

# **Prestige Pools Owners Manual**

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## Useful Websites

- [www.aquamaticcovers.com](http://www.aquamaticcovers.com)
- [www.cantar.com](http://www.cantar.com)
- [www.coverpools.com](http://www.coverpools.com)
- [www.goldlinecontrols.com](http://www.goldlinecontrols.com)
- [www.guardex.com](http://www.guardex.com)
- [www.haywardnet.com](http://www.haywardnet.com)
- [www.inter-fab.com](http://www.inter-fab.com)
- [www.nature2.com](http://www.nature2.com)
- [www.pentairpool.com](http://www.pentairpool.com)
- [www.polarispoolsystems.com](http://www.polarispoolsystems.com)
- [www.prestigepools.com](http://www.prestigepools.com)
- [www.raypak.com](http://www.raypak.com)
- [www.rockysrollers.com](http://www.rockysrollers.com)
- [www.srsmith.com](http://www.srsmith.com)

## What do I do now? – Pool Opening

It's that time again! Pool opening is a necessary part of owning a pool, one that can be trying if you don't know what to do next.

### Covers

If the pool has a **mesh winter cover**, read on:

- Remove as much of the debris that may have accumulated on top of the cover as possible. This will help speed up the clean-up and reduce the quantity of shock treatment required. After the cover has been removed, clean, dry and store it for use next fall. The pool will be over full from snow melt. That's OK! You can lower the water level down when you manually vacuum the pool to waste.

If the pool has an **automatic pool cover**, read on:

- As soon as the ice melts, pump off the cover completely **BEFORE YOU OPEN IT!!!**
- If you notice your cover sagging down more than it was in the fall, it is most likely due to the fact that the snow weight has displaced the melted pool ice up and out of the backs of the skimmers. If you find this to be the case, you will need to pump off excess cover water first, and then bring the pool water level up to operating level (2/3 of the way to the skimmer top) by placing your garden hose in the skimmer. Turn the hose on and **DON'T FORGET THAT IT'S RUNNING!**
- **IN EITHER CASE DO NOT OPERATE THE AUTO COVER UNTIL IT IS PUMPED OFF AND THE WATER LEVEL IS RAISED AS NECESSARY!**
- **DO NOT** turn on any electrical **pool** equipment until the pool is professionally opened. We do need the breakers to the equipment in the house to be on to start the pool.
- It is best to let the filter and equipment run continuously throughout the entire season, but especially during the initial clean-up phase. Be sure to **watch your filter pressure** and backwash as necessary. For those of you with a cartridge filter, it will be necessary to clean the filter elements more frequently in the beginning of the season. Brush the walls frequently – this does cloud the water but it is a necessary evil. Once the water has cleared up some, it is, of course, much easier to see where you are vacuuming.

- Most pools upon opening will show little or no free available chlorine and will require more than an initial shock treatment. The pool may, in fact, require several shock treatments in severe cases.

## Shocking the Pool

- Test the water first for chlorine. If there is little or no chlorine reading, shock the pool by adding **one pound per 10,000 gallons of pool water**. If you are not sure of your pool's volume give us a call. You may need to shock for several days in a row to establish a chlorine reading. It's OK to double up the dose as well. Always test first to avoid an overdose. Once your pool holds a chlorine reading overnight, you can begin "normal" chlorinating. Also, during this initial phase, the addition of 3" tabs to the skimmers or automatic chlorinator will help the pool to maintain chlorine. After the pool is cleaned up and the water is clear, you can begin testing and adjusting pH and alkalinity.
- Salt system owners, early in the spring, when the water temperatures are below 70 degrees the generator will not work at full capacity. You may need to shock the pool with granular chlorine or add a couple of the 3" tabs to the skimmer to achieve a chlorine reading. Once the water temperature is above 70 degrees, the generator will start working at full capacity.
- **If you have added a lot of hose water to the pool** to bring the water level up to operating level, you will want to wait a few days before heavily shocking the pool. There may be minerals present in your source water, which will oxidize with the addition of chlorine, turning your pool a brown color. Let the minerals filter out for a few days and call about a mineral sequestering agent, to help the filter pick up mineral particles.

It's very important to keep after the pool once it is opened and do it in a timely manner. Don't schedule your opening if you won't be able to attend to the pool and the filter.

## Summary

- Remove cover
- Open pool (call ahead for your appointment)
- Brush walls down and vacuum pool
- Test water – shock pool as often as necessary to establish chlorine reading
- Keep filter clean

Now you can begin weekly maintenance. Bring a quart of water to the shop after the water is about 70 degrees or more. We will help you balance your pool water

and give you further instructions as you need them. Make sure you at-home water testing supplies are fresh from year to year to help assure accurate results.

Remember: **WE OFFER FREE DELIVERY** in the Metro area (\$50.00 minimum).

If there is anything you need – information, chemicals, service help – that's what we're here for and we want you to love your pool.

Here's to another great summer!

Thank you for your business.

-Prestige Pools Staff-

## How to Vacuum Your Really Dirty Pool with a Cartridge Filter (This lowers your pool water)

1. Set up your vacuum equipment. Fill the long coily vacuum hose with pool water (You can use a return line to fill the hose). When you are all ready, turn off the pump.
2. Put a winterizing plug into your Polaris line or close your Polaris valve (the one with the blue handle that you're never supposed to close!)
3. Close your return lines, skimmer lines, and main drain lines. ALL LINES ARE CLOSED.
4. Remove your filter elements. Put the filter top back on.
5. Attach your blue backwash hose – roll it out flat. Open the discharge valve at the bottom of the filter
6. Open the skimmer valve you are using.
7. Adjust main drain valve as necessary – about half way open.
8. Start the system – vacuum the big stuff. Watch the water level. It will fall rapidly. You may want to overfill the pool before you begin. Do not let the water level fall below mid-skimmer while you are vacuuming. Don't forget to re-fill pool to swimming level when you are finished.
9. Shut off the pool and do the following:
  - a. Reinstall the filter cartridges when you are finished vacuuming.
  - b. Remove blue backwash hose and roll it up.
  - c. Close bottom drain valve on filter.
10. Turn the system back on. Immediately readjust all your valves to normal operating positions. Remove plug from Polaris line or open the blue-handled valve to it if you closed it before operating your automatic cleaner.

## **How to Vacuum Your Not So Dirty Pool with a Cartridge Filter (this does not lower your pool water)**

1. Set up your vacuum equipment. Fill the long coily vac hose with pool water. (You can use a return line to fill the hose).
2. Close the skimmer valve for the skimmer you are NOT using.
3. Close the main drain valve ½ way – use the main drain valve to adjust the amount of suction you are getting at your vac head.
4. You are now vacuuming through the filter. The dirt you are vacuuming out of the pool is going directly into the filter and is being collected by the pleated paper elements inside the filter.
5. When you are done vacuuming, remove the filter elements and clean them thoroughly.
6. Re-open all valves for proper circulation.

## How to Lower Your Water Level if You Have a Cartridge Filter

### With Pool Running

1. Roll out blue backwash hose so it is straight and flat.
2. Attach backwash hose to bottom of filter. Open valve on bottom of filter and check backwash hose for kinks.
3. Close skimmer valves (if lowering water below skimmers) keeping the main drain valve open all the way.
4. Adjust flow to return valves to create back pressure. To drain the quickest, close the return valves all the way.
5. Drain pool to desired level. **Do not leave unattended.** When finished draining, open return valves completely.
6. Close bottom drain valve on filter and roll up backwash hose.
7. Pool is running normally. If preparing for the professional pool closing, keep the skimmer valves closed, and run the pool as normal. The water will pour out the returns or the eyeballs down into the pool.

# The Hayward SwimClear Cartridge Filter

## FILTRATION

**Please remember: Pure, clear swimming pool water is a result of 3 factors: filtration, circulation, and water balance. One without the others will not give you the results you are expecting.**

Your filtration system is designed for continuous operation. We at Prestige Pools recommend that you leave your pool running 24 hours a day, 7 days a week. Turn it on in the spring; shut it off in the fall, unless, of course, you are performing your routine chores.

### Understanding Filtration

If your system is “on” and water is flowing, your filter is filtering. The 4 pleated paper elements inside the filter remove dirt from the pool water. As the dirt accumulates in the pleats, it causes a resistance to flow. This will be indicated by the pressure gauge located on top of the filter. When pressure raises 3 to 5 P.S.I. over your normal operating pressure, it's time to clean your filter elements. Other indications besides the pressure gauge that you need to clean your elements are:

1. Hazy pool water (unless your chlorine is low – test the water with your at-home test kit. If the chlorine is low, super chlorinate or shock the pool.)
2. Reduced return flow – put your hand in front of a return fitting at the pool wall. Kneel down and feel the flow from the “eyeballs”. If your hand is NOT pushed away by this return flow, it means that your filter elements are dirty and it's time to clean them.

Get a feel for your pool's normal clean filter return flow at the pool wall. If you check it occasionally and the return flow feels diminished or lessened, check your filter elements!

Another sign that your filter elements need to be cleaned is indicated by a heater that won't fire and run. This means that the pressure is caught in the filter tank and there is not enough flow to the heater to kick it over.

If you experience a 0 P.S.I. reading or very low filter pressure reading at the pressure gauge (located on top of your filter), this indicates that your pump pot basket probably needs cleaning. It's a good idea to check this basket at least once a week to keep all the pool water flowing at its maximum. Also, check the skimmer baskets (located under the square deck plates with the finger hole in the middle). Clean these baskets as often as necessary to keep them empty. Be especially mindful of these baskets during heavy leaf times or after a heavy rainfall if there is a lot of debris in the pool. If they are clogged with stuff, the

water can't flow properly (circulation) and therefore can't be filtered properly, which then makes your chemicals work overtime which results in a loss of chlorine reading. This will ALWAYS result in a cloudy pool.

## Summary

1. Check filter pressure gauge on top of filter. If pressure is increased, clean the filter elements.
2. Check return flow at the pool wall return eyeballs. If pressure is less than you think it is when the filter is clean, the dirt in the filter is restricting water flow, the pressure is caught in the tank (indicated by increased pressure on the gauge), and can't get back to the pool (diminished return flow).
3. Clean skimmer baskets often. You can bet that if they are full of leaves or debris that some of this has found it's way through the system and to the pump pot basket as well.
4. Clean the pump pot basket. Secure the lid and O-ring after cleaning. If there are air bubbles coming back to the pool through the return fittings, it means that the O-ring is probably improperly situated or the lid needs adjusting on the pump pot. You may also need a small amount of lubricant on the lid. NEVER use Vaseline – only Magic Lube. You may also need to “bleed” air out of the filter tank.

Consult your manufacturer's owner's manual for proper cartridge (filter element) cleaning instructions.

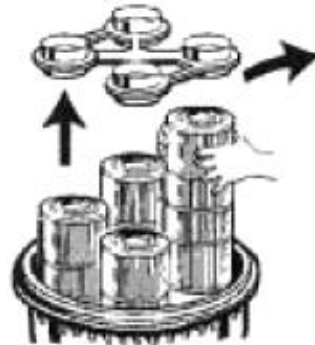
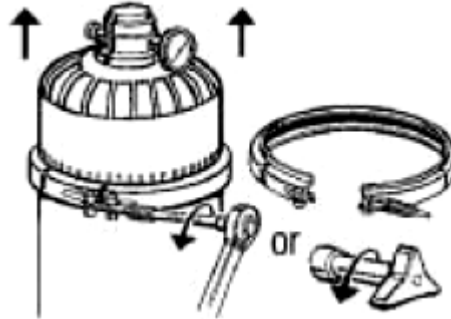
5. Many people choose to purchase an extra set of filter elements purely as a matter of convenience. Boy is it convenient!!! The elements are easier to clean when they are dry. NEVER use soap products to clean the elements.

## Proper Filter Disassembly and Assembly

To ensure proper seal of your filter, please follow the instructions below. Improper installation and assembly of the O-ring and clamp may cause leakage. Also, improper installation of top closure plate (the top manifold which holds the filters in place) will not allow pool water to filter as it should.

### Disassembly of Filter Tank:

1. Use a 9/16 socket wrench to loosen and remove clamp sleeve nut. Place clamp assembly out of the way. Remove filter head, exposing dirty filter cartridges.
2. To remove cartridges, first lift off top closure plate (the top manifold which holds the filters in place). Remove cartridges from bottom manifold by using a slight rocking motion and lifting up.
3. You can now clean the cartridges by spraying off collected debris with a garden hose. Using a product such as Guardex Filter Cartridge Spray will give the cartridges a deeper clean. For best results, or when filter pressure rises quickly upon restarting, soak cartridges in GLB Filter Cleanse. You will probably want to soak the filters 1-2 times a season.
4. Keeping an extra set of cartridges on hand is a good idea. This will allow you to clean your dirty filters at your convenience.



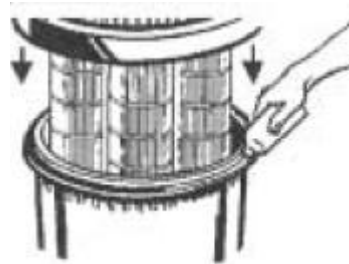
### **Reassembly of Filter Tank:**

1. Carefully replace cartridges over hubs on bottom manifold. Place top closure plate (top manifold) securely into top of cartridge. If the top manifold is NOT on snug tight, it is upside-down and will not filter properly.

**Note: Be sure top manifold is replaced correctly and pushed firmly into cartridge element tops.**



2. To reinstall tank head, clean and lightly lubricate Tank O-ring with Magic Lube and carefully place over Filter Body Lip. Lift Filter Head over cartridges and press down firmly to evenly place Filter Head in place.
3. Re-position clamp assembly. Make sure clamp is located and centered properly over the filter flange. Set the sleeve nut assembly, which includes the spring, two washers (small and large hole) and the brass sleeve nut.
4. Insert threaded bolt through retainer and use a 9/16 deep socket wrench to make sure the clamp is tightened firmly and evenly until spring coils touch each other.



# The Hayward Super Pump

## CIRCULATION

The pump is what makes the water circulate. Remember: Filtration, Circulation and Water Balance!! Leave the pump on continuously.

### Priming the Pump

1. If you have lost prime, the system should be shut off immediately. NEVER open the pump when it's running.
2. Remove the lid.
3. Clean the basket.
4. Fill strainer/housing with water from the garden hose. Make sure ALL valves (suction and return, auto cleaner if applicable) are OPEN. NEVER operate the pump without water.
5. Inspect the lid O-ring, lubricate and replace it as it wears out.
6. Put the lid back on. You will get a better seal with the lubricant than you will with muscle power.
7. Turn on the power and wait for the pump to prime, which may take up to 5 minutes.

The Hayward Super Pump is a self-priming pump. Pool equipment is almost always (if possible) installed level with or slightly below the level of the pool water. It is easy to make water run downhill, but much more difficult to draw it up a hill!

### Troubleshooting

1. If motor hums but will not start, it's possibly a clogged impeller. Call the shop. Hair and leaves etc. can jam the part of the pump that pushes the water.
2. Pump will not prime – you probably need to empty the pump pot basket and check the skimmer baskets. Also, check the O-ring on the pump pot lid. It may need a small amount of lubricant. The pump will not prime if there are air leaks. Fill housing with water and proceed.

3. Low Flow – again, empty all baskets and clean them. This might also be a time when the flow is low because the filter is dirty. Clean the elements. This low flow situation can also cause your heater to not fire up and run.

Side Note: Your pool filter pump must be running whenever you turn the motor on for your automatic cleaner.

Side Note: Once you and your pump are on a friendly first name basis, you will get to know its noise level. If you notice a change in its operating sound, help it out. Clean baskets, etc.

4. Pool water level – ALWAYS maintain proper pool water level. At least mid-skimmer or a little bit fuller. The pool CANNOT operate properly if the water level is too low or too high.

## Chlorine Generator: Salt System

The Aqua Rite system uses salt in the water to sanitize the pool water. To ensure that the system works correctly, there are specific parameters that the water chemistry needs to be maintained at. Follow previous instructions on water chemistry which can also be found later in the manual. In addition to those levels, the salt level must be maintained at 2700 ppm – 3400 ppm. This level can be tested at the store or with the salt test kit provided to you with the pool. The Aqua Rite control panel also provides a read out of the salt level in the pool, but it is important to verify this periodically with tests in the store or with the salt test kit provided to you.

If the salt level drops below 2700 ppm, the generator will not produce chlorine and the “check salt level” indicator light will illuminate on the control panel. **Test the salt level before adding any salt to the water.**

It is also necessary to maintain your stabilizer level at 80 ppm. This can be checked for you in the store. This level is important to keep the UV rays from the sun from burning off the chemicals in the pool. This level can be increased by using pool conditioner which is a dry chemical introduced into the pool by putting it in a sock or nylon, tying the top, and placing it in the skimmer basket.

Other indicator lights will illuminate periodically to let you know if there are any problems. The “check cell” indicator light will flash after 500 hours of use. When this indicator light flashes it is necessary to shut the system down and check the plates in the cell to ensure that they are free of calcification and is working properly. If the plates are clean, put the cell back on and start the system back up. When the system reboots, hold the diagnostics button for three seconds to turn off the “check cell” indicator light. If the plates in the cell have buildup on them, it is necessary to clean the cell prior to reinstalling it.

To clean the cell, mix one part muriatic acid to four parts water in a bucket. Put the water in the bucket first and then mix the muriatic acid in. Unscrew the unions to detach the cell and remove the cord from the controls. Put the cell into the bucket with the solution leaving the cord hanging out of the bucket. Soak the cell for 15 minutes and then remove it and rinse it. Reinstall the cell into the system and hold the diagnostics button for three seconds to turn off the indicator light.

If any other indicator lights are flashing, call the shop to troubleshoot.

## Water Balance

This is the third part of clean, clear pool water. Please read the sections on filtration and circulation if you have not done so already.

### Automatic Chlorinator

Your pool is equipped with an automatic chlorinator. This device should really be called an automatic chlorine dispenser. It does not “sense” when your pool needs chlorine. It’s up to you to keep it filled and set the dial valve. As you set the dial to larger numbers, the amount of chlorine dispensed increases. The amount of chlorine a pool needs varies with the amount of use, sunlight, heated water temperature, rain, number of swimmers, etc. Increases in any of these factors cause your pool to “need” more chlorine for the water to remain clear and clean.

You will have to test the water, experiment with the dial setting for more or less chlorine, and get to know your pool. To start, put about 8 large 3” chlorine tablets in the dispenser and set the dial to 3 (If there is a mineral presence in your source water, wait until the water has filtered for several days, introducing chlorine much more gradually during this time period). Remember this is a whole new body of hose water ranging anywhere from 20,000 to 35,000 gallons depending on your pool size. Be sure to ask us how much water your pool holds. The volume determines your chemical dosages.

To open the Easy-lock cover on the automatic chlorinator:

1. Shut off the pump
2. Turn the dial controls to off
3. Turn the cover cap counterclockwise to open.

**Caution: Do not inhale fumes. Stand to the side and turn face away.**

To close:

1. Press cover with O-ring firmly into body. Engage and turn clockwise to stop lug.
2. Set control dial valve to desired setting.

There are several other factors to consider regarding balancing your pool water. We usually draw a sample of your pool water for you, bring it to the shop, and perform a complete water analysis. We will give you a call with the results and help you with questions and getting started.

Initially you will want to test the water with your at-home test kit more frequently until you get comfortable with the pool. You are welcome to bring water in anytime if you are having trouble. If no troubles, about every 4-6 weeks to the shop with a water sample should keep you on track. Be sure to pull the water from an “arms length down” to get the most accurate results.

## **Chlorine**

Maintain a chlorine level between 1 – 3 ppm continuously.

## **pH**

Check and maintain pH levels at 7.4 – 7.6. It is very important to check pH levels at least twice a week. If your pH level is off, adjust it! If your pH is too low (below 7.4), add pH increaser or sodium carbonate. If your pH is too high (over 7.6), add dry acid or pH decreaser.

## **Total Alkalinity**

This is not the same as pH but correct total alkalinity does help to stabilize pH. If your total alkalinity is too low, the pH will be very sensitive and may swing. High alkalinity contributes to cloudy water and scaling.

Total alkalinity should be between 125 – 175 ppm. If too low, add alkalinity increaser (sodium bicarbonate). If it's too high, add dry acid. After making additions of either chemical be sure to re-test your pH.

## **Calcium Hardness**

Your test kit does not test for this. The desired range is 175 – 225 ppm. If calcium is too high (over 500 ppm) some water needs to be drained from the pool. If it's too low, add calcium hardness increaser (calcium flakes).

## **Conditioner / Stabilizer / Cyanuric Acid**

We test for this at the shop also. A certain level, usually about 30 – 80 ppm is desired in pool water, for salt pools 80 ppm is recommended. Conditioner coats the surface of the water and protects the chlorine from the sun's UV rays. Pool water without this stabilizing compound loses chlorine much faster than pool water containing conditioner. You have probably already seen at least one sock or maybe even a pair of pantyhose lying in your skimmer! We use this method to introduce and dissolve the product slowly. It needs to be done only once a year and should be tested before it's done annually. More is not better in this case.

## **Total Dissolved Solids – TDS**

Total dissolved solids are a measure of everything dissolved in your water. This test is also done at the shop and we can keep an eye on it for you.

## **Metals and Minerals**

Many cities' source water contains minerals such as iron, copper and/or manganese. When your pool is initially filled during construction, we routinely add 3 qts. of Jack's Magic Pink Stuff, a mineral-sequestering agent, to your water as it fills. These minerals are then picked up by the filter. Sometimes, your filter will catch so many minerals that the filter elements will need to be cleaned several times. If left untreated, or if your mineral content remains high and needs

further treatment, when chlorine is introduced, the chlorine can oxidize with the minerals and cause the pool water to turn brown or tea colored. More Jack's Pink Stuff needs to be added, chlorine introduction reduced, and a continued filtration period must be observed before adding more chlorine.

**Always remember: it is much easier on you and the pool if you spend a little time frequently instead of a lot of time infrequently. Consistency is the key!!!**

At this point refer to the laminated sheet for weekly maintenance, the pool care guide attached or feel free to call us with any questions.

## **Combined Chlorine**

Waste products and other substances from rain, fertilizers, pesticides, and even swimmers add nitrogen to the water, which forms a chemical bond with free chlorine to form combined chlorine, also known as Chloramines. The new combined chlorine molecules do not sanitize as effectively as free chlorine, and often times have a strong “chlorine” smell to them. When you can smell the pool, you usually smell the odor from the combined chlorine.

## **Testing for Combined Chlorine**

Testing for combined chlorine is relatively simple. Start by taking an initial reading of the chlorine level. This is done within five seconds of adding the chlorine reagent drops to the sample of pool water. Note the results because this is the free chlorine amount. Free chlorine is the good, working chlorine in the pool. Let the sample of pool water sit for five minutes and take another reading (no more drops, same pool sample as used for the initial reading). Note the result because this is the total chlorine amount. The calculation for combined chlorine is:

$$\text{Combined Chlorine} = \text{Total Chlorine} - \text{Free Chlorine}$$

## **Treating Combined Chlorine**

There are three ways to treat for combined chlorine.

1. Replacing some or all of the existing pool water. (Do NOT just drain the water out of your vinyl lined pool.)
2. Triple shock the pool and keep uncovered for three hours. Retest for combined chlorine and repeat as necessary. (This may and probably will take multiple treatments.)
3. Heavily shock the pool. (You may need upwards of 10 times the normal amount chlorine.) Leave the pool uncovered for three hours. Retest for combined chlorine and repeat as necessary.

If you are treating the pool for combined chlorine, it is not recommended to be in the pool during this process until the chlorine level has returned to the normal range of 1-3 ppm.

## Pool Maintenance – A.K.A. Laminated Sheet

### **Every Day:**

Run pump and filter 24 hours a day; always turn heater off 15 minutes before shutting pump off

### **Twice a Week:**

Check chlorine and pH levels; add chlorine to maintain 1 – 3 ppm and adjust pH to between 7.2 – 7.6

### **Once a week: Every Sunday night**

1. Check filter pressure, return pressure at the pool wall; shut pump off and clean filter elements as necessary (or once a month for preventive maintenance)
2. Run chlorinator on high for 15 minutes before shutting pump off and adding 3” chlorine tabs; adjust setting as necessary
3. Empty and clean pump pot basket
4. Empty and clean both skimmer baskets
5. Empty and clean Polaris bag; check and clean screen in Polaris wall fitting
6. Start system up/ adjust valves/ purge air from filter
7. Test water for chlorine, pH, alkalinity—adjust as necessary
8. “Shock” the pool with 1# granular chlorine per 10,000 gallons pool water
9. Run automatic cleaner or brush down walls and manually vacuum pool

**As needed: If water starts to look “hazy”, “shock” pool by using 1 lb. granular chlorine per 10,000 gallons pool water; it also might be time to clean those filter elements again**

Pool Maintenance – A.K.A. Laminated Sheet for Salt Systems

**EVERY DAY:**

**RUN PUMP AND FILTER 24 HOURS A DAY; ALWAYS TURN HEATER OFF 15 MINUTES BEFORE SHUTTING PUMP OFF.**

**TWICE A WEEK:**

**CHECK CHLORINE AND pH LEVELS; ADJUST CHLORINE GENERATOR TO MAINTAIN 1-3 ppm AND ADJUST pH TO BETWEEN 7.2 - 7.6.**

**ONCE A WEEK:**

- 1. SHUT HEATER OFF 15 MINUTES BEFORE SHUTTING PUMP OFF.**
- 2. CHECK FILTER PRESSURE; CHECK RETURN PRESSURE AT THE POOL WALL; SHUT PUMP OFF AND CLEAN FILTER ELEMENTS AS NECESSARY (OR ONCE A MONTH FOR PREVENTIVE MAINTENANCE)**
- 3. EMPTY AND CLEAN PUMP POT BASKET**
- 4. EMPTY AND CLEAN BOTH SKIMMER BASKETS**
- 5. EMPTY AND CLEAN AUTO CLEANER BAG; CHECK AND CLEAN SCREEN IN POLARIS WALL FITTING CONNECTION**
- 6. START SYSTEM UP/ ADJUST VALVES/ PURGE AIR FROM FILTER**
- 7. TEST WATER FOR CHLORINE, pH, AND ALKALINITY- ADJUST AS NECESSARY**
- 8. SET THE CHLORINE GENERATOR TO 40% AND ADJUST ACCORDINGLY**
- 9. ADD A BAG OF SIMPLICITY SALINE WEEKLY FOR EVERY 20,000 GALLONS TO REVITALIZE THE SALT SYSTEM FOR SOFT AND CLEAR WATER**
- 10. ONCE A WEEK OR AS NECESSARY: “SHOCK” THE POOL BY SWITCHING THE CHLORINE GENERATOR TO SUPERCHLORINATE. THIS WILL RUN THE SYSTEM AT 100% FOR A PERIOD OF 24 HOURS AND THEN IT WILL AUTOMATICALLY RETURN TO ITS NORMAL SETTING**
- 11. RUN AUTOMATIC CLEANER OR BRUSH DOWN WALLS AND MANUALLY VACUUM THE POOL**

**AS NEEDED: IF WATER STARTS TO LOOK “HAZY”, “SHOCK” POOL BY USING 1# GRANULAR CHLORINE TO 10,000 GALLONS OF POOL WATER. IT IS ALSO PROBABLY TIME TO CLEAN THE FILTER ELEMENTS AGAIN.**

## Nature 2

If you have chosen to equip your pool with a Nature 2 chlorine-reducing device, we have provided the Professional G in-ground purifier model.

Remember, this device is used in addition to the rest of your system, not instead of. You must maintain good circulation and filtration. Run your pump 24 hours a day 7 days a week as recommended by Prestige Pools, and also periodically check and clean your filter. You must also maintain good water balance.

We recommend keeping your pool's chlorine level between 1-3 ppm. It is said that you may keep the chlorine level much lower (.4 - .6 ppm), but our objective is for the pool to always be clean, clear, and ready to use whenever you are ready to use it. By keeping chlorine levels very low, it stands to reason that the pool has a greater opportunity to become cloudy. The Nature 2 device allows you to use much less chlorine to achieve the 1-3 ppm level, thereby reducing your use of chlorine.

After your pool is cleaned and the water is balanced, simply install the cartridge in the vessel according to your owner's manual instructions, and follow the start-up directions on the recipe card provided.

If there is flow through the vessel, your Nature 2 is working. You needn't pay any more attention to the cartridge or the vessel itself. For the remainder of the swimming season, follow the low chlorine maintenance recipe card with the exceptions noted.

If the pool becomes hazy, shock the pool using 1 lb. of granular chlorine per 10,000 gallons of pool water to snap the water back into shape. Allow filtration time (be patient) and test the chlorine level. If it drops rapidly – within hours – you will have to repeat the shock treatment. All that the haziness means is that your pool has used up all the chlorine and has gotten behind. You need to help it out and catch it up by adding enough chlorine to reduce contaminants and clear up the water.

Once the cartridge gets wet, it's on its way out the door. It will last 6 months. Not 3 months this year and 3 months next year. The cartridge needs to be replaced with every swimming season.

## For Owners of Nature 2 and Synergy

### Directions for Pool Start Up

Open pool – order Nature 2 cartridge when calling for appointment

Clean up pool

Start to balance water – see “How to Balance Water in Pools with Synergy”

Make sure that you have free and available chlorine – bring in water sample.

Once the water is ready, put the Nature 2 cartridge in the vessel per the directions. Keep the pump running continuously (24 hours a day).

Keep the chlorine level at 3 ppm. Do this by using 1 lb. of Guardex SuperCl 60 per every 10,000 gallons of pool water. Maintain this 3 ppm level for 4 days to initiate the cartridge.

After the 4<sup>th</sup> day, allow the chlorine level to drop gradually.

Now you can begin the Synergy program.

Put in the initiator per instructions. Bring in a water sample within 2 weeks so we can test initiator level.

Use your test kit to check for free chlorine residual. If low, less than 3 ppm, use the SuperCl 60 again (1 lb. per 10,000 gallons of pool water).

If the chlorine is OK, then go ahead and put Synergy tabs in the automatic chlorinator per instructions.

Start doing your clear treatments at the end of the week – hopefully Sunday. Remember: ½ container (1/2 lb.) per 10,000 gallons of pool water.

If you have questions feel free to call. That’s what we’re here for. There are very good directions on the end panels of the system boxes too.

If we’ve forgotten anything you need, call us at the shop.

Most of all, thank you for your business. Enjoy your summer.

## How to Balance Water in Pools with Synergy

### Water Balance Notes

The pool water should be balanced about the same as for a normal chlorine pool.

<b>pH</b>	7.2 – 7.6
<b>Total Alkalinity</b>	150 – 175 The Addition of initiator will cause this value to rise. The higher range recommended will provide proper water balance.
<b>Calcium Hardness</b>	175 – 225
<b>Metals</b>	Zero
<b>Stabilizer (cyanuric acid)</b>	Around 15 – 30
<b>Synergy Initiator</b>	We will test
<b>Synergy Sanitizer</b>	1.0 ppm – 1.5 ppm

Bromine or bromine based products are not compatible with Synergy. Pools previously using bromine must be drained prior to start up with Synergy. The same is true for pools using biquanides.

## Polaris 380 Automatic Pool Cleaner

If you have opted for an automatic pool cleaner, your pool is equipped with the Polaris 380 model. This model requires the use of a booster pump, which is located back by the rest of your pool equipment. The head portion of the cleaner has hoses, which have been fitted and cut to your pool's size.

Some important things to remember:

1. If our electrician wires your pool, it is most often wired so that the cleaner's booster pump is unable to run unless the filter motor is also running. If not, always turn the filter motor on before the booster pump so that they are running at the same time if you are using the cleaner.
2. Always disconnect the cleaner from the pool wall and shut off the booster pump before cleaning your filter.
3. After you have cleaned the filter, allow the filter to run for at least 5 minutes before you re-connect the cleaner head and turn the booster pump back on.
4. The booster pump needs to run only if you are using the cleaner to clean the pool.
5. Never make the cleaner do too large of a clean up job. Occasionally you will have to get out your manual vac set-up.
6. Never pick up the cleaner by the head float. It will break.
7. Remove the cleaner when shocking the pool.

It's a convenient idea to purchase an additional collection bag. There is a sand/silt bag available. When one is full, remove it by depressing the prongs on the collar and install an empty dry bag. It's much easier to empty the bag when its contents are dry.

The cleaner will travel randomly throughout the pool, occasionally backing itself up to continue its travels. It does climb the walls. It does not climb up on the steps. Brush accumulated dirt on the steps into the pool and the cleaner will get it. The tail will have a gentle wagging motion.

There is a "thrust jet" located just below the head float and above where the hose attaches to the unit. With use and over time, this thrust jet can get bumped and get out of position. The standard operating position is eleven o'clock. Check to be sure once in a while that it's in the correct position.

The quick disconnect wall fitting is equipped with a pressure restrictor and a pressure relief valve. Together they release excess water pressure. It is to be expected that you will see water escaping at the wall fitting where you connect the cleaner to the wall.

Inside the hose there is a filter screen near the wall fitting.

**NOTE: This filter screen must always be present in the hose. Running the cleaner without the filter screen WILL damage the Polaris. Keep it clean and keep it in place.**

We have found that the filter screen is designed to come out easily for cleaning. But it also comes out easily when the hoses are dragged across your deck area. It is easily lost in the grass. Make sure it's there before you connect your cleaner.

The black sweep hose "scrubber" is on the end of the cleaner's tail. As it wears out, turn it. This will wear out completely eventually and can be purchased for replacement at the shop.

Never store your cleaner in direct sunlight or with the hoses coiled up. The hoses will get "memory" from being coiled and your cleaner will go in circles in the pool. Lay the hoses straight out on the warm deck to make them relax.

The Polaris is a sensitive machine. It does not like cold water. It will behave very sluggishly in cold water temperatures.

When the cleaner is removed from the pool, be sure that it is also disconnected from the pool wall and that the booster pump is shut off. Sometimes if a pool mysteriously loses a lot of water, the culprit may simply be that the Polaris is pumping water out into the yard because it has not been disconnected from the wall after it has been removed from the pool.

# RayPak Heater

## Operation

The upper front panel of the heater contains the control center that allows you to turn the heater on or off and adjust the temperature settings. The electronic heater has a manual switch located on the right cabinet side to allow you to turn the heater off. It is best to read the manufacturer's owners manual for operating instructions.

## If your heater won't fire

1. The breaker might have tripped and therefore you have no power. Reset the breaker.
2. Your pump pot strainer basket might be full. Clean it out.
3. **Your filter may be dirty.** To tell if your filter is dirty, remember to check the filter pressure gauge located on top of the filter. If the pressure has risen 3 to 5 psi over its normal, you need to clean your filter elements. Also check the flow at the return eyeball fittings at the pool wall. If the flow is lessened or diminished, clean the filter elements (check baskets too).
4. Your pump may have lost prime. Check your filter pressure gauge – if there is 0 pressure then you are not moving water (or your gauge is broken). The impeller in the pump may be clogged with hair or debris OR the water level in the pool has fallen below the mid-skimmer level. The skimmers are the square mouth boxes in the pool. There is a flapper door called a weir door in the mouth of the skimmer that must be in place. If the pool is too FULL (over the top of the skimmer) or too LOW (below the middle skimmer screw) the pump cannot draw water – it runs dry – very damaging – the filter has no water running through it and neither does the heater. Therefore it cannot fire. **SHUT THE SYSTEM OFF.** If the water is too low, get the garden hose and fill the pool up to level. **SET A TIMER.** You would not be alone if you left the hose running in the pool and forgot all about it. It's something that you don't want to experience!!!

## Pool water chemistry as it relates to your heater

Chemical imbalance can cause SEVERE damage to your heater and equipment. Maintain pH between 7.4 - 7.8 and Total Alkalinity between 125 - 175 ppm. A high mineral content will cause scale to form inside the exchanger tubes reducing efficiency and causing damage. If the pH drops below 7.2 **IRREVERSIBLE** damage to the heat exchanger **WILL** occur. Heat exchanger damage resulting from chemical imbalance is **NOT** covered under warranty. The part will cost you around \$1,000 or more.

## Problems

Your electronic ignition heater has an LCD display that provides status and service information.

### Display Status

In the Off mode, the actual water temperature is displayed.

In the Pool or Spa modes, the actual water temperature is displayed along with the desired temperature.

If the heater is firing, a flame icon will appear.

To adjust the **desired** temp, make sure the control is in the appropriate mode (pool/spa) and push the UP or DOWN buttons to get the desired set point temperature.

<b>CFH</b>	Call For Heat
<b>SPK</b>	Spark
<b>Service</b>	Call the shop
<b>Heat</b>	Heating
<b>REM</b>	Remote control or fireman's switch open

### Display Faults

If there is a safety fault, a fault code will be displayed along with a service indication.

\*\*If the PRS fault code is displayed, it indicates that there is insufficient flow through the heater. PRS stands for PRESSURE. In this instance, low pressure to the heater. Make sure that all baskets (skimmers and pump pot) and the pool filter are clean. You do not need to call for service for this one.

<b>BRD</b>	Board failure
<b>SNS</b>	Sensor failure
<b>PRS</b>	Pressure switch open – see above
<b>HL1</b>	High limit 1 switch is open
<b>HL2</b>	High limit 2 switch is open
<b>ROL</b>	Heat roll out safety switch is open
<b>IGN</b>	Ignition control failure
<b>PLT</b>	Pilot failure

### NOTES

As a rule of thumb, you can expect your heater to raise the pool water temperature about 1 degree an hour if the pool is covered. Plan ahead!! Don't

expect to turn the heater on in the morning and have the water temperature ready by the time your party starts that evening!

Your Xcel bill can really excel if you run the heater during the early spring or fall months. Watch out! Don't be surprised by high energy bills.

Turn the heater off when you aren't using it. Just remember to plan head for when you want the pool warmed up.

The warmer you keep the pool, the more chlorine you will use to maintain it. High pool temps eat chlorine.

Shut the heater off 15 minutes before shutting the pool system down to do your weekly maintenance routine. If the pool is shut off without shutting the heater down earlier, the extremely hot water in the heater can cause damage.

## Hayward Color Logic LED Light

The Light for the pool is controlled either by the light switch in the control panel, or the light switch installed by the electrician.

The light features both single colors as well as light shows which are made up of multiple colors. To change the color or show selection, turn off the light and quickly turn it back on. To stop on a certain color or show, also turn the light off and quickly turn it back on.

The light will be removed from the pool wall for winterization and left on the pool deck (usually under the diving board).

The light is required by code to be on a GFCI. If the light does not come on, check your circuit breaker or reset the GFI – they sometimes trip. The GFI reset button is usually located either on the outlet by the pool equipment or by the breaker itself.

## Automatic Pool Covers

**Now that you own an automatic pool cover, keep these few things in mind:**

- Operation by kids, baby-sitters, and neighbors is NOT under warranty. Limit the operation of the cover to responsible persons who operate it regularly and have a feel for how it works.
- Keep pool water level 3/4 full in the skimmer opening. This reduces friction and cover drag. If the water level is low, DO NOT operate the cover until the water level is raised up (fill pool with the garden hose through the skimmer).
- **DO NOT OPERATE THE COVER WITH STANDING WATER ON THE COVER!** Use your submersible cover pump to pump the water off the cover before operating the cover.
- If you have left the pool uncovered during a rainstorm, check to make sure there is not a water build-up in the recessed casing between the pool and the drum, which the fabric rolls up on.
- High winds are capable of starting a tear at the webbing where it attaches to the leading edge (bar that goes over the shallow end). This type of damage is NOT covered under any warranties and could quite possibly result in the need for replacement of the entire fabric (typically costing between \$3,000.00 and \$3,500.00). If you are in an area where gusty winds can be a problem, 2 or 3 sandbags at the end of the cover during high wind or storms will help keep the cover down.
- If you think you have a problem, turning the key harder does NOT help! Reverse the direction of the cover several feet and try again. If this does not help correct the situation, please call.
- It is OK to pump standing water off the cover in the early spring if the weather permits.
- It is not uncommon over time for the lid covering the mechanism to sag. If you notice the lid rubbing on the cover material, the support brackets need to be adjusted. This is typically caused by people standing on or walking on the lid.

## Preventive Maintenance

### 1. Cleaning Tracks

- a. High pressure nozzle on a garden hose
- b. Check and tighten track screws periodically
- c. Check for worn tracks – pitting from calcium deposits – Discolored webbing from worn off anodizing

### 2. Cleaning Recessed Housing

Lift lid and clean out with a shop vac

### 3. Cleaning Cover

- a. Rinse with water – with a pool brush
- b. Stubborn spots – Ivory hand soap (non-detergent)

### 4. Lubrication (Cover Pools)

- a. Marine grade – Lithium, white – 2 grease zerks on rope reels, 2 grease zerks on white nylon roller bearings
- b. Oil – 30 weight      Shifting gears – one drop
- c. Oil – 30 weight      Ratchet pawls – one drop on each

### 5. Replace Pulleys

- a. Track Pulleys      2-5 years – watch for clicking, open seal, seizing
- b. Bracket Pulleys      Normally last the life of a fabric  
Check all pulley housings for dirt

### 6. Patching Cover

- a. Patch as soon as pinhole or damage occurs to prevent scrim wicking
- b. Use VLP (Vinyl Liner Patch) for cracks and tears
- c. Patch on bottom or top. Cut rounded corners on patches
- d. Use a drop of Vinyl Weld for pinholes

### 7. Replace Gliders

Replace glider bodies whenever the fabric is replaced

### 8. Replace Track Guides

Replace Track Guides when changing a fabric

### 9. Examine Cover Pump

Remove the cage and clean the filter.  
Examine the float (donut shaped) for sediment and remove.

# ARCHITECTURAL CONCRETE GUIDELINES

## Color Concrete Impressions, Inc.

CPC Super Clear Coat sealer intensifies the color. The final cost is applied when the colored concrete has fully cured and is dry at the time of application. This eliminates the possibility of moisture becoming trapped between the film and the concrete slab causing a white haze to develop. Moisture under the slab from lack of proper drainage away from the slab can also cause the same white haze to develop. If this happens the drainage needs to be corrected and another application of CPC Super Clear Coat will emulsify the film letting the moisture escape and re-harden clear.

Architectural concrete sealed with CPC Super Clear Coat should be maintained by sweeping. Spills should be cleaned up when they occur. Dirt may be hosed off with water. Scrubbing with a stiff-bristle brush and a suitable high quality detergent such as Simple Green may clean heavily soiled areas.

A maintenance application of CPC Super Clear Coat may need to be re-applied when the color has lost its original appearance. It is not necessary to strip the previously applied sealer unless film buildup is heavy or the surface cannot be cleaned sufficiently. All dirt and contaminants must be completely removed from the surface of the sealer and the surface thoroughly rinsed and allowed to dry. After the deck is completely dry, the sealer, with slip resistance (Tri Grip), may be re-applied. Apply in temperatures above 40-degrees Fahrenheit. The use of other sealers may not be compatible with CPC Super Clear Coat and can cause flaking or yellowing of the sealer. If another sealer is used, do a test spot before sealing the entire area.

CPC Super Clear Coat and Tri Grip are available through Cemstone Products along with technical data concerning storage of materials, vapors during application, spills, etc.

Color Concrete Impressions also offers you the service of resealing. Please call us at 651-686-7909 for more information or to schedule a time for us to come out.