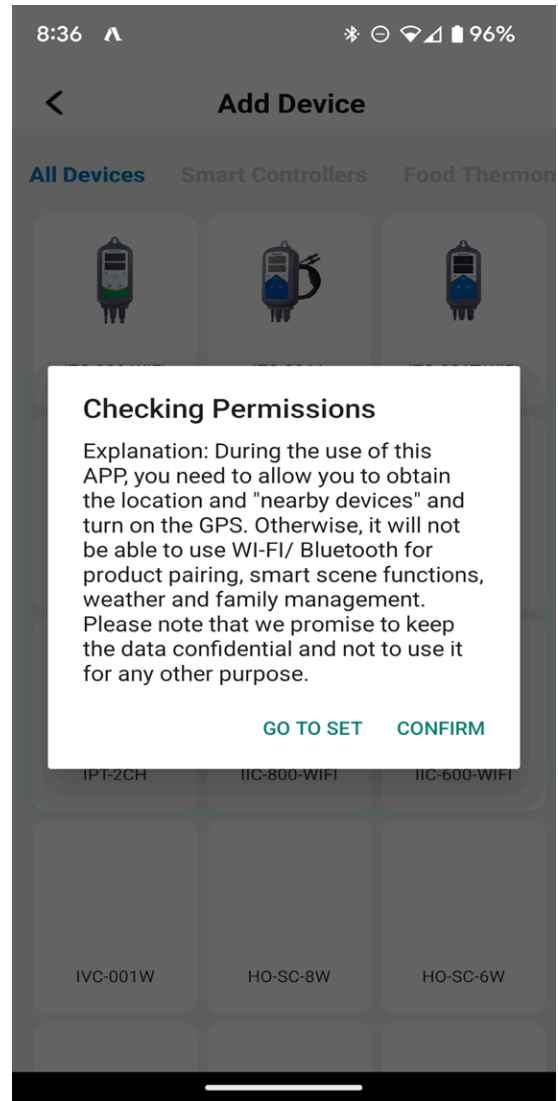
Wifi Control Initial Set Up



Once the app is launched you will be shown an example screen of the main page of the app.

Select "Sign In" as you will now make an account to control the device.

Depending on the device used you can create an account using your google information or using your current Apple ID for seamless registration.

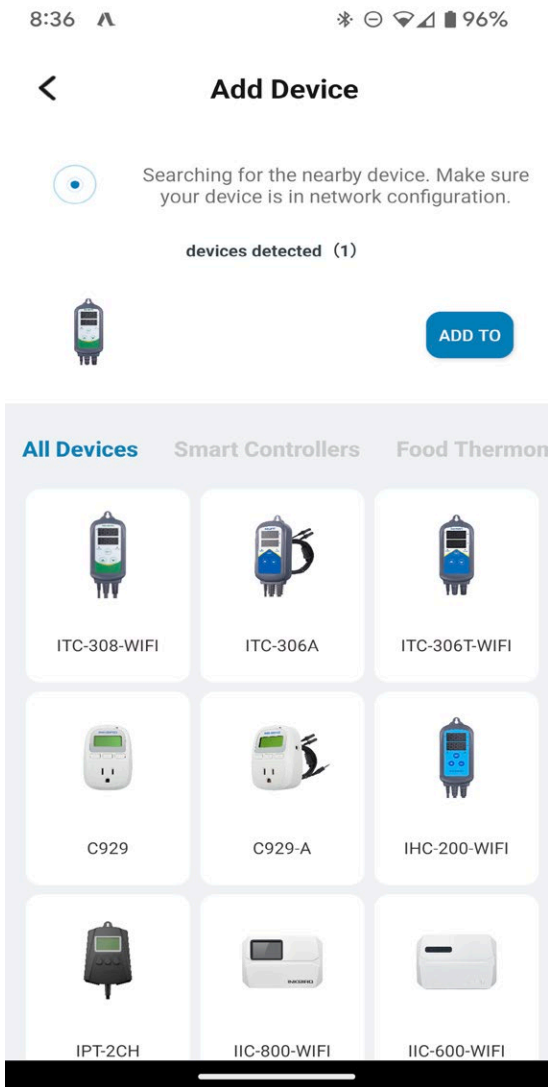


Once the app is launched you will be shown an example screen of the main page of the app.

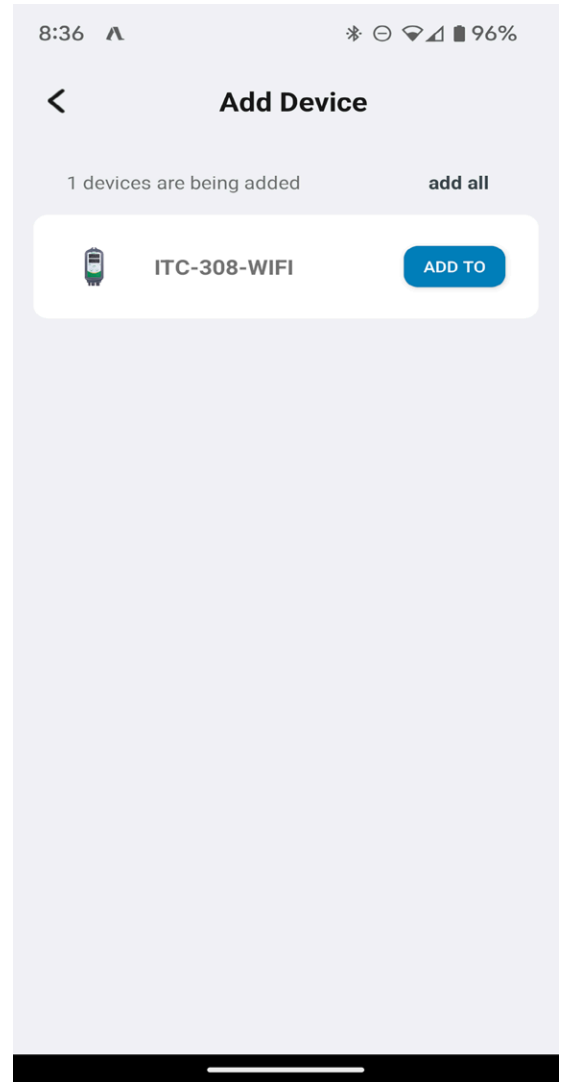
Select "Sign In" as you will now make an account to control the device.

Depending on the device used you can create an account using your google information or using your current Apple ID for seamless registration.

Wifi Control Initial Set Up



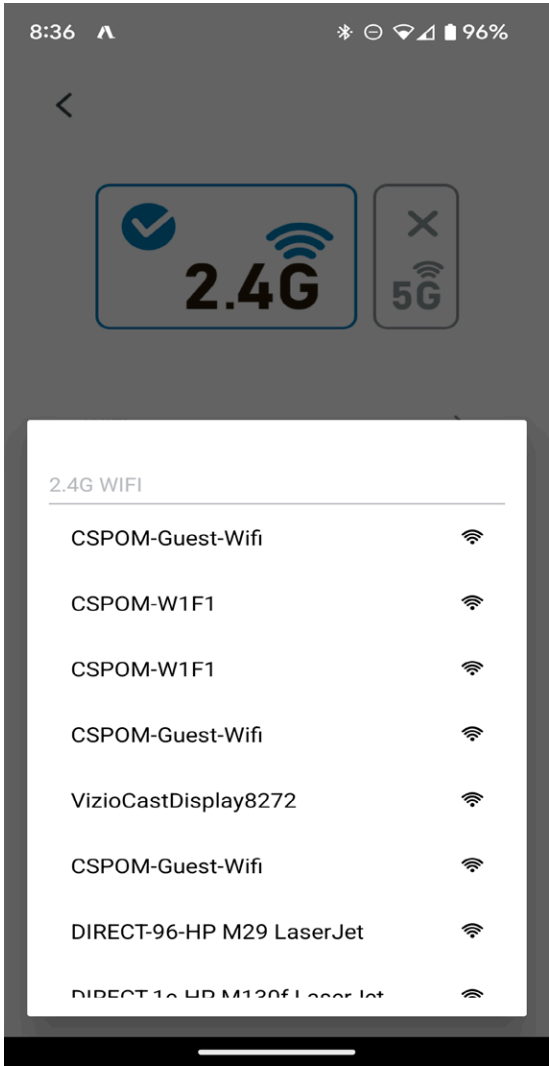
Selecting the “+” symbol on the main page. You can begin searching for new devices. Make sure that the chill spa is powered on and filled with water following the procedure mentioned on Pg 6



Once the device is discovered select “add to”. This will add it to your app controller.

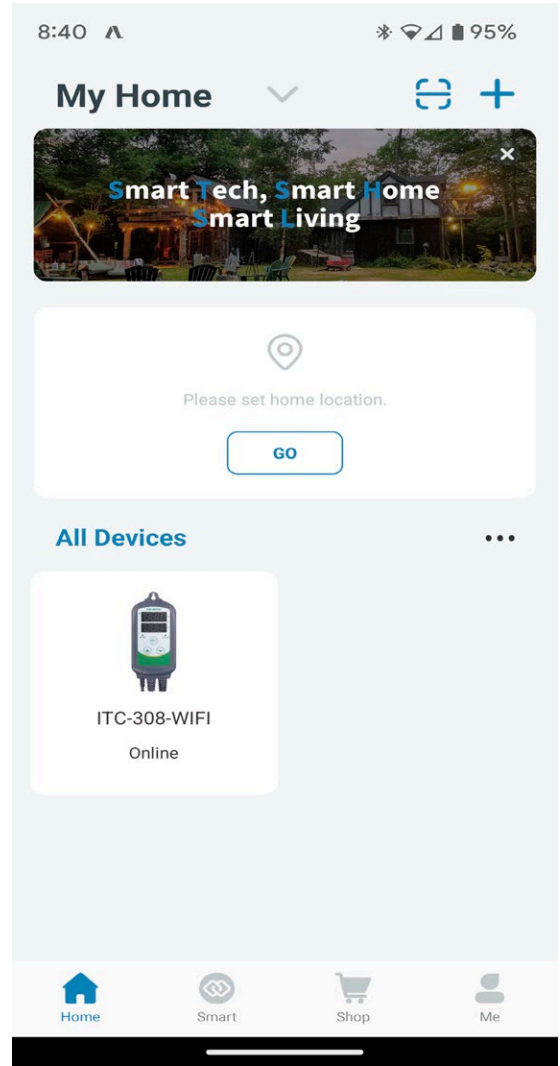
In the following screen you will be requested to select your main Wifi network and confirm the networks password.

Wifi Control Initial Set Up



Select the main wifi network used in the residence and enter the password of the network.

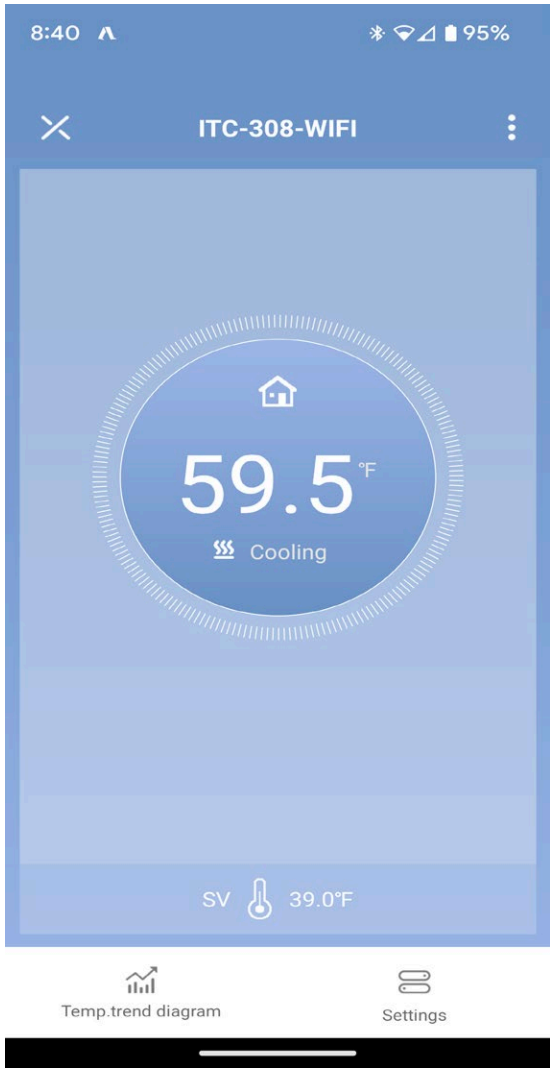
Note: The Wifi controller only functions on 2.4G signal, Most mesh routers will have initial discovery issues. Consult your ISP or vendor of your home router to determine if your mesh router can send both a 5g signal and a 2.4g signal.



Selecting the "+" symbol on the main page. You can begin searching for new devices. Make sure that the chill spa is powered on and filled with water following the procedure mentioned on Pg 10

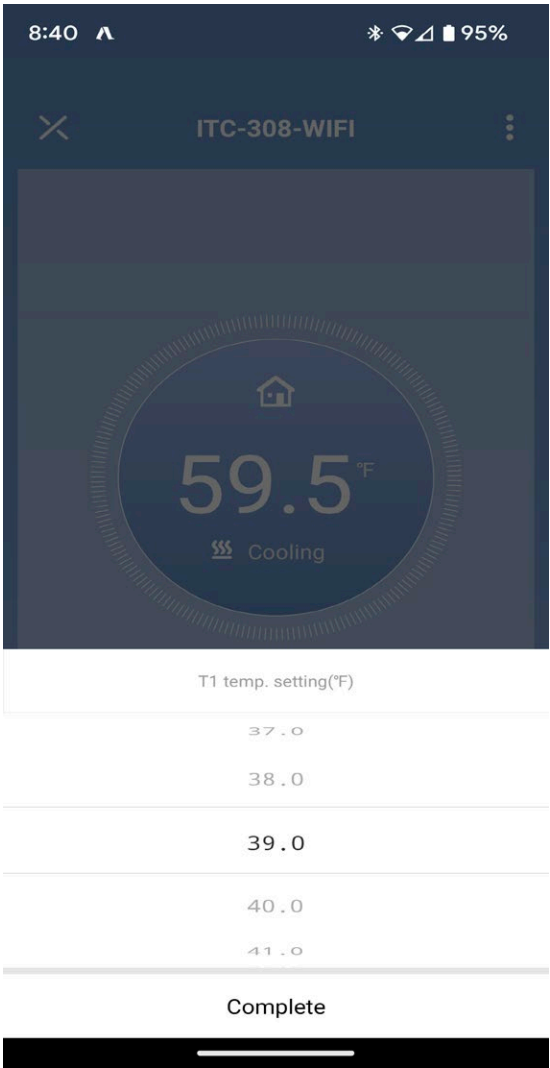
Once the device is found tap "add too" to add it to your app controller.

Set Preferred Cold Temperature



Once paired with the app you will be able to see the current set temperature of the Chill Spa.

Tapping the Highlighted section will bring up a temperature toggle and allow you to lower the temperature further to be ready for your next near ice cold water plunge.



Selecting the “+” symbol on the main page. You can begin searching for new devices. Make sure that the chill spa is powered on and filled with water.

Once the device is found tap “add too” to add it to your app controller.

Manual Temperature Selection



Remove the rear panel directly underneath the headrest area, you may use a #2 Philips head screwdriver or a power drill to remove.



Once the unit is removed use the inkbird temperature control unit and press and hold the set button



Select your lowest temperature, use the up or down arrows to adjust set point, the lowest the unit can support is 39°F. Once set press "set" to save the adjustment a HD will appear after a successful temperature adjustment.



Reinstall the rear panel. Starting from the upper center drill point.

Inkbird Wifi Troubleshooting

If issues occur during the pairing process of the Inkbird application on your smartphone. Ensure that the following conditions are met before pairing the device.

- Smartphone device is connected to the wifi network of choice.
- Bluetooth & Wifi are enabled within the phones settings.
- The Chill Spa is within 25 feet of the router or wifi beacon.

The following prerequisites must be met before attempting to pair the device. The Inkbird wifi controller uses the smartphone's Bluetooth network to transfer information of the wifi network to the Inkbird's memory. The Inkbird then uses the wifi network to complete its set up and communication with the smartphone device. This is why the smartphone needs to have both Bluetooth and Wifi turned on to communicate with the Inkbird.



Inkbird Wifi Reset

The Inkbird wifi module may require a reset if the module is not able to be discovered within the Inkbird app.

Note: The Inkbird operates on a 2.4GHz frequency.

To reset the Inkbird press and hold the ^ arrow for 2-3 seconds. Within the upper display on the top left corner a flashing red light will begin to appear, the Inkbird device is now in pairing mode. Proceed to follow the steps starting on page 13 once signed into your Inkbird account.

Additional Information

Filtration

The Chill Spa is equipped with a low amperage 24hr circulation pump. The spa will always be filtering at a low flow rate whenever the Chill Spa is not in use. The programming option for the spa will appear in the settings as FP1-FP4 but they will NOT apply for the Chill Spa

Condensation Drainage

The Chill Spa has an external drain for collected condensation from within the chiller. Accumulation of water near the drain, or the base of the spa is considered normal. The amount of collected condensation may vary based on ambient temperature and weather.



This section is intended for new spa owners who are not familiar with adjusting spa water chemistry. Everyone's knowledge with maintaining water quality is different, but there are some general concepts you need to know.

Water maintenance is not difficult, however it is something that requires regular attention. The most important thing to understand about taking care of your spa water, is that preventative action is easier than corrective action when balancing chemistry and maintaining water clarity

Before beginning, we recommend you become familiar with some water quality terms and their definitions within this following section.

1. Chemical Balancing

Learning how to properly balance your water.

You will need to test and adjust the chemical balance of your spa water, this is not a difficult task but it must be done regularly. Important areas to focus on with water chemistry is the calcium hardness, total alkalinity, and the pH range.

Regular water testing will ensure you know what is occurring in your spa waters chemistry.

3. Filtration

Learn how to properly clean your filter

Cleaning your filter cartridge is the easiest and most effective thing you can do to keep your spa water clear.

A clogged dirty filter will cause the heater and pump to work harder than they need to, possibly causing them to fail.

The spa's cooling system will only function with the proper amount of water flow through the system.

2. Sanitation and Shock

Learning how to properly sanitize and shock your spa.

Sanitizers kill bacteria and viruses and keeps your water clean. A low sanitizer level will allow microbes to grow quickly in the spa water . We recommend using either granulated chlorine or bromine as your sanitizer.

You also need to add shock to the water to stimulate the chemical sanitizer. How much you use and how often you use sanitizers, depends on how frequently the spa is used.

4. Consistency

Make checking your spa part of your daily routine.

Clear water requires regular maintenance. Establish a routine based on a regular schedule, testing your water on a daily basis.

Maintaining your water quality helps the enjoyment of your spa and extends the lifetime of spa components by preventing damage from neglect and chemical abuse.

Water Quality Terms and Definitions

The following chemical terms are used in this section. Understanding their meaning will help you to better understand clear water maintenance. Words in bold type are defined in this table.

Bromine / Bromamines	<p><u>Bromine</u> is an efficient sanitizer chemical for spas. When used as a sanitizer, bromine forms compounds called bromamines. Bromine can be added to the spa or automatically generated.</p> <p><u>Bromamines</u> are compounds formed when bromine combines with nitrogen from body oils, perspiration, etc. Unlike chloramines, bromamines have no pungent odor and are effective sanitizers.</p>
Chlorine / Chloramines	<p><u>Chlorine</u> is an efficient sanitizing chemical for spas. We recommend using sodium dichlor-type granulated chlorine because it is totally soluble and nearly pH neutral. When used as a sanitizer, chlorine forms compounds called chloramines.</p> <p><u>Chloramines</u> are compounds formed when chlorine combines with nitrogen from body oils, perspiration, etc. Chloramines can cause eye irritation as well as having a strong odor. Unlike bromamines, chloramines are weaker, slower sanitizers. To remove chloramines, see the description of shock below.</p>
Calcium Hardness	Abbreviated as CH. Calcium hardness is a measure of the total amount of dissolved calcium in the water. Calcium helps control the corrosive nature of the spa's water and is why soft water is not recommended. The low CH level can cause corrosion to the equipment and can cause staining of the spa shell.
Corrosion	The gradual wearing away of metal spa parts, usually caused by chemical action. Generally, corrosion is caused by low pH or by water with levels of TA, CH, pH or sanitizer which are outside the recommended ranges.
Dichlor	Also called sodium dichlor. It is a type of chlorine and is frequently used when shocking the water . An effective chlorine -based powdered oxidizer and sanitizer . Dichlor works by oxidizing waste product in the water such as bromamines and chloramines and causing them to burn off.
Monopersulphate or MPS	Frequently used when shocking the water . An effective non-chlorine-based powdered oxidizer that works well with both chlorine and bromine . It works by oxidizing waste product in the water such as bromamines and chloramines and causing them to burn off.
Oxidizer	Shocking the water with an oxidizing chemical prevents the buildup of contaminants, maximizes sanitizer efficiency, minimizes combined chlorine and improves water clarity.
Ozone	Ozone is a powerful oxidizing agent which is produced in nature and artificially. Ozone forms no by-products of chloramines (ozone actually oxidizes chloramines) and will not alter the water's pH .
pH	The pH level is the measure of the balance between acidity and alkalinity. Low pH causes the water to be too acid, which will cause corrosion , whereas high pH causes the water to be too alkaline, which will cause scaling . See page for testing for and balancing pH.
ppm	The abbreviation of "parts per million", the standard measurement of chemical concentration in water. Identical to mg/l (milligrams per liter).
Sanitizer	Sanitizer is a chemical added to the water to kill bacteria and viruses and keep the water clean. The two sanitizers we recommend are chlorine and bromine

Scale Rough calcium-bearing deposits that can coat spa surfaces, heaters, plumbing lines and clog filters. Generally, scaling is caused by mineral content combined with high **pH**. Additionally, scale forms more readily at higher water temperatures.

Shock Also called shocking the water, shock treatment, or superchlorination. Shocking the water is adding significant doses of **dichlor** or **MPS** to **oxidize** non-filterable organic waste and to remove **chloramines** and **bromamines**. Shock treatment breaks down organic waste contaminants which cause odor and cloudy water.

Total Alkalinity Abbreviated as TA. Total alkalinity is the measure of the total levels of carbonates, bicarbonates, hydroxides, and other alkaline substances in the water. TA is important for **pH** control. If the TA is too low, the **pH** will fluctuate out of control, and if it is too high, the **pH** becomes difficult to stabilize.

Trichlor Used as a pool **sanitizer**. NEVER use trichlor in a spa. Trichlor is extremely acidic and will lower the **pH**, causing corrosion to equipment. Using trichlor will void your warranty.

Water Testing Methods

There are two testing methods to choose from:

Test strips are a convenient testing method commonly used by spa owners.



The reagent test kit is a method which provides a high level of accuracy but is more expensive and more difficult to use if not experienced with this testing method.



Adding Chemicals to the Spa

IMPORTANT: All spa water chemicals, including MPS (Shock), chlorine, granulated pH increaser or de-creeaser, granulated total alkalinity increaser, calcium hardness increaser, liquid stain and scale inhibitor, and liquid de-foamer must always be added into or in front of the filter compartment while the primary jet is running for a minimum of 10 minutes.

- 1 - Fold back the cover.
- 2 - Carefully measure the recommended amount of chemical and slowly pour it into the spa. Use a small plastic paddle to disperse the chemicals into the patio chill spa. Care not to splash chemicals on your hands, clothes, eyes, or spa surface/siding
3. - Close the spa cover

Warning: High sanitizer levels can cause discomfort to the user's eyes, lungs, and skin. Always allow the sanitizer level to fall into the recommended range before using the spa.

IMPORTANT NOTE REGARDING SHOCK TREATMENT: After administering shock to your spa, leave the cover open for a minimum of 20 minutes to allow the oxidizer gas to vent into the atmosphere. A high concentration of trapped oxidizer gas which may exist as a result of the shock treatment (not daily sanitation) may eventually cause discoloration or vinyl degradation to the bottom of the cover. This type of damage is considered chemical abuse and is not covered under the terms of the limited warranty.

Balancing Water Chemistry Levels

Maintaining spa water chemistry can be tricky, especially since there are many methods of keeping your water clear and clean. Note: We do not recommend a specific brand of chemicals.

See a spa dealer for guidance and recommendations on spa chemicals and supplies needed, as water chemistry varies from region to region. Various chemicals often sold under brand names, but a spa dealer can advise you on generic chemicals that are often less expensive than proprietary brands.

Balancing the Total Alkalinity (TA)

Total Alkalinity is a measure of the total levels of carbonates, bicarbonates, hydroxides, and other alkaline substances in the water. TA is referred to as the water's "pH Buffer". In other words, it's a measure of the ability of spa water to resist chemical changes in the pH level.

If the TA is too low, the pH level will fluctuate widely from high to low. Fluctuations in pH level can cause corrosion or scaling of the spa components. Low TA can be corrected by adding sodium carbonate (pH/Alkalinity Up).

If the total Alkalinity is too high, the pH level will tend to be high, and may be difficult to bring down. It can be lowered by using sodium bisulfate (pH/Alkalinity Down).

Once the TA is balanced, it normally remains stable, although the addition of more water with a high or low alkalinity will raise or lower the TA reading of the water.

When the Total Alkalinity is within the recommended range, proceed to the next step.

Balancing the Calcium Hardness (CH)

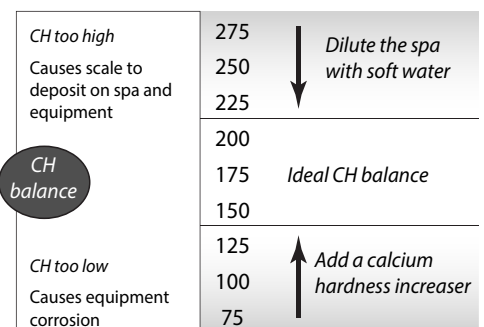
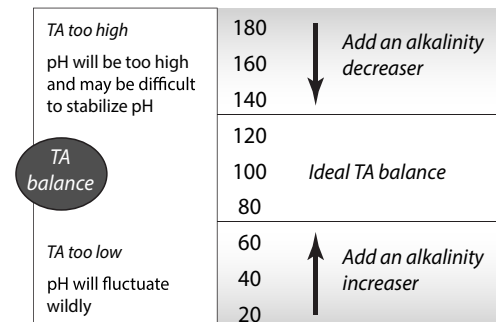
Calcium Hardness is a measure of the total amount of dissolved calcium in the water. Calcium helps control the corrosive nature of spa water, that's why Calcium - low water (Soft Water) is not recommended. It is very corrosive to the equipment and can cause stains in the spa shell.

If the CH is too high (Hard Water) formation of scale on the spa shell & surface can result. You can use a generic calcium remover to remove hardness from water. CH can also be decreased by dilution (75% Hard water, 25% Soft water) will usually yield a reading within the correct range. If soft water is not available or practical for you, a stain and scale inhibitor should be added to the spa water, according to label instructions.

If the CH is too low, add CH Increaser.

Once the CH is balanced, it normally remains stable, although the addition of more water with a high or low calcium content will raise or lower the CH reading of the water.

When the CH is within the recommended range, proceed to the next step.



Balancing the pH

The pH level is the measure of acidity and alkalinity. Values above 7.8 are alkaline; those below 7.2 are acidic. Maintaining the proper pH level is extremely important for optimizing the effectiveness of the sanitizer, maintaining water that is comfortable for the user, and preventing equipment deterioration.

If the spas water's pH level is too low, the following may result:

The sanitizer will dissipate rapidly

- The water may become irritating to spa users
- The spas equipment may corrode
- Bacteria and algae spikes can occur.

If the pH is too low it can be increased with sodium hydrogen carbonate (pH/Alkalinity Up) to the spa water.

If the pH level is too high, the following may result:

- The sanitizer is less effective
- Scale will form on the spa shell surface and equipment
- The water may become cloudy
- The filter cartridge may become obstructed.

If the pH is too high, it can be decreased by adding sodium bi-sulfate (pH/Alkalinity Down) to spa water.

Note: After adding sodium hydrogen carbonate or sodium bi-sulfate, wait two hours before testing the spa water again for pH. Compounds take time to fully dissolve into the spa water, initial reading may not be accurate

It's important to check the pH on a regular weekly basis. The pH will be affected by the bather load, the addition of new water, the addition of various chemicals, and other sanitizer used. When the pH is within the recommended range, proceed to begin the sanitation process.

pH too high Too alkaline, causes scaling	8.2	↓ Add a pH decreaser
	8.0	
pH balance	7.8	Ideal pH balance
	7.6	
pH too low Too acidic, causes corrosion	7.4	↑ Add a pH increaser
	7.2	
	7.0	
	6.8	
	6.6	

Sanitation and Shock

Sanitizers kill bacteria and other organic waste by breaking them down to non-harmful level which are filtered out. Before you fill your spa, you need to decide which chemical sanitizer you wish to use. Consult your Cal Spas dealer for the right decision with regards to your lifestyle and spa usage.

We recommend granulated chlorine or bromine as your sanitizer. Both work well when maintained regularly. DO NOT USE TABLETS OR COMPRESSED SANITIZERS. Use of these sanitizers will void your warranty.

Note: DO NOT USE Trichlor. Trichlor is very acidic and it will cause damage to your spa and will void your warranty.

Whichever chemical you decide to use, do not take shortcuts. It will provide you with clean, safe, clear, spa water with a minimum of effort. Spa owners with an ozonator still need to use a chemical sanitizer. Whenever you test chemical levels, your test strip will likely have a test for chlorine or bromine. Make sure your sanitizer falls within the range shown on the next page.

Whenever you test your chemical levels, your test strip will likely have a test for chlorine or bromine. Make sure your sanitizer falls within the range shown on the next page.

Starting & Maintaining Sanitizer Levels

After you choose a sanitizer, you will need to establish a baseline and maintain it regularly.

Sanitizing your spa with chlorine or bromine is very similar. Each sanitizer has its advantages and disadvantages. Sanitizer helps neutralize bacteria that can cause illness and other organic matter.

Bromine: Creates less odor and skin irritation than chlorine, bromine is less likely to do so. Additionally, unlike chlorine when bromine combines with bather waste and other contaminants in the water it remains an effective sanitizer. Bromine is also far less pH dependent than chlorine. Always remember that bromine itself is not a sanitizer, it needs to be activated with a bromine shock chemical in order to be effective, speak with your spa dealer for more information.

Chlorine: The most commonly recognized sanitizer is chlorine. However, the effectiveness of chlorine depends heavily on the pH level of the spa water. In order to get the most effective and economical benefit of chlorine, you must maintain a consistent pH level of between 7.2-7.6; a disadvantage of using chlorine is that when chlorine combines with bather waste and other contaminants, not only does it lose its sanitizing ability, it can cause odors and irritate eyes and skin to individuals with sensitive skin or prolonged spa exposure.

Testing For:	Ideal Range (ppm)	
	Minimum	Maximum
Chlorine Level	3.0 - 5.0	
Bromine Level	6.0 - 11.0	

Note: If you choose to use bromine or chlorine we do not recommend the use of a floater. You have more control over the sanitizer levels by adding sanitizer as needed. Chemical abuse will void your warranty.

Starting with fresh water/pre-filtered well water:

1. Establish a baseline by adding either granulated chlorine or bromine.
 - Use a quarter ounce of chlorine for every 250 gallons of water
 - Use half an ounce of bromine for every 100 gallons
2. Run the Jets for 10 minutes (Press/toggle the pump 1 button/icon)
3. Test the water, make sure the pH, TA, and CH levels all fall within the ranges shown in the previous pages, make adjustments as needed.
4. After balancing the water, if you are using bromine to sanitize your spa, you must activate your bromine. You will need to shock-oxidize the bromine inside of your spa. Depending on the size of your spa, usually you must add one to two ounces of shock, refer to the instructions inscribed in your chemical of choice.
5. Test the water again, when the water is balanced, your spa is ready to use.

Shocking the Water

In addition to using a chemical sanitizer, you will periodically need to shock the water. Shocking the water helps remove burned-out chemicals, bacteria, and other organic material from your spa's water and improves your sanitizer's effectiveness.

Do not use chlorinating shock, which can damage the spas jets and pump seals. Only use Oxidizer shock. It can be used with either bromine or chlorine sanitizers.

Add two ounces of oxidizer shock per 500 gallons once a week, after heavy bather loads, or if the water has a strong odor. The spa must be running with all of the jets on high for 30 minutes with the cover open. If necessary repeat the oxidizer shock in 30 minute intervals.

Filtration & Cleaning

The filter is the part of your spa that removes big and microscopic debris from the water to maximize your spas water clarity. Regular maintenance must be done to maximize the spas filtering performance and heat efficiency.

It is extremely important that you never run the spa without a filter, there is a possibility that debris may be sucked into the plumbing, damaging the spa pumps and heater.

Cleaning the Filter

In addition to spraying the filter down with a hose to remove surface debris, the filter must be deep cleaned every so often to dissolve scale and particles that are trapped within the pleats of the filter. Even if the filter looks clean, scale and other particles hide deep within the filter fibers restricting water flow. If the filter is not properly cleaned this will cause flow issues within the spa heater creating a heater malfunction. We recommend cleaning your filter at least once a month or every two weeks depending on spa usage.

Cleaning the filter

1. Remove the filter by unscrewing the filter counterclockwise from the top of the filter, do not use excessive force when removing or installing the filter.
2. Place the dirty filter into a bucket of water where the filter is completely submerged in water. Add the desired filter cleaner of choice, on average most manufactures recommend 8 ounces of chemical cleaner, verify the amount used on your chemical instructions.

Note: It is recommended to obtain a spare filter to use in the spa when performing maintenance on the dirty filters. This way you can rotate the filters and extend their lifespan.

3. Soak the filter for a minimum of 24hrs
4. Spray the filter with a water hose, with careful attention between filter pleats.
5. Reinstall the filter, Do not over-tighten.

UV Light Water Treatment

In some Cal Spa models an optional UV light could be purchased to assist in sanitizing your spa. The UV light is always operating in the background whenever the spa is powered on. This UV light assists the disinfection of your spa by breaking down viruses and bacteria that could linger in the spas water. The UV light works in tandem with your regular sanitation regiment.

General Water Care Schedule

Prior to each use	Test the spa water. Adjust chemical levels as necessary. Shock the water by adding ½ teaspoon of sodium dichlor per 250 gallons or 1 teaspoon of MPS per 250 gallons.
After each use	Add an ounce of oxidizer after heavy bather loads
Once a week	Check the filter well and inside the filter pipe for leaves and foreign matter. Test the spa water. Adjust chemical levels as necessary. Shock the water by adding ½ teaspoon of sodium per 250 gallons or 3 teaspoons of MPS per 250 gallons. If your water source is high in calcium, add stain and scale preventer.
Every two to four weeks	Deep clean your spa's filter. How often you clean your filter depends on how much you use your spa. There is no harm in frequently cleaning your filter and will only help your spa's efficiency.
Every two to four months	Change the spa water. How often you change the water depends on how much you use the spa. When you change the water, you will need to: <ul style="list-style-type: none"> • Clean and polish the acrylic surface • Clean and treat the spa cover and pillows • Deep clean the filter • Refill your spa
Each time you refill the spa	Follow the section "Filling and Powering Up Your Portable Spa"

Generic Names for Chemicals

Water Chemistry		
Common name	Usual chemical name	Common brand names
pH Up	sodium hydroxide	pH Increaser, pH Up, pH Plus, pH Booster
pH Down	sodium bisulfate sodium bicarbonate (baking soda) sodium carbonate	pH Decreaser, pH Down, pH Minus, pH Subtractor, Dry Acid
Alkalinity increaser	sodium carbonate sodium bicarbonate (baking soda)	Alkalinity Increaser, Alkaline Up
Alkalinity decreaser	sodium bisulfate	Alkalinity Decreaser, Alkaline Down
Calcium increaser	calcium chloride	Calcium Increaser, Calcium Up, Calcium Plus, Hardness Increaser
Calcium decreaser	N/A To decrease calcium hardness, drain several gallons of water from the spa and refill using a mixture of 75% hard water and 25% soft water, or use a stain and scale inhibitor.	

Sanitizers		
Common name	Usual chemical name	Common brand names
Chlorine	sodium dichlor	Both chlorine and bromine are available under numerous brand names
Bromine	sodium bromide	

Shock		
Common name	Usual chemical name	Common brand names
MPS	monopersulphate	MPS Shock, Oxy-Spa, SeaKlear
Dichlor	sodium dichlor	Dichlor Shock

Note: Dichlor (chlorine) is both a sanitizer and a shock. Monopersulphate (MPS), when used as a shock, can be purchased alone as non-chlorinated shock or combined with dichlor, which makes it significantly more effective than MPS alone.

Other chemical additives		
Common name	Usual chemical name	Common brand names
Stain and scale inhibitor	These are usually proprietary chemical formulations and cannot be purchased as a single generic chemical.	Metal Stain Gone, Scale Inhibitor, Stain and Scale Preventer, Stain and Scale Defense
Foam inhibitor		Foam Gone, Foam Down, Defoamer
Clarifier		Water Brite, Spa Bright, Water Clarifier, Clear Water, Natural Clarifier, Brite & Clear

Do NOT use these in your spa:

- Sodium hypochlorite (household bleach)
- Trichlor

Common Water Chemistry Questions

Question : Why is the use of a floater not recommended to sanitize my spa water?

Answer: We do not recommend the use of a floater for three reasons:

- The floater is unable to control the rate at which the sanitizer is dissolved into the water. When a floater is placed into a spa the sanitizer levels inside the spa can be extremely high. High sanitizer levels over a period of time will cause chemical burns and discolor the spa shell, jets, pillows, and spa cover underside. The use of floaters tends to lead to negligence of spa water sanitizer levels as well. Once the sanitizer is all dispensed and the floater is not checked daily, the low sanitizer level will allow viruses, algae and harmful bacteria like Legionella (Legionnaires disease) and E-Coli to grow.
- Floaters tend to stay in one area of the spa most of the time, causing this area to be exposed to extreme sanitizer levels. Most commonly a floater will become trapped near the filter weir or a seat, causing chemical damage to the section of the spa.
- The floater may allow small chunks or pieces of the concentrated sanitizer to fall out of its housing causing the chunks to settle at the bottom, causing pitting or chemical blisters to the spa shell. For this reason we advise you to use granulated chlorine or bromine as granulated sanitizers are designed for dissolve quickly inside of the spa with your jets activated. Chemical abuse is not covered under the terms of the limited warranty.

Question : When I open my spa, I smell chlorine. How to I get rid of the smell?

Answer: There are two types of chlorine in your spa. the first is "Free Chlorine" which is chlorine molecules that are available to sanitize your spa. This free chlorine does not have an odor. The second is chloramine, which is a byproduct of chlorine that has already been used/expended to sanitize. Chloramines generate the strong chlorine smell most spa owners experience. This can be eliminated by shocking your spa water, if you smell chlorine in the water, its time to shock.

Question: Why can't I fill my spa with soft water?

Answer: Soft water is essentially the same as regular water except in one regard that is important for spa chemistry and that is calcium levels. The calcium inside of the water has been replaced by sodium, which can be corrosive to heaters, pumps, and other plumbing equipment which will become expensive to replace. Calcium is needed for certain chemicals to properly function as well. Only use potable water that has not been treated with a water softener.

Question: I am concerned about the amount of chemicals my family is exposed to, do I really need to use as many chemicals in large amounts?

Answer: While there should be concern of over exposure to any chemical being unhealthy, spa chemicals when used correctly are designed to be effective and beneficial. In the case of spa water, the chemicals we recommend are important to protect the user from waterborne illness, including skin infections and disease causing pathogens, chemicals also help to prevent corrosion of spa components.

Question: Why isn't water chemistry damage (chemical abuse) covered under warranty?

Answer: The chemical levels and water quality of the water in the spa are directly under your control. With proper basic care the spa will provide many years of hot water relaxation. If you are unsure about water chemistry, reach out to your spa dealer.

Do's and Dont's

- Do use special care if using baking soda to clean either the interior or exterior plastic surfaces.
- DON'T use swimming pool muriatic acid to lower pH.
- Don't splash pH increaser additives on the siding.
- Don't Use compressed sanitizers, The use of bromine sticks or tablets in floaters may become trapped in a lounge or cooling seat, and in some cases sink to the bottom of the spa. This may cause discoloration or stress on the spa shell.
- Don't use a floater type sanitation system as a low or no maintenance solution to your spa maintenance. Floating dispensers can become trapped in one area and cause an over sanitation (or chemical burn) of the particular area, damaging acrylic, jets, and pillows. If the dispensers setting is too high, the higher concentration can also cause chemical burn damage throughout the spa. This kind of chemical damage can be done by both bromine and chlorine sanitizers.
- Don't use a sanitizer which was not designed for spas.
- Don't use household bleach (liquid sodium hyperchlorite).
- Don't broadcast or sprinkle the chemicals onto the water surface without mixing. This method can cause chemically induced blistering on the spa surface (chemical abuse). Use a plastic paddle or stirring rod to disperse chemicals through water movement.

Chemical Abuse

Chemical abuse is defined as negligent/careless use of both recommended spa chemicals, and use of prohibited chemicals. The spa shell is designed to last for many years, but when the shell is exposed to excessive chemicals, or improper chemical application; this can cause reactions on the shell that can cause pitting, cracks, bubbling, and other blemishes on the shell.

Spa jets, pillows, and other components are designed to withstand sanitizer levels within the range mentioned in this manual. Excessive sanitizer use will cause oxidation of the interior of the spas metals and other components, which can cause rust/oxidation of jets, deterioration of spa pillows, speakers and plastics, and damage/oxidation of the spa cover.

Components & materials damaged by chemical abuse are not covered under warranty. Depending on the extent of damage the entire spa warranty can be voided, as stated in the limited warranty.

It is important to mix/churn the Chill Spa water while adding chemicals to it, the Patio Chill Spa only has a low speed circulation pump for filtration & cooling purposes. Therefore unlike most of our spas

Cover and Locking System

Important! Keep the Chill Spa covered when not in use!

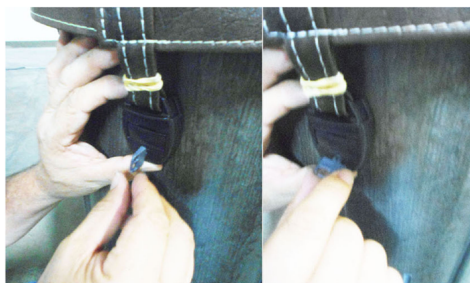
- Covered spas will use less electricity in maintaining your set temperature.
- Covering your spa will protect your spa's finish from the sun's ultraviolet rays.
- You are required to keep the spa covered to maintain warranty coverage.
- Covering your spa helps prevent children from drowning in the spa.

In addition, while the spa cover is rigid, it is not designed to support any weight. Therefore, as a safety precaution and to preserve the life of your cover, you must not sit, stand, or lie on it, nor should you place objects of any kind on top of it.



IMPORTANT! LOCKING HARDWARE ENCLOSED Parts Installation Instructions:

- 1.- Place cover on spa. Be sure it is correctly positioned.
- 2.- Position the tie-down hardware (attached to the straps of your cover) on the side of the spa so they are easily reached by the cover tie-downs straps.
- 3.- With the straps pulled taut (not overly tight) mark the location for screw placement.
- 4.- Attach hardware with the screws provided.
- 5.- Keep cover fastened down at all times when not in use. Locking hardware may be locked with a key (provided).



**UNLOCKED
POSITION**

**LOCKED
POSITION**



**WARNING
AVOID
DROWNING
RISK**

FAILURE TO FOLLOW INSTRUCTIONS MAY RESULT IN INJURY OR DROWNING
NON-SECURED OR IMPROPERLY SECURED COVERS ARE A HAZARD.
REMOVE COVER COMPLETELY BEFORE ENTRY OF BATHERS.
ENTRAPMENT POSSIBLE.
KEEP COVER ON SPA AND LOCKED WHEN NOT IN USE

Vacation Care

You can leave your Chill Spa unattended for up to two weeks if you follow these instructions.

ALWAYS lock your cover using the cover locks if you plan to be away from home and the spa is filled with water.

1. Select the Low Range temp choice 60-70 F
2. Adjust the pH.
3. Shock the water (either chlorine or bromine sanitizer).
4. When you return, check and adjust the pH and shock the water.

If you will not be using your Chill Spa for longer than 14 days and a spa maintenance service is not available, we strongly recommend you drain or winterize your spa.

Cleaning Your Chill Spa

Spa Cover and Pillows

Due to the constant punishment your spa cover and pillows receive, you should protect them by applying a vinyl and leather cleaner as part of your monthly maintenance plan. Use a product that is specifically designed to protect spa covers and pillows from chemical and ultraviolet light damage without leaving an oily residue behind that is normally associated with common automotive vinyl protectants.

Warning: Do not use automotive vinyl protectants on spa covers or pillows. These products are generally oil-based and will cause severe water clarity issues that are difficult to correct.

Spa Shell

Each time you drain your spa, before you refill it you should clean your spa shell with an all-purpose cleaner and apply a coat of surface protectant.

Use a low detergent, non-abrasive cleaner specifically formulated to clean the spa without damaging its acrylic finish.

Use a non-oil based surface protectant that is specifically formulated to protect the spa's finish from the chemicals and minerals associated with normal spa use.

Using the Freedom Sound System 2.0 *Option

The Freedom Sound System™ entertainment option contains a Bluetooth-enabled speaker system that is available for certain Cal Spa models. Any Bluetooth-enabled device can be used to play audio through your spa.

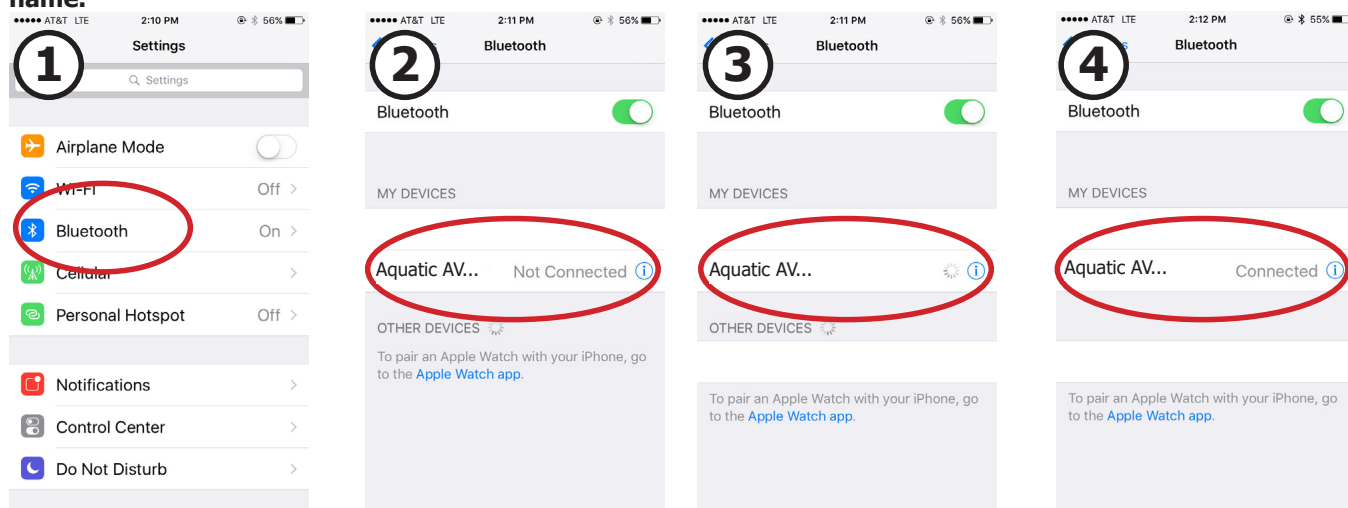
Before you can use the sound system, you need to pair the Bluetooth module with your device. The Bluetooth module is installed within the spa cabinet. Everything can be done with your device. The example shown below is from an iPhone device. Your device may appear differently. Before you begin, make sure Bluetooth is enabled on your device.

1. Select Bluetooth from your device's option list.
2. Select **AQUATIC AV...** from the list of available devices to pair.
3. Your iPhone device will ask for a code: the code is 0000.
4. Allow your device to pair with the spa's Bluetooth module.
5. When the devices have been connected, the device **AQUATIC AV...** will be

highlighted. Only one Bluetooth device can be paired with the Freedom Sound System™ at

any time.(For Android users, the systems will pair automatically - no code is needed.)

Once your device is paired and connected, all sounds from your device will be played through the sound system, including system sounds and telephone. **The sound system can also appear as SWA8-6BT, its factory default name.**



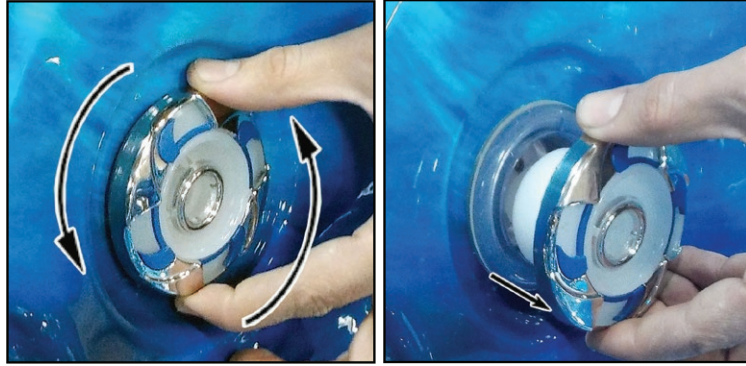
Jet Removal and Replacement

Jets can be easily removed for cleaning.

****Note: Images are for illustration purposes only, color and styles are subject to change**

Grasp the outer lip/rip of the jet and turn it counter-clockwise until it completely stops, you may feel the jet loosen and pop out a bit, pull the jet outward. The jet will be very snug and may require additional turning force to pop-out. **DO NOT PRY OUT JETS**

To replace the jet, place it in the fitting and turn clockwise until it click into place and can be rotated freely to open and close water flow again.



Note: have the jets turned off when removing jet inserts, it will be easier to remove when there is no water flow through it.

Winterizing (Cold Climate Draining)

In many areas in the country, during the winter ambient temperatures can fall below 32°F (0°C) we recommend that you always have your spa full of water and running at a higher than normal Chill Spa temperature (set chiller temp to 60°F or higher). In setting the chiller at a higher temperature, the water movement and heat generated from the circulation pump will prevent the water inside of the spa from freezing. Keep the lid of your chill spa closed during this climate.

Warning: If you find the need to drain your spa, be aware of the potential of freezing in your spas equipment and plumbing. Even if the directions below are followed perfectly, there is no guarantee that your spa will not suffer freeze damage. Freeze damage is not covered by your warranty.

1. Open all filter covers.
2. Remove the filter baskets and filters.
3. Drain your spa completely as described in the instructions above.
4. Vacuum water from the spa's main drain fitting with a wet/dry vacuum.
5. Open the bleeder valves on the pumps.
6. For spas with the UV lamp chamber mounted flat on the equipment floor:
Loosen the quartz tube nut at the top of the UV lamp chamber and pull up the quartz tube to let the water drain from the UV lamp chamber.
6. Disconnect the unions from both sides of the pump.
7. Blow any remaining water out of the jets and equipment area with the wet/dry vacuum.
8. When it has completely finished draining, replace the quartz tube in the UV lamp chamber and retighten the nut. Close the bleeder valves and re-connect the unions on the pumps. Replace the filter baskets and filters.
9. Cover your spa with a good spa cover and an all-weather tarp to ensure that neither rain nor snow enters the spa.

Preventing Freeze Damage

Winter Weather: The chill spa is designed to operate year round, the insulated chill spa is able to resist changes in ambient temperature in most climates. As long as the unit is running during the cold months of the year the spas internal pump will maintain steady water flow. To ensure the chill spa is prepared for a period of non-use, first rinse your filter with running water or use a filter cleaner if needed, reinstall the filter, sanitize and balance your spa water, and lastly secure the your spa cover over the chill spa to maintain spa temperature.

Winter Weather Care: Chill Spas have a unique risk of freezing, due to the genesis chill not having the ability to heat up. You can keep the spa operating at 39F or increase the temperature threshold to 50F, as the circulation pump will maintain flow in the plumbing system, preventing water from freezing inside of the cooling system and hoses.

Long Term Winter Storage: It is very important for the chill spa to maintain proper water movement/flow to prevent waterlines from freezing. If the spa needs to be stored away for an extended period of time during the winter, or if the spa exists in a region where power can be interrupted during periods of below freezing temperatures. The spa should be thoroughly drained using a shop vac (wet/dry) to suck out and blow out water within the spa lines. "Winterizing" your chill spa as damage resulting from winterization is not covered under warranty. The spa is designed to not freeze with proper water flow.

Lowering Compressor Activation: to prevent operation of the chiller during the winter or an extended period of time without use, you can raise your temperature, we would recommend to keep it around the 40-50F range to allow a faster cool down once you choose to use the chill spa again.

Draining Your Chill Spa

Your Chill Spa should be drained based on usage, a good rule of thumb is to drained and refilled when the spa water is cloudy or emitting an odor, even with proper chemical balancing you should drain the spa water after three to six months. **Before draining, power down the unit and remove the spa filter.**

1. Locate your drain.

For spas with cabinet-mounted drain

Pull the knob out of the cabinet. The cabinet drain is screwed into the drain pull knob.



2. Remove the cap.

Make sure the valve is in the closed position, then unscrew and remove the cap. Unscrew the cap.

For spas with cabinet-mounted drain



3. Connect valve to a garden hose.

Attach a garden hose to the hose-bib fixture. Place the other end of the garden hose where you would like the water to drain.

4. Drain the spa.

Turn the valve on the hose-bib fixture to open the drain. When the spa has drained completely, turn the valve on the hose-bib fixture, remove garden hose, and replace the cap.



Troubleshooting & Q and A

The Chill Spa has not gone down in temperture in over an hour: The Chill Spa's cooling system may require additonal programing. removal of the left side exhaust panel will be necessary to confirm the cooler is in the correct low temperture range. The use of a philips screwdriver or electric drill is needed.

- First set the chill spa to 39F, next remove the left exhaust side panel on the filter canister side.
- Remove the screws from the exhaust panel to access the water cooler.
- Press the "SET" button on the cooler, once the display lights up, use the down arrow to lower its maximum threshold to 39F
- Once the water cooler screen reads 39F press "SET" again. This gives permission to the watercooler to lower the water up to 39F. Close up the exhaust panel and close the insulated spa cover.

My Chill Spas water is cloudy: The chill spa is set to constantly filter, although the filter will absorb most of the contaminants this can occur once the water is saturated in contaminants or if the filter is dirty.

- First inspect the filter, and clean thoroughly with a spa filter cleaner. Following the instructions of the filter cleaning chemical as all procedures vary based on product used.
- Change the water inside of the Chill Spa and refill using tapwater filtered through a carbon spa prefilter.

Note: *The Chill Spa uses a small chiller using HVAC technology, it is not advised to repair or modify the chiller unit. If the Chill Spa runs into operation issues, contact your dealer for service or to file a warranty claim.*

LIMITED WARRANTY

This Limited Warranty is extended to the original purchaser of the spa produced by Lloyd's Material Supply company, Inc. Which Manufactures the Cal Spas brand portable spa manufactured after January 1st, 2025 and installed for residential use in the United States of America and Canada. This Warranty begins on the date of delivery of the spa, but in no event later than one year from the date of manufacture.

Chill Spas

Structural	Warrantied against spa shell collapse, leaks caused by the shell, or dangers of structural integrity due to defects in the spa shell.	10 Years
Shell Surface	Warrantied against spontaneous blistering, cracking, or delaminating of the interior spa shell.	7 Years
Equipment & Controls	Electrical Equipment- limited to spa pumps, standard heater, and control system/panels, are warrantied against malfunction due to defects in workmanship or materials.	5 Years
Plumbing	Warrantied against leaks/cracks due to defects in workmanship or materials	5 Years
Spa Cabinet	Warrantied against defects in workmanship or materials. Normal wear and weathering of the finish will occur naturally over time and are not defects.	5 Years
Sanitation	Salt cells & bromine generators are warrantied against defects in workmanship or materials, this includes sanitation control panels & electrical.	1 Year
Ozone/UV	Ozone Generators and UV treatment systems are warrantied against defects in workmanship and materials. (Excluding UV bulbs older than one year)	2 Years
LED Lighting	LED lights are warrantied against malfunction due to defects in workmanship and materials	2 Years
Sound System	The Freedom Sound System is warrantied against malfunction due to defects in workmanship and materials. This does not cover normal wear and tear.	1 Year
Spa Cover	The spa cover is warrantied against malfunction due to defects in workmanship and materials. This does not cover normal wear and tear.	3 Years

Warranty for Other Components

The fuses, headrests, cal grip, labels, and filters are warrantied to be free of defects in workmanship and material at the time of delivery. All other factory-installed components not mentioned specifically, including, but not limited to the wood frame, jets, diverter valves, filter lids, and other mechanical components, are warrantied against malfunction due to defects in workmanship and material for two years from the original date of delivery. This warranty is void if the spa has endured neglect, chemical abuse, or use of unapproved chemicals or components.

Structural

This limited warranty covers defects within the spas fiberglass structural shell. This includes sudden spa shell collapse, leaking through the shell, and separation between the spa shell and spa acrylic, caused by faulty bonding. This does not include separation due to micro-abrasions, pin holes in the shell, or warping/bubbling due to sun exposure. This limited warranty does not apply when abuse of the spa shell is evident. This includes but is not limited to, heavy impact craters, fractures on the spa surface due to poor spa care, sun exposure, or reckless use of the spa, and chemical abuse of the spa. This warranty does not cover damage caused by unlevelled ground. Spas must rest on level ground, ideally on a cement slab of 3-6" of thickness depending on the spa weight. Spas that are not placed on a leveled foundation are prone to cracks, delamination, and compromised structural rigidity of the spa. It is the responsibility of the spa owner to ensure that the spas foundation is leveled and inspected before placing the spa.

Shell Surface

This limited warranty covers defects on the spas acrylic surface due to workmanship or materials. This covers wrinkles on the acrylic, blistering, peeling, delamination, or spontaneous cracking. This warranty does not cover shell damage caused by chemical abuse, improper water chemistry, excessive sun exposure, micro-abrasions, or damage caused by impacts or sharp objects. This warranty does not cover discoloration, or deterioration of the spa shell when exposed to improper chemistry levels, hard water, soft water, or chemical abuse.

Equipment and Controls

This limited warranty covers malfunction of factory installed spa control systems, spa control panels, spa heater, and spa pumps due to defects in workmanship or materials. This covers sudden control box failure, malfunction of control panels or control boxes, malfunctioning heaters, and malfunctioning spa pumps. This warranty coverage is void if the electrical installation of the spa does not follow the outlined diagrams and specifications, mentioned in this manual. Failure to properly follow the specified GFCI requirements, wire type, wire thickness, compliance with NEC guidelines and local codes will void your warranty. This warranty does not cover acts of god or nature that can damage spa equipment, such examples are flooding, lighting strikes, wildfires, or other scenarios out of the control of the manufacturer.

Plumbing

This limited warranty covers leaking of water through plumbing joints, tees, hoses, water features, and jet body grommets due to defects in workmanship and materials. This warranty does not cover damage caused by chemical abuse, improper water chemistry, or use of unapproved chemicals/sanitizers. This warranty does not cover freeze damage caused by frozen water expanding within the plumbing of the spa. The winterization procedure within this manual does not guarantee freeze damage prevention. The best method to ensure the spa does not encounter frozen water within the plumbing is to have the spa operating during the colder months of the year. This warranty does not cover freeze damage or damage to the plumbing due to acts of god and/or nature including but not limited to snowstorms, blizzards, power outages, etc. This warranty does not cover oxidation or warping of jets due to chemical abuse or exposing an empty spa to the elements with no secured cover.

Spa Cabinet

This limited warranty covers defects in workmanship and materials of spa cabinet panels. This warranty applies for warping of spa panels, cracking of corners and panels without clear impact markers, and buckling of spa panels. This warranty does not cover natural wear and tear, which occurs with plastics exposed to the sun. This warranty does not cover panel damage from excessive heat sources, calcium/water-spot build up from sprinklers or irrigation systems, or impact damage. Each claim for spa cabinets are evaluated on a case by case basis, it is the responsibility of the spa owner to acknowledge environmental factors, that can affect the maintenance of the spas cabinet panels. Using plastic spa protectants can prolong the life of your spa panels is highly recommended in high UV index climates. Deterioration/fading of color, natural wear and tear of plastic materials is expected over time, and is not considered a defect in materials. This coverage does not extend nor cover acts of god or nature that can damage spa panels, such examples are flooding, high winds, wildfires, tornadoes or other scenarios out of the control of the manufacturer

Sanitation

This limited warranty covers malfunctions of factory installed Salt Systems and Bromine generators, which are warranted against malfunction due to defects in workmanship or materials. This includes the salt cell, sanitizer control panels, bromine generator, and power supplies for Cal Salt systems. This warranty does not cover negligent operation of sanitizer systems, chemical abuse, damage caused by improper water chemistry, or disregard of specified data points for safe operation; including but not limited to, incorrect ppm levels of salts, excess operating hours of the Cal Salt cell, or improper maintenance of sanitation components. The spa filter is not a part of this warranty, and is considered a disposable item subject to regular wear and tear.

Ozone/UV Systems

This limited warranty covers malfunctions of factory installed Ozone and/or UV water treatment systems. This includes leaks through welded components, water back-flow into the ozone generator, and short circuited Ozone or UV systems. This warranty does not cover UV bulbs that are older than 10 months, the UV light must be replaced every 10-12 months as this is normal wear and tear of component. This warranty is voided if alterations/modifications of these systems are evident, or if the spa electrical connections were not installed in accordance to defined specifications within this manual, evidence of chemical abuse, and acts of god and/or nature.

Sound System

This limited warranty covers malfunctions of factory installed sound system components. This includes the sub-woofer/amplifier, speakers, speaker grills, power supply, or Bluetooth antenna. Natural wear and tear of speaker cones is not covered by this warranty, nor are deterioration of speakers exposed to chemical abuse.

Spa Cover

The spa cover is warranted against defects of materials and workmanship for the defined period mentioned in this warranty. Exposure to UV rays on untreated or poorly maintained spa covers are not covered by this warranty. It is the responsibility of the spa owner to use spa UV plastic protectants on their spa covers, especially in high UV index climates. Exposure to UV light without proper treatment leads to problems such as cracking/peeling of vinyl covers, and sudden fading of color. This warranty does not warrant against damage caused by chemical abuse, nor yellowing or oxidation of the spa cover when exposed to excess sanitizer. If a defect is found within the first 90 days of ownership, your Cal Spas dealer and Cal Spas can directly assist the spa owner filing a claim and replacing the spa cover if deemed necessary. Spa owners with spa covers past the 90 day period that are discovered to have a defect, can contact your Cal Spa dealer to begin the process of filing a claim. When filing a claim of a spa cover than is older than 90 days, this warranty will cover the material cost of issuing a new vinyl sleeve for the cover, and/or replacement foam for your cover. Shipping/freight costs are not covered in this warranty, and are the sole responsibility of the spa owner. Images of the cover from all sides including the top and underside are necessary to file a claim.

Genuine Cal Spas Parts & Accessories

This Limited Warranty is void if Lloyd's Material Supply Company, Inc., Manufacturer of the Cal Spas brand or its designated representative determines that the spa has been subjected to damage or failure due to installation of aftermarket parts that are not genuine Cal Spas branded parts and accessories. This disclaimer includes, but is not limited to filters, UV bulbs, ozone systems, salt systems, replacement parts and other accessories. Genuine Cal Spas brand parts and accessories are built to our highest standards of quality, durability and performance, and they are designed to work with your spa to ensure optimal performance and function. Only parts/components approved by Cal Spas should be used when performing a warranty repair. If parts are required to complete a warranty claim, the cost of the parts are covered by this warranty. Approved labor and genuine part costs are covered when a warranty claim is approved, the cost of shipping parts/components is not covered by this warranty, and it is the sole responsibility of the spa owner.

Performance

This warranty begins on the date of delivery of the spa, but in no event later than one year from the date of manufacture. To obtain service in the event of a defect covered by this Limited Warranty, notify your Cal Spas dealer or Cal spas as soon as possible and use all reasonable means to protect the spa from further damage. Upon proof of purchase, a designated service representative will correct the defect subject to the terms and conditions contained in this Limited Warranty. There will be no charge for parts or Labor to repair the defect, although providing access to affect the repair is your responsibility as the spa owner. Freight charges for replacement parts is the responsibility of the spa owner. Parts and components can be shipped to the servicing dealer or to the customer. The servicing dealer may charge the owner a travel/service fee as well as a diagnose fee if the cause of the issue is unknown, these charges are not covered under warranty. Your spa dealer nor Cal Spas is responsible for damages or costs to rebuild decks, cement structures, or other decor/structures placed against the sides of the spa. Minimum clearance of 3 feet on each side is mandatory for all spas. In the event that the spa is removed to a repair facility for repair and reinstalled, the cost of removal and re-installation will be your responsibility as the spa owner. If Lloyd's Material Supply Company Inc., The manufacture of the Cal Spa brand determines that repair of the covered defect is not feasible, it reserves the right to provide a replacement spa of equal or lesser value to the original purchase price. In such an event reasonable costs for removal of the original spa, shipping costs from the factory for the replacement spa, and delivery and installation of the replacement spa will be the responsibility of the spa owner. The replacement spa will carry the balance of the original spa's warranty. Spa covers are not included. This warranty ends either by specified time frame, owner-transfer of the spa, relocation, or installation of any component other than by the manufacture. If the desired spa is more expensive than what the spa owner originally financed or paid for, the price difference shall be paid by the spa owner. Additional costs can be incurred if the use of heavy machinery such as a crane, bulldozer, etc, is considered necessary to access, remove, or perform a repair/correction to the affected spa.

Warranty limitations

This Limited Warranty is void if Cal Spas or its designated representative determines that the spa has been subjected to alteration, neglect, misuse or abuse, or freight damage caused by the common carrier; any repairs have been attempted by anyone other than a designated representative; or if the failure is caused by accident, acts of God or other causes beyond the control of the Manufacturer including acts of nature (damage caused by animals, rodents, or other pests) are not covered by this warranty. Additionally; the limited warranty is void for spas that were subject to neglect, misuse and abuse including any installation, operation or maintenance of the spa other than in accordance with the instructions contained in the owner's manual provided with the spa, including but not limited to the failure to maintain proper water chemistry, chemical balancing, the use of abrasives or improper cleaners, and the use of non-genuine parts and accessories. This Limited Warranty does not provide coverage for any item attached to or installed on the spa after the date of manufacture or for gaining access to any component for repair or replacement. Spa units in commercial use are excluded from any coverage whatsoever. The spa owner accepts liability for repair work performed by anyone other than Lloyd's Material Supply Company Inc, or a designated Cal Spas representative. This Limited Warranty is void if damage occurs to the spa shell because of excessive heat buildup due to failure to cover a spa that is empty of water while exposed to direct sunlight.

Proration of Warranty

Units determined by the manufacture to be non-repairable will be replaced on a prorated basis with the same or a comparable unit. The owner will be charged 1% of the current retail cost for each full month of ownership from the date of purchase through the date failure is determined to be non-repairable. This charge will be waived during the first 6 months of ownership. [example]: Product failure is determined during seven months of ownership. Owner will be responsible to pay for 7% of the products current cost. As the spa owner you have the choice to replace the spa, with a spa equal to or less than the value of the originally financed/purchased spa; if the desired replacement spa is of a higher cost than the originally financed/purchased spa, the spa owner will pay the difference of price, including any percent value lost over time through the spas proration period. The cost of shipping a new spa and its installation is not covered by this warranty as stated in the "Performance" section of this warranty.

Limitations

The manufacture disclaims all warranties, expressed or implied, in fact or in law, to the extent allowed by your State's law, including the warranty of merchantability and fitness for use, except as stated specifically herein. All warranty service must be performed by the manufacture or its designated representative using authorized Cal Spas parts. No agent, dealer, distributor, service company, or other party is authorized to change, modify, or extend the terms of this limited warranty in any manner whatsoever. The manufacture 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 Cal Spas. Extended warranties or care plans offered to you by a spa dealer is an agreement strictly between the spa owner and the spa dealer, out of the control of the manufacture of Cal Spas.

Disclaimers

Lloyd's Material Supply Company, Inc., Manufacture of Cal Spas brand and its representatives shall not be liable for any injury, loss, cost, or other damage whether incidental or consequential, arising out of any defect covered by this limited warranty, including without limitation, loss of use of the spa and cost for removal of defective produce even if the manufacture was advised of the possibility of damage. The liability of the manufacture under this limited warranty, if any shall not exceed the original amount paid for the defective product. Coverage under this limited warranty shall commence as of the original date of delivery and the duration of such coverage shall not extend for any reason whatsoever beyond the stated time periods. These disclaimers shall be equally applicable to any service provided by the manufacture and its designated representatives.

Legal Rights

This limited warranty gives you specific legal rights. You may also have other rights that vary from state to state depending on consumer regulations. Some states do not allow limitations on how long an implied warranty lasts, so this time limitation may not apply to you.

Additional Disclaimers

Spa owners who have purchased a Cal Spa, and the spas final resting place is not in the United States or Canada, Cal Spas will be able to send components and parts directly to the spa customer if the original Cal Spa dealer is not within range of the spa. It is the responsibility of the spa owner to find a experienced electrician, plumber, or technician to perform the necessary repairs. A preliminary over the phone technical meeting with a Cal Spas representative is necessary, to ensure the experienced laborer is familiar with the spas operation, and recommended repair methods. Labor costs of a repair in such circumstances must be first approved by a Cal Spas representative, before moving forward with any repairs covered in this warranty. It is advised to request a labor quote from said experienced laborer, and to send this quote to a Cal Spas representative. If all prerequisites are met and the repair is approved, Cal Spas will reimburse the cost of labor directly to the spa owner upon completion of repairs. Reimbursements of charged labor will be given as a written check to be delivered to the spa owners residence, with a varying estimated disbursement window.

For all repairs/warranty claims within the United States and Canada and other nations, may be required to send parts/components back to Cal Spas when deemed necessary. In some circumstance where shipping the component/part is necessary, Cal Spas will provide a shipping label to send the affected or requested components/parts. It is the responsibility of the spa owner to properly package and secure the package for shipping. In some circumstances only images and proof of purchase would be necessary to file a warranty claim, in such circumstances if a Cal Spas representative deems that the parts do not have to be returned, follow all local regulations and laws to properly dispose of said components.

Part Numbers

<p>2" Jet Insert: PLUCS2441009S-CDCL</p> <p>2" Jet Body/Housing: PLU21702560</p> 	<p>Filter Assembly With Weir: FIL11700322</p> 
	<p>Main LED Light: LIT16100333</p> 
<p>15 Sqft Filter: FIL11703155</p> 	<p>Calspas Carbon Fiber Finish Pillow: ACC01401102</p> 
	<p>Optional Item</p> <p>UV Sanitation System: LIT16000386</p> 

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Cal Spas[®]

SINCE 1978

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