



***Mastin Aquatic Group LLC***  
***Established April 1973***



**Design**

**Development**

**Construction**

**Renovations**

North Wilkesboro, NC Office • (336) 984-2570 • Cincinnati, OH Office • (513) 324-3349  
NC Lic: 38992 SC Lic: G118939 VA Lic: 2705157885

**NOVEMBER 17, 2025**

**CAMP AGAPE SWIMMING POOL  
1369 TYLER DEWAR LN  
FUQUAY-VARINA, NC 27526**

**SUBMITTALS**



# **Mastin Aquatic Group LLC**

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## CAMP AGAPE SUBMITTALS

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# Pentair Return Fittings



## Return Fittings

Pentair offers a variety of return fittings for your pool and spa. Products include:

- Gunite/concrete
- Fiberglass pools & spas
- Concrete-walled vinyl liner pool
- Vinyl liner fittings
- Insider fitting for gunite/concrete pools

Explore purchase options available for this product.

### WHERE TO BUY

[JUMP TO ▾](#)

## SPECIFICATIONS

**Item #:**

542402

**DESCRIPTION:**

Long body, 1-1/2 in. threaded x 1-1/2 in. socket, white

Item # This website uses cookies to enhance user experience and to analyze 542402 performance and traffic on our website. We also share information about your DESCRIPTION site with our social media, advertising and analytics partners. To Long body, 1-1/2 in. threaded pt x 1-1/2 in. socket, white click "Cookie Settings".

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**Pentair**  
**Vac Port Wall Fitting**

## Customers who viewed this item also viewed

Sponsored



ATIE Free Rotation Pool Vacuum Vac Lock Safety Wall Fitting W400BWHP, GW9530

4.6 ★★★★★ 1,407

\$9.95



Hayward W400BWHP White Free Rotation Vacuum Lock Safety Wall Fitting

4.0 ★★★★★ 727

\$136.00



W400BWHP Free Rotating Vacuum Lock Safety Wall Accessory Replacement for

4.6 ★★★★★ 810

\$110.99

Patio, Lawn &amp; Garden &gt; Pools, Hot Tubs &amp; Supplies &gt; Cleaning Tools &amp; Chemicals &gt; Automatic Pool Cleaners &gt; Automatic Pool Cleaner Replacement Parts

## Pentair GW9530 Vac Port Snap-Lock Wall Fitting Replacement Pool and Spa Cleaner



Visit the Pentair Store

4.6 ★★★★★ 16 ratings

-41% \$29.99

List Price: \$60.99

Apply now and get a \$80 Amazon Gift Card upon approval of the Amazon Store Card, or see if you pre-qualify with no impact to your credit bureau score.

Brand: Pentair

Material: Metal

Color: Black

Power Source: Battery Powered

Item: 18.14 g

Weight:

\$29.99

FREE delivery Friday, May 23 to 28659. Details

Or fastest delivery Tomorrow, May 17. Order within 7 hrs 32 mins. Details

Only 3 left in stock - order soon.

Quantity: 1

[Add to Cart](#)[Buy Now](#)

Ships from SosPoolCom

Sold by SosPoolCom

Returns 30-day refund/replacement

Payment Secure transaction

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## Other sellers on Amazon

New (7) from \$29.99 &amp; FREE Shipping



Roll over image to zoom in



## About this item

- Vac-port snap-lock wall fitting replacement
- Fits Pentair Kreepy Kadet, Kreepy Krauly Kruiser and Kreepy Krauly Great White pool and spa automatic cleaner
- Also fits Pentair PoolShark and Kreepy Krauly hose and accessories pool and spa automatic cleaner

 Report an issue with this product or seller

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**Pentair  
Ball Valve**

[Home](#) > Ball Valve

# Ball Valve

[Be the first to review this product](#)

From

SKU#: 2622005 to 2622020T

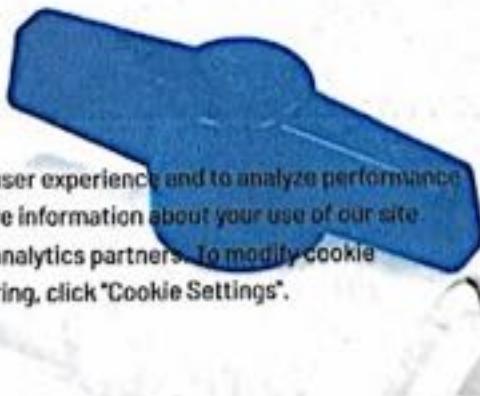
**\$10.38**

To

**\$118.50**

## Make Product Selection

These high-quality ball valves are offered at an unbelievable price! They feature PTFE ball seats and EPDM O-rings. The valves are very easy to turn. Maximum 150 psi rating. Certified by NSF for potable water use. Add a "T" after part number for threaded valves.



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Get 5% Off



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**Waterway  
12" VGB Floor  
Drain Cover**

CAPACITY TO HANDLE 100 PERCENT OF DESIGNED TURNOVER RATE. MAINDRAINS SHALL BE COVERED BY PROPER GRATING WHICH IS SECURED. OPENINGS OF THE GRATING SHALL BE AT LEAST FOUR (4) TIMES THE AREA OF THE SUCTION LINE. NO DIRECT CONNECTIONS TO SEWERS SHALL BE PERMITTED.

## GENERAL CERTIFICATE OF COMPLIANCE

12" x 12" SQUARE GRATE: P/N 640-472xV

Contents: 1

Part Number: 640-472xV

Description: Square Grate  
Size: 12" x 12"

Open Area: 62.4 in<sup>2</sup>

GPM @ 1.5 fps: 292

Floor Flow Rate: 356 GPM

Wall Flow Rate: 280 GPM

For Date of Manufacture please see the manufacture mark on product

12 1/2  
15 3/4  
8 1/2 9 1/4

Date of Installation: \_\_\_\_\_

Name of Installer: \_\_\_\_\_

Signature of Installer: \_\_\_\_\_

This product has been tested, certified and listed to the requirements of ANSI/APSP-16, 2017 per §1404 of the Virginia Graham Baker Pool and Spa Safety Act. Certified by: Underwriters Laboratories, Inc., 2929 E. Imperial Highway, Suite 100, Brea, CA 92821-6729

This product is certified to comply with §1404 of the Virginia Graham Baker (VGBA 2017) Pool and Spa Safety Act. A copy of the test results for the above may be found at [www.waterwayplastics.com](http://www.waterwayplastics.com) or go to: [www.ul.com](http://www.ul.com).

The test results supporting the product certification are maintained by Ray Mirzaei, 2200 Sturgis, Rd, Oxnard, CA 93030  
Phone: 805-981-0262 Email: [raym@waterwayplastics.com](mailto:raym@waterwayplastics.com)

This product is manufactured by Waterway Plastics, Oxnard CA 93030



VGBA  
2017



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## Divertor and Check Valves

# DIVERTER AND CHECK VALVES – 1-1/2 IN. AND 2 IN.

## 2-WAY, 3-WAY AND CHECK

263027



263026



263042



### Featured Highlights

- All valves available in CPVC or PVC
- Maintenance-free PTFE coated diverter seal
- Optimum positive-seal
- High Flow Rate
- Fiberglass reinforced handle
- Withstands pressure up to 150 psi
- Chemical-resistant
- Used for diverting, shut-off or mixing applications
- Accepts 1-1/2 in., 2 in., and 2-1/2 in. PVC plumbing
- Field-adjustable stop positions
- Plumbed with inlet at any port
- Designed to work with most industry standard actuators

CALIFORNIA PROPOSITION 65 WARNING

**WARNING:** Cancer and Reproductive Harm.  
**AVERTISSEMENT:** Peut Causer le Cancer  
 et des Dommages au Système Reproducteur.  
**ADVERTENCIA:** Cáncer y Daño Reproductivo  
[www.p65Warnings.ca.gov](http://www.p65Warnings.ca.gov)

### Ordering Information

Product	Description	Carton Qty.	Carton Wt. (Lbs.)
<b>2-WAY AND 3-WAY DIVERTER VALVES</b>			
263026	3-Way CPVC 2 in. (2-1/2 in. slip outside)	1	2
263027	2-Way CPVC 2 in. (2-1/2 in. slip outside)	1	2
263028	3-Way PVC 2 in. (2-1/2 in. slip outside)	1	2
263029	2-Way PVC 2 in. (2-1/2 in. slip outside)	1	2
263035	3-Way CPVC 1-1/2 in. (2 in. slip outside)	1	2
263036	2-Way CPVC 1-1/2 in. (2 in. slip outside)	1	2
263037	3-Way PVC 1-1/2 in. (2 in. slip outside)	1	2
263038	2-Way PVC 1-1/2 in. (2 in. slip outside)	1	2
263047	3-Way Solar Valve w/ drain-down, CPVC 2 in. (2-1/2 in. slip outside)	1	2
<b>CHECK VALVES</b>			
263042	Check Valve CPVC 2 in. (straight 2-1/2 in. slip outside)	1	2
263042Z	Check Valve Rebuild Kit		



263027



263029



263026



263028

PVC Valves not recommended for climates that can reach air temperatures of over 104°F.

See page 558 for replacement parts.



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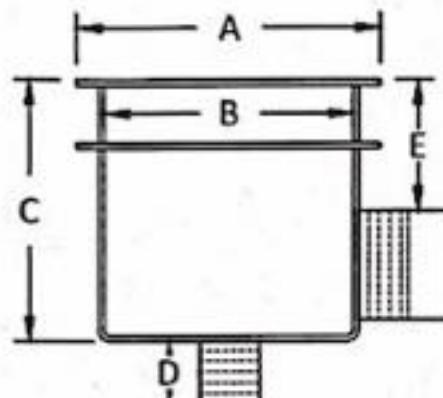
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**A.S.A. Mfg. Inc.**  
**Fiberglass Sumps**

# Fiberglass Field Built Sumps



- Premium fiberglass & resin for maximum structural strength
- Durable smooth gelcoat interior
- Exterior perimeter FRP watershield flange
- Non-Metallic- No grounding
- Rough sand exterior finish
- 2" Bottom fpt x lpt for hydro relief valve
- Threaded PVC SCH 40 pressure test plug for outlet (up to 8")
- All PVC connections are ASTM 2466 compliant
- Designed to ANSI/APSP/ICC-16 2017 for use only with approved SOFA (Suction Outlet Fitting Assembly) Covers.



## COMPONENT



Size (Inches)	ASA Part #	Field Built Sump Product Dimensions (Inches)					SOFA outlet fpt x soc
		A	B	C	D	E	
9 x 9 x 12	FBS-50-809-3	11"	9"	12"	4.5"	6.5"	3"
12 x 12 x 12	FBS-50-812-4	14"	12"	12"	4.5"	7"	4"
12 x 12 x 18	FBS-50-812-18-4	14"	12"	18"	4.5"	8"	4"
12 x 12 x 18	FBS-50-812-18-6	14"	12"	18"	4.5"	10"	6"
18 x 18 x 20	FBS-50-818-6	20"	18"	20"	4.5"	10"	6"
18 x 18 x 24	FBS-50-818-24-6	20"	18"	24"	4.5"	13"	6"
18 x 18 x 24	FBS-50-818-24-8	20"	18"	24"	4.5"	13.5"	8"
24 x 24 x 30	FBS-50-824-30-10	26"	24"	30"	4.5"	17"	10" soc x soc

### SOFA COVER NOTES:

(SOFA = Suction Outlet Fitting Assembly)

- Please see the Manufacturer's (Aquadar, Hayward, Waterway) SOFA Cover (Grate) Installation Instructions for a Field Fabricated Sump to confirm minimum Sump dimensions and tested outlet sizes before installing.
- All SOFA Cover Manufacturer's require different minimum Sump depth dimensions, outlet placement (bottom or side), and suction outlet size (diameter in inches). Please confirm the SOFA Cover you are using is designed for this Fiberglass Field Fabricated Sump.
- Please refer to the SOFA Cover (Grate) specification data sheet for VGBA tested flow rates. Every SOFA Cover has different a open area and flow path. Do not install a SOFA Cover over a Field Fabricated Sump that does not meet the minimum specifications determined by the SOFA Manufacturer.
- A.S.A. MFG. Inc. Fiberglass Sumps have been fabricated to the original ASME 112.19.8 Standard - Suction Fittings for Pools & Spas (1.5x /Figure 2 rule) since 1992.

- All Field Built Sumps shall be installed in accordance with the manufacturer's installation instructions.
- All SOFA covers shall be installed in accordance with the manufacturer's installation instructions.
- The A.S.A. MFG Inc. Fiberglass Field Built Sump is intended only to be installed in a reinforced concrete pool structure.
- Any field modifications made to the SOFA and not authorized by the manufacturer's installation instructions shall void the SOFA certification. No modification shall be made to the SOFA structure or flow path unless a new configuration has been certified as a new SOFA.
- Fiberglass Field Built Sump Life = Life of the Aquatic Center.

v060923b



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## Sta-Rite U-3 Skimmer

**PENTAIR**

**U-3 SwimQuip® Inground Skimmer White with White Lid & Frame Slip Reducer**

Product #: **SWQ-25-1569**

Mfg. Part #: **08650-1404**



### **Description**

Pentair Sta-Rite SwimQuip Top Performing Skimmers are engineered and manufactured to the highest standards of precision and quality to minimize installation time and maximize satisfaction.

### **Specifications**

- **Brand**Pentair
- **Application**Inground, Pool
- **ItemShippingDimensions**15.5 inch x 10.5 x 20
- **Connection Size** 12 inch
- **Connection Size 1** FITSlip
- **Connection Type**Slip
- **Cover Shape**Round
- **Each Product Weight**8.1 pound
- **Includes**Float and Check Valve, Basket
- **Master Carton Quantity**1
- **Material**ABS or acrylonitrile butadiene styrene
- **Minimum Sell Quantity**1
- **Pallet Quantity**33
- **Standards Approvals**NSF Certified
- **UPC Code**022315127128



# U-3 SKIMMER



## INSTALLATION GUIDE

IMPORTANT SAFETY INSTRUCTIONS  
READ AND FOLLOW ALL INSTRUCTIONS  
SAVE THESE INSTRUCTIONS

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## TECHNICAL SUPPORT

**Sanford, North Carolina (8AM - 5PM EST)**

**Moorpark, California (8AM - 5PM PST)**

**Phone:** (800) 831-7133

**Fax:** (800) 284-4151

**Website:** [www.pentair.com](http://www.pentair.com)

**READ, THEN KEEP THESE INSTRUCTIONS FOR FUTURE REFERENCE**

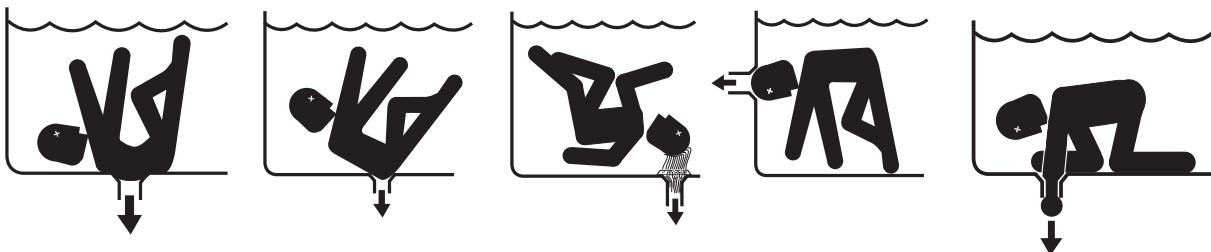
## IMPORTANT WARNINGS AND SAFETY INSTRUCTIONS

**⚠️ WARNING** INSTALLERS, POOL OPERATORS AND POOL OWNERS MUST READ THESE WARNINGS AND ALL INSTRUCTIONS BEFORE USING THIS PRODUCT!

**⚠️ DANGER** SERIOUS BODILY INJURY OR DEATH CAN RESULT IF THIS PRODUCT IS NOT INSTALLED AND USED CORRECTLY.

**⚠️ WARNING** FOR USE WITH MULTIPLE SUBMERGED SUCTION OUTLETS OR A SINGLE SUBMERGED SUCTION OUTLET. IF ONLY A SINGLE SUCTION OUTLET OR MAIN DRAIN EXISTS, A SAFETY VACUUM RELEASE SYSTEM (SVRS) SUCH AS THE PENTAIR INTELLIFLO® VS+SVRS PUMP, A GRAVITY DRAINAGE SYSTEM, AN AUTOMATIC SHUT-OFF SYSTEM OR A SUCTION-LIMITING VENT SYSTEM MUST BE USED.

**⚠️ WARNING** IMPROPER INSTALLATION OR USE OF THIS PRODUCT MAY PRESENT A RISK OF HAIR OR BODY ENTRAPMENT AND DROWNING. INSTALL THIS EQUIPMENT IN ACCORDANCE WITH THE INSTRUCTIONS PROVIDED. USE ONLY WITH THE COMPONENTS AND MOUNTING HARDWARE PROVIDED. FAILURE TO FOLLOW THESE INSTRUCTIONS AND/OR USE WITH COMPONENTS NOT PROVIDED BY PENTAIR AND INTENDED TO BE USED WITH THIS PRODUCT MAY RESULT IN IMPROPER POSITIONING OR FUNCTIONING OF DRAIN COVER AND MAY CAUSE SEVERE PERSONAL INJURY OR DEATH.



**⚠️ DANGER** SUCTION ENTRAPMENT HAZARD

Pool and spa pumps produce high levels of suction, which can pose extreme danger if a person comes in close proximity to an open pool or spa drain or if a drain cover is loose, cracked, broken or missing.

Pool and spa pumps move large volumes of water, which can pose extreme danger if a person's hair comes in close proximity to a drain that is not the proper size for the pump or pumps.

Suction entrapment dangers include:

**Hair Entanglement** – When the hair tangles or knots in the drain cover, trapping the swimmer underwater. This hazard is present when the flow rating of the cover is too small for the pump or pumps.

**Limb Entrapment** – When a limb is sucked or inserted into an opening resulting in a mechanical bind or swelling. This hazard is present when a drain cover is missing, broken, loose, cracked or not properly secured.

**Body Entrapment** – When a portion of the body is held against the drain cover trapping the swimmer underwater. This hazard is present when the drain cover is missing, broken or the cover flow rating is not high enough for the pump or pumps.

**Evisceration/Disembowelment** – When a person sits on an open pool (particularly a child wading pool) or spa outlet and suction is applied directly to the intestines, causing severe intestinal damage. This hazard is present when the drain cover is missing, loose, cracked, or not properly secured.

**Mechanical Entrapment** – When jewelry, swimsuit, hair decorations, finger, toe or knuckle is caught in an opening of an outlet or drain cover. This hazard is present when the drain cover is missing, broken, loose, cracked, or not properly secured.

**⚠️ WARNING** Use these fittings only with a pumping system rated for the corresponding flow or less for two (2) inch plumbing. FAILURE TO DO SO CAN RESULT IN HAIR OR BODY ENTRAPMENT WHICH CAN CAUSE SEVERE PERSONAL INJURY OR DEATH. If in doubt about the rating of your system, consult a qualified pool or spa professional.

## IMPORTANT WARNINGS AND SAFETY INSTRUCTIONS

### IMPORTANT NOTICE

Regularly inspect all drain covers for cracks, damage and advanced weathering. If a drain cover becomes loose, cracked, damaged, broken or is missing, close the pool or spa immediately, post a notice and keep the pool or spa closed until an appropriate VGB 2008 certified drain cover is properly installed. Drain covers deteriorate over time due to exposure to sunlight and pool chemicals. This drain cover must be replaced within seven (7) years from installation (or earlier if the cover becomes damaged in any way).



An ANSI/ASME A112.19.8a approved anti-entrapment drain cover must be used for each drain. Pools and spas should utilize two drains per pump. If a drain cover becomes loose, broken or is missing, close the pool or spa immediately and shut off the pump until an approved anti-entrapment drain cover is properly installed with the supplied stainless steel screws. Only the supplied 316 stainless-steel screws should be used with the drain cover. Substitute screws such as masonry screws, sheet rock screws or other types of screws should never be used. Screws put into the frame anywhere except in the original screw holes will not hold and will allow the drain cover to come off the main drain, causing an entrapment hazard, including possible limb and body entrapment or evisceration/disembowelment. If the screw holes of the frame are stripped or the brass inserts are missing, loose, or damaged, replace the frame. **DO NOT DRILL NEW SCREW HOLES IN THE FRAME AS THIS WILL DAMAGE AND WEAKEN THE FRAME.**



### IMPORTANT NOTICE

**Attention Installer:** This manual contains important information about the installation, operation and safe use of this product. This information should be given to the owner and/or operator of this equipment.



Before installing this product, read and follow all warning notices and instructions which are included. Failure to follow safety warnings and instructions can result in severe injury, death or property damage.

Call (800) 831-7133 for additional free copies of these instructions. It is absolutely critical that the suction plumbing be installed in accordance with the latest national and local codes for swimming pools.



A pool/spa pump produces high levels of suction, which can pose extreme danger if a person comes in close proximity to an open pool or spa drain or a loose or broken drain cover or grate.

If you have any questions about installation or maintenance of this drain cover, please contact your pool professional. Never attempt to alter or repair the cover or frame on your own.

For more information about the Virginia Graeme Baker Pool and Spa Safety Act, contact the Consumer Product Safety Commission at (301) 504-7908 or visit [www.cpsc.gov](http://www.cpsc.gov).

**NOTE: Always turn off all power to the pool pump before installing the cover or working on any suction outlet.**

# Operation



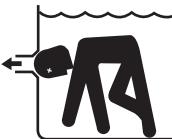
**WARNING** Keep the skimmer lid properly secured at all times. Failure to keep the lid secured can cause the lid to become dislodged when stepped on, resulting in risk of serious injury.



**WARNING** Replace the skimmer lid if it is worn or damaged. Failure to replace a worn or damaged skimmer lid can cause the lid to break when stepped on, resulting in risk of serious injury.



**Hazardous Suction:** Risk of hair or body entrapment, drowning or disembowelment.



**Wall fitting on equalizer line must be non-entrapping of hair or body and must conform to ANSI/ASME A112.19.8.**

**Note:** Skimmer is not equivalent to a main drain. All pools, spas, and hot tubs must have at least two main drains besides skimmer(s).

**CAUTION!** Blocking pump suction can cause pressure surges and water hammer, which can damage pump or piping and may cause flooding.

## OPERATION

Pump suction pulls water through skimmer. Water flow into skimmer carries floating leaves, bugs, etc., into skimmer where they are trapped in skimmer basket. (Dust, body oils, etc., go on through to be removed by pool filter.) Floating weir in skimmer opening enhances surface flow and skimming action.

**Water level:** Keep pool, spa, or hot tub water level at least 1½ inch to 2 inch above bottom of skimmer opening for proper operation.

**Float Valve:** Float valve protects pump from loss of prime if skimmer clogs or flow through skimmer is restricted. Trimmer valve plate on bottom of float valve balances flow between skimmer and main drains.

**Flow adjustment:** Balance flow between skimmer and main drain.

a. **Skimmers without float:** Adjust shut-off valves in pump suction line from skimmer and pool main drain line. (See Figure 1, below.)

b. **Skimmers with float:** If skimmer is equipped with float valve, adjust trimmer plate on bottom of float. To reach trimmer plate, remove cover, basket, and float valve (See Figure 2, below). Swing trimmer plate to one side to increase trimmer port size (more flow through skimmer, less flow through main drains); reduce port size for less flow through skimmer and more flow through main drains.

**Sweeping pool:** For installation without equalizer line, hold weir up to starve skimmer of water and close float valve. This directs all flow through main drains. To return to normal skimming operation, turn pump off 10-15 seconds, allowing skimmer to fill and float valve to return to open position. Skimmer will now operate normally as long as pool water level is high enough to allow normal flow over weir.

## Typical Skimmer Installation with Equalizer Line Installed

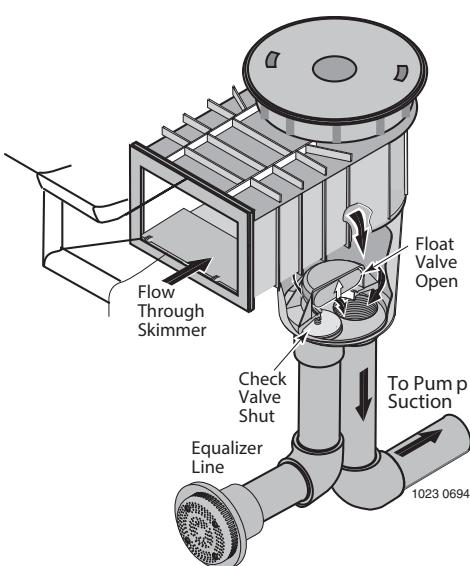


Figure 1: Normal operation: float valve open, check valve shut.

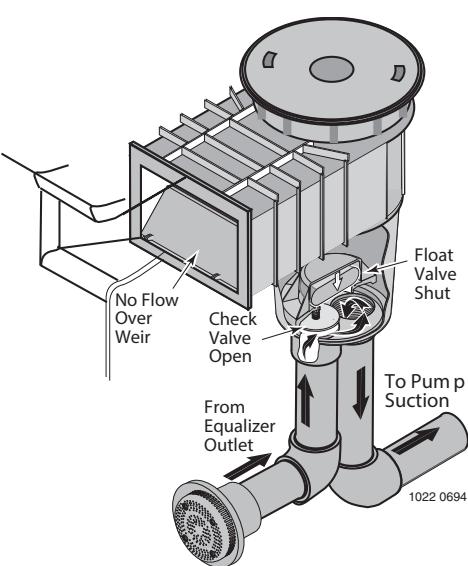


Figure 2: Equalizer operation; float valve shut, check valve open.

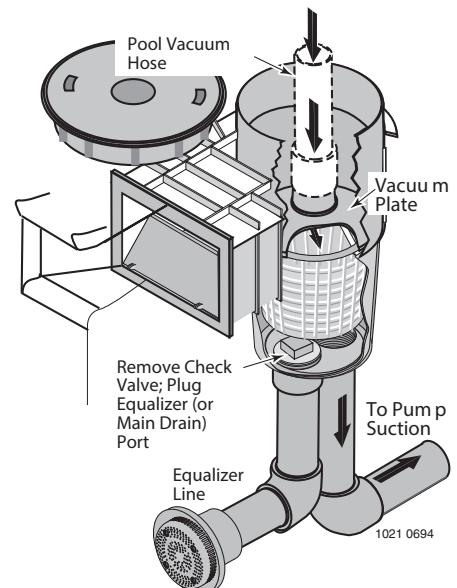


Figure 3: Vacuuming pool; float and check valves removed, equalizer (check valve) port plugged.

**Vacuuming pool (Figure 5):** Remove cover, basket (and float valve and check valve if skimmer has them). Plug equalizer inlet. Replace basket and place vacuum plate on top of basket. Fill the vacuum hose with water, bring it in over coping or through skimmer throat, and attach the vacuum hose directly to the vacuum plate. Follow instructions in vacuum attachment or filter owner's manual for vacuuming operation. After vacuuming, remove hose and vacuum plate, unplug equalizer port, and reinstall check valve, float basket, and cover. Be sure cover is solidly in the frame to prevent accidentally dislodging it. Fasten cover with screws provided if children use pool.

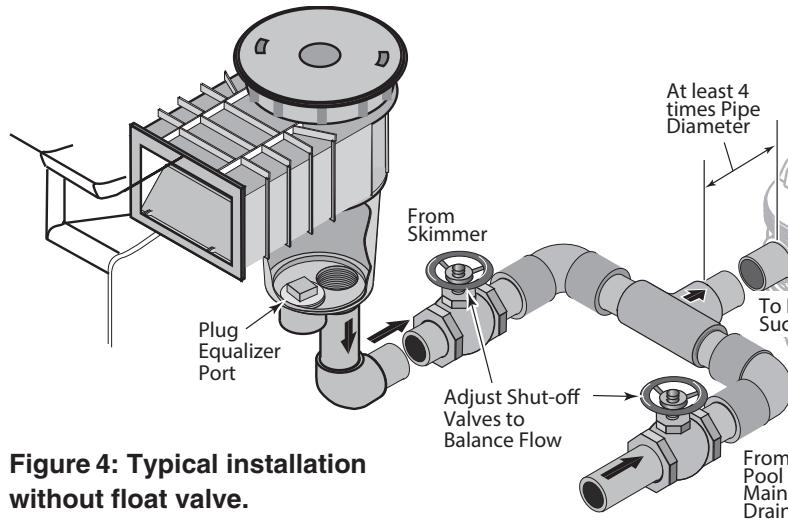
**Check Valve (Equalizer Line Installed):** Check valve is threaded into equalizer inlet port in skimmer. When closed, check valve prevents flow through equalizer line. If flow through skimmer decreases enough to let float valve drop, check valve opens to allow flow to pump from main drain/equalizer line (which prevents starving the pump).

Inspect equalizer regularly. During normal operation (with float valve open) the skimmer check valve prevents detectable flow through the equalizer wall fitting. There should be no flow through the wall fitting unless the skimmer float valve is closed. If you can feel suction into the equalizer wall fitting while the float valve is in normal (or up) position, the check valve is leaking; replace it.

**NOTICE:** The skimmer check valve is factory pre-set and not adjustable. If check valve appears worn or deteriorated, or if spring tension is loose, do not try to fix it; replace the check valve.

**Equalizer:** If flow over weir is restricted, Float valve closes, diverting pump suction to equalizer (or main drain) line and preventing loss of prime in pump. Seal normally remains until pump stops, when float valve will rise. If pump starts again before stoppage is cleared, float will close again and remain closed until pump stops, blockage is cleared, or pool water level returns to normal.

**Hazardous Suction. Risk of hair or body entrapment, drowning or disembowelment. Wall fitting on equalizer line must be non-entrapping of hair or body and must conform to ANSI/ASME A112.19.8 requirements. P/N 08655-0017 check valve is required when skimmer is installed with equalizer. Check valve is not used when skimmer is installed without equalizer.**



**Figure 4: Typical installation without float valve.**  
**Use with at least two main drains.**

**NOTICE:** The equalizer is an emergency bypass intended to prevent damage to the pump when pool water level is low or skimmer basket is blocked. Do not allow flow through equalizer for extended time periods.

**Equalizer:** If flow over weir is restricted, Float valve closes, diverting pump suction to equalizer (or main drain) line and preventing loss of prime in pump. Seal normally remains until pump stops, when float valve will rise. If pump starts again before stoppage is cleared, float will close again and remain closed until pump stops, blockage is cleared, or pool water level returns to normal.

## MAINTENANCE

**Weir:** Periodically check weir for free operation. Replace if damaged or worn.

**Strainer Basket:** Check strainer basket every few days for accumulated leaves, debris, etc. Empty basket as required. Reset float valve if it closed.

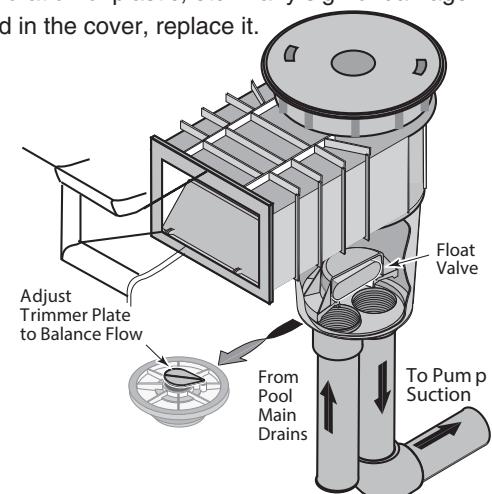
**Float Valve:** Periodically check that float valve is operating freely and is not waterlogged. If necessary, tighten trimmer plate pivot screw to maintain desired flow balance.

**Check Valve (Equalizer Line Installed):** Inspect for wear or deterioration. Make sure that screw is tight in check valve body. If you can detect flow through equalizer with float valve open, replace check valve.

**Equalizer (Wall) Fittings:** Periodically check that wall fittings are correctly installed and that covers are tight to fittings.

**Water Level:** Maintain water level at least 1½ inch to 2 inch above bottom of skimmer opening for proper operation. Adjust trimmer plate if necessary. Make sure set screw is tight.

**Winterizing:** Drain pool until level is below skimmer inlet. Remove cover, basket and float. Plug both bottom ports with standard 1½ inch or 2 inch pipe plugs. Cover skimmer to prevent rainwater or snow accumulation. Falling and tripping hazard. Skimmer grate may deteriorate with prolonged use. Cover must be flush with pool, spa, or hot tub deck level. Skimmer is made of impact and weather resistant materials, but extended use (5-7 years) may lead to reduced strength. Regularly check condition of skimmer cover. Look for cracks, chips, deterioration of plastic, etc. If any sign of damage or deterioration is found in the cover, replace it.



**Figure 5: Typical installation with float valve.**  
**Use with at least two main drains.**

## Multi-Skimmer Installation and Pipe Sizing

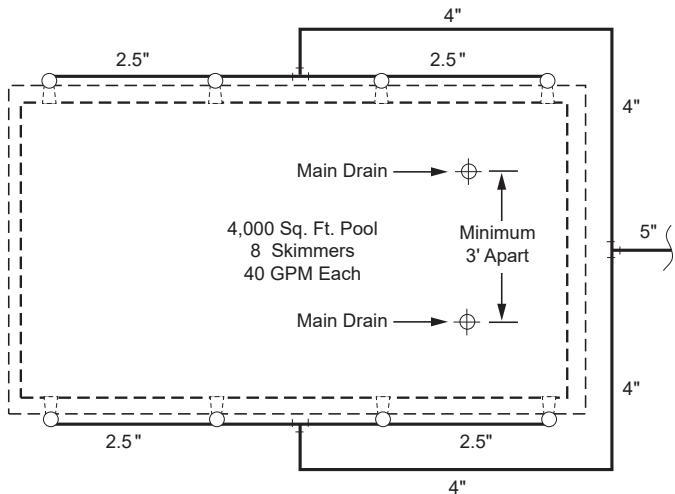
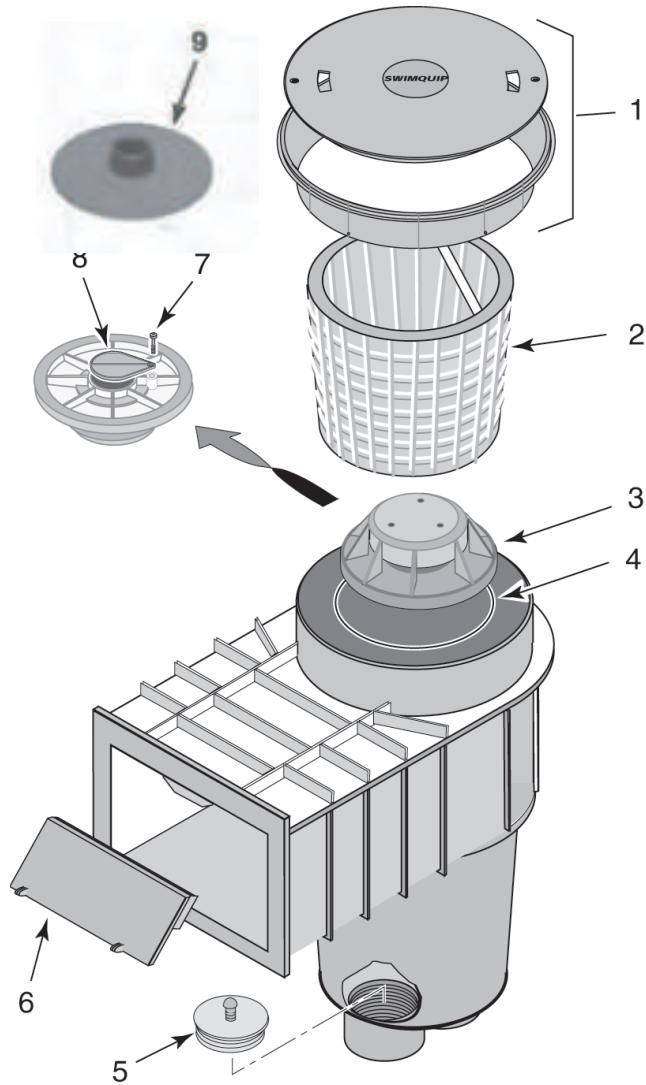


Figure 6: Multi-Skimmer Installation with pipe sizing. Note multiple main drains.

Pool Surface Area In Square Ft	No. of Skimmers Req.	Skimmer Rated Flow (GPM)				
		30	35	40	45	50
Up to 600	1	2"	2"	2"	2"	2"
1,000	2	2.5	2.5	2.5	2.5	3
1,500	3	3	3	3	4	4
2,000	4	4	4	4	4	4
2,500	5	4	4	4	4	5
3,000	6	4	4	5	5	5
3,500	7	4	5	5	5	5
4,000	8	5	5	5	5	6
4,500	9	5	5	5	6	6
5,000	10	5	5	6	6	6

Table 1: Suction Pipe Sizing by Surface Area of Pool and Rated flow Capacity of Skimmers.

## Parts List



Item No.	Description	Equalizer Line Models	Non-Equalizer Line Models
	White, w/2 x 11/2 NPT Reducers	08650-1403	08650-4403
	White, w/2 x 11/2 Slip Reducers	08650-1404	08650-4404
	Tan, w/2 x 11/2 NPT Reducers	08650-2403	08650-5403
	Tan, w/2 x 11/2 Slip Reducers	08650-2404	08650-5404
	Tan/Gray, w/2x11/2 NPT Reducers	08650-3403E	—
	Tan/Gray, w/2x11/2 Slip Reducers	08650-3404E	—
	Tan/Gray, w/2x11/2 NPT Reducers	08650-6403E	—
	Gray, w/2x11/2 NPT Reducers	08650-3403	—
	Gray, w/2x11/2 Slip Reducers	08650-3404	—
1	Frame and Grate Kit (Tan)	08650-0159	08650-0159
1	Frame and Grate Kit (White)	08650-0169	08650-0169
2	Basket and Handle	08650-0007	08650-0007
•	Basket Handle Only	08650-0067	08650-0067
3	Float Assembly w/O-Ring	08650-0079	—
4	Float O-Ring Only	35505-1273	—
5	Check Valve	08655-0017	—
6	Hinged Weir Assembly	08650-0022A	08650-0022A
•	Weir Bumper	08650-0018	08650-0018
•	Screw #8 x 3/8"	37207-0825	37207-0825
7	Screw #8 x 1/2"	37207-0027	—
8	Trimmer Plate	08650-0048	—
9	Vacuum Plate	08650-0042	—

## Skimmer Layout and Suction Line Sizing

**NOTE:** In any installation, there should be at least two main drains at least three feet apart in addition to any skimmers installed. A pool may use more than two, but should never have less than two main drains.

**NOTICE:** Installation must comply with all applicable codes, including NSF Standard 50 (if required). Equalizer lines may be required on some pool installations.

1. Use one skimmer per 500 square feet of pool surface area. Suction line sizes are based on a water velocity of less than seven feet per second. Since building codes vary, check your local building code before installing pool and skimmers.
2. Suction line sizes for each section of piping must allow for the total number of skimmers feeding that section of the line. Suction line sizing in Chart I allows for this.
3. See Figures 5 and 6, Pages 2 and 3, for piping layout. See Table I, Page 3, for suction pipe sizing.
4. For good hydraulic balance, divide skimmers as equally as possible between the main branches of the piping layout.
5. For long pipe runs (in which friction can reduce flow and pressure), refer to your friction/flow chart for proper pipe sizes.
6. When planning location of skimmers on one and two skimmer outdoor pools, locate skimmers so that the prevailing wind blows into the skimmers.

## INSTALLATION

All installation instructions in this manual are general guidelines. Actual skimmer installations may vary by local practices and codes.

**NOTICE:** Skimmer should be surrounded by at least 4 inches of structural concrete in a monolithic pour, using a cold joint as shown in installation drawings. **Concrete: See Figure 7 for dimensions.**

**Line Connections and Testing:** Connect pump inlet line to rear port in bottom manifold (Figure 7). Skimmer is ABS plastic; manifold connections are 1½ inch or 2 inch threaded or 1½ inch slip. For threaded connections, do not use pipe dope; to seal joint use RTV Silastic #732\* (preferred), Teflon® tape, or Plasto-Joint Stik®. For slip connections, apply PVC primer to PVC pipe only. Then apply ABS to PVC solvent cement to both pipe and slip connections. Consult dealer for correct solvent cement for pipe used. Assemble joint per cement manufacturer's instructions. Allow at least three (3) hours before pressure testing.

Plastic cements and primers can be flammable, poisonous, or both. Closely follow cement manufacturer's instructions when using plastic cement. For installations where equalizers are not required and where the main drain lines do not connect to the skimmer equalizer port, low water levels in the pool, spa, or hot tub or clogged skimmer baskets may damage the pump due to loss of prime (if skimmer sucks air) or cavitation (if skimmer clogs). Air pulled in by skimmer(s) can be trapped in filter tanks, which may be a safety hazard. If skimmer regularly vortexes or sucks air, raise water level or contact your pool service representative for advice.

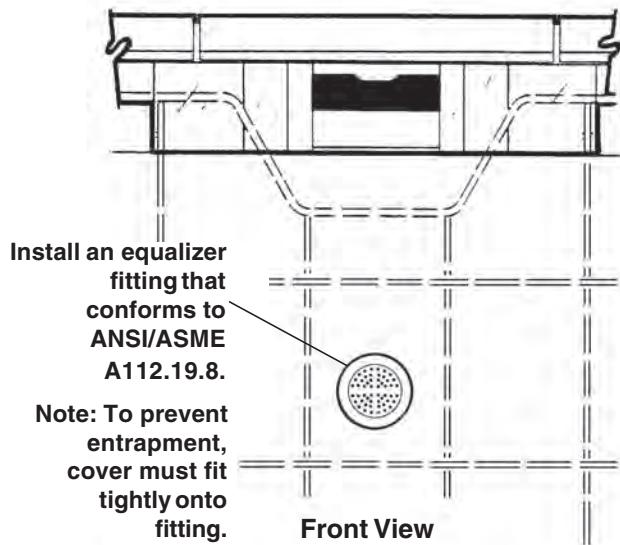
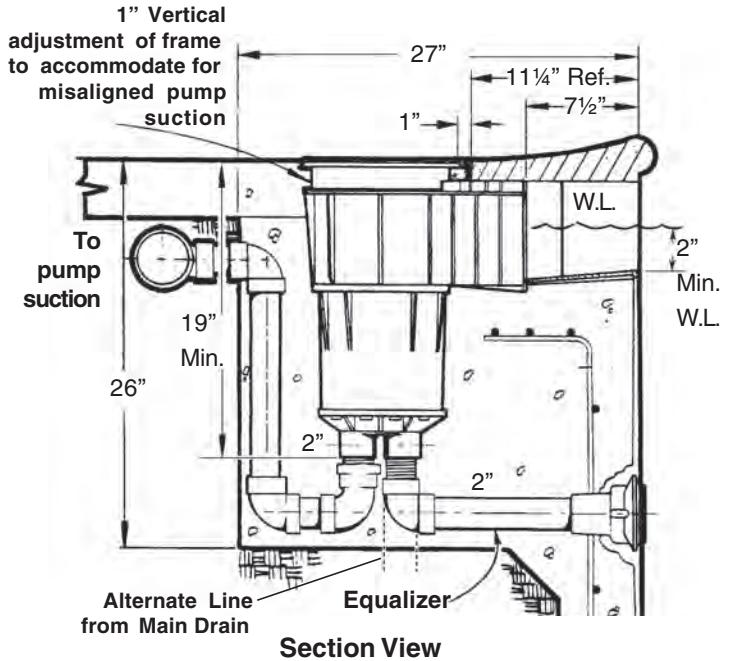
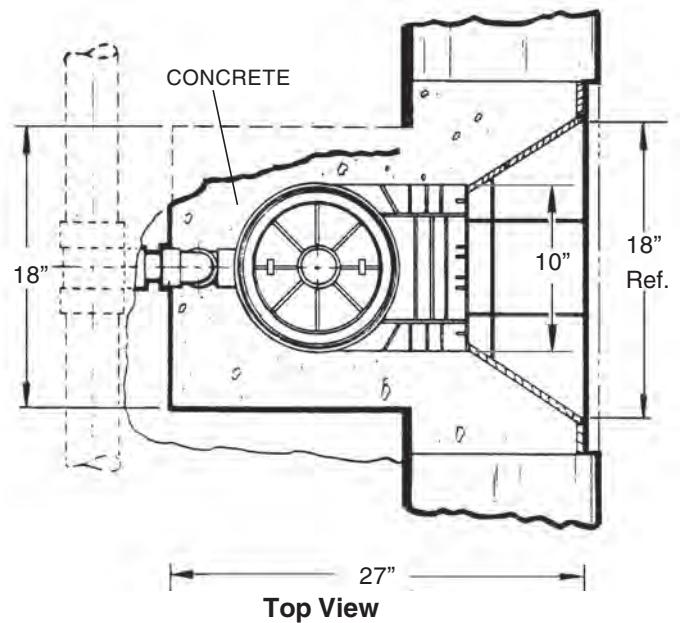


Figure 7: U-3 Skimmer Installation Illustration



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**Pentair**  
**Triton C Series**  
**Commercial Sand Filters**



# TRITON® C SERIES

## COMMERCIAL SAND FILTERS

For commercial and high-end residential swimming pools and other water applications. Available in flow rates from 98 to 141 gallons per minute.

Triton C and C-3 Series filters are designed for high efficiency and easy maintenance in high capacity commercial pool applications. A superior internal design levels the sand bed and produces an even water flow for the most efficient filtration possible. Our multi-diffuser

system and slotted layer design give the Triton C filter superior filtration capacity and flow for longer cycles between cleanings, which significantly reduces operating costs.

Three-inch bulkheads (C-3 models) cut friction loss in half, and flanged connections don't require special adapters.

The Triton C Series filter is engineered with single-piece tanks for superior

strength, and made from the toughest materials available to withstand harsh chemicals and weather.

Capable of increased flow rates to 20 gpm per square foot of filter media, these filters are ideal for commercial applications and tandem installations when several filters are required.



### STANDARD FEATURES

- 2" and 3" plumbing connections for maximum flow.
- 2" drains for easy winterizing.
- C and C-3 Series filters available in 30" and 36".
- Can be combined for tandem installation.

# TRITON® C SERIES

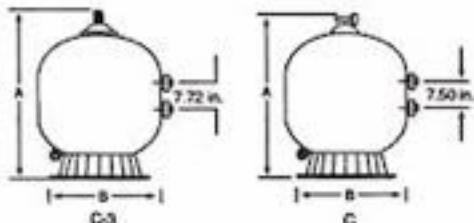
## COMMERCIAL SAND FILTERS

### TRITON HD FILTER

The Triton heavy duty (HD) filter is a thirty-inch fiberglass filter that offers a maximum operating pressure of 75 PSI. This filter is specifically designed for special high-pressure commercial applications that require up to 98 gpm, and is ideal for all heavy-duty commercial applications.



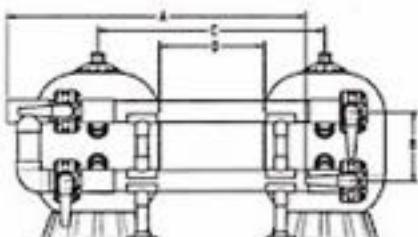
TR100 HD



### Triton Commercial Series Sand Filter Specifications

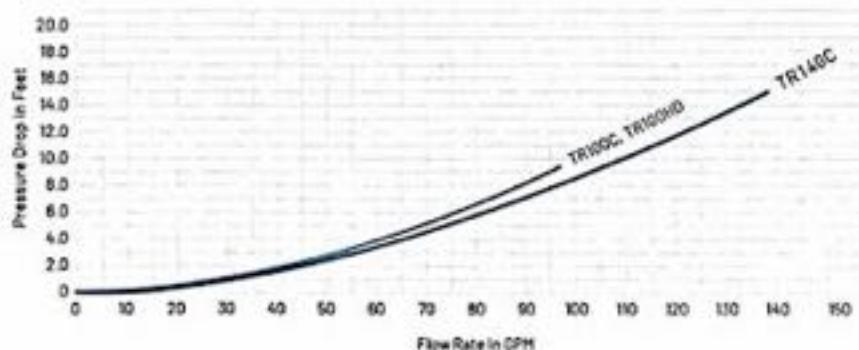
Model Number	Filter Area Sq. Ft.	Flow Rate		Turnover Capacity Gallons		Dimensions		Media Required	
		15 GPM/sq. ft.*	9 GPM	8 Hours	8 Hours	A	B	Sand	Sand/Gravel
TR100C	4.91	74	26,640	35,520	38 1/2"	30 1/2"	600 lbs.	450 lbs./50 lbs.	
TR140C	7.08	106	38,160	50,880	45 1/2"	36 1/2"	925 lbs.	650 lbs./275 lbs.	
TR1000-3	4.91	74	26,640	35,520	38 1/2"	30 1/2"	600 lbs.	450 lbs./50 lbs.	
TR1400-3	7.08	106	38,160	50,880	45 1/2"	36 1/2"	925 lbs.	650 lbs./275 lbs.	

\*15 GPM/sq. ft. typical commercial flow rate. Triton C Filters are approved for 5-20 GPM/sq. ft.



Two Filter System	A	B	C	D	Total Wt.
3"-TR100C	82 1/2"	12 1/2"	48 Min.	18 Min.	2,300 lbs.
3"-TR140C	88 1/2"	17 1/2"	54 Min.	18 Min.	3,200 lbs.
4"-TR140C	95 1/2"	19 1/2"	54 Min.	18 Min.	2,300 lbs.
6"-TR100C	111 1/2"	24 1/2"	54 Min.	18 Min.	3,550 lbs.

Note: 6" piping needs to be rotated upward as shown at 25° to handle will clear the floor.



1620 HAWKINS AVE | SANFORD, NC 27330 | UNITED STATES | 800.831.7133 | [pentair.com](http://pentair.com)

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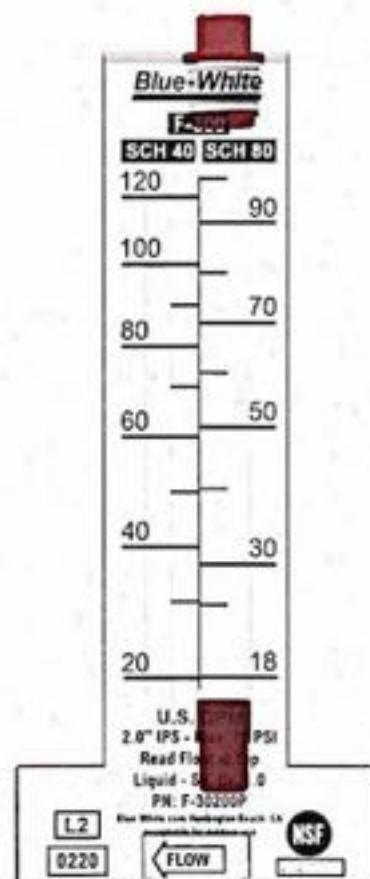
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## Blue White F-300 Flow Meter

[Home](#) > [Industrial Products](#) > [Industrial Flow Meters](#) > F-300

# F-300

## Pitot Tube Acrylic Flow Meter





An aquatics industry standard for over six decades, Blue-White's F-300 Flow Meter is accurate and has reduced space requirements for installation. The aerodynamic pitot tube is designed for smooth fluid flow through the meter. There are four capture points resulting in no float bounce.

New features include:

- PVDF cap that won't fade or crack
- PVDF float that won't stick, is chemical resistant, and easy-to read-color
- Improved accuracy

Recommended Accessories:

[F-300S, F-300SL Flow Switch and Sensor](#)

Technical Overview:



<b>GPM</b>	2 - 1900	<b>Fahrenheit (°F)</b>	190
<b>LPM</b>	8 - 7200	<b>Celsius (°C)</b>	88
<b>PSI</b>	75	<b>Body Material</b>	Acrylic
<b>Bar</b>	5.2	<b>Pipe Sizes</b>	1", 1½", 1¾", 2", 2½", 3", 4", 6", 8"

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**Pentair**  
**High-Capacity Chlorine**  
**Bromine Feeders**

# HIGH CAPACITY CHLORINE/BROMINE FEEDERS

Sanitization made super simple.

High capacity feeders are one of the easiest ways to sanitize large residential and commercial swimming pools using either chlorine or bromine slow-dissolve tablets. These heavy-duty, high capacity feeders provide automatic sanitization for pools up to 658,500 gallons. They are designed for off-line plumbing installations using one-inch PVC pipe and are available in three sizes to fit a variety of pool applications.



# The performance leader in automatic sanitization for large residential and commercial pools.

The INLET control valve side of the feeder connects to the plumbing on the discharge side of the pump, before the filter. The OUTLET side of the feeder connects to the pool return line after the filter and/or heater, pool cleaner, diverter valves or any other installed equipment. Installation of a corrosion-resistant check valve, such as #R172288 by Pentair, between the feeder inlet and outlet and the equipment is strongly recommended to check backflow of chemicals. This helps ensure equipment longevity.

## KEY FEATURES

### Heavy-duty control valve

For accurate feed rate adjustment.

### Completely enclosed system

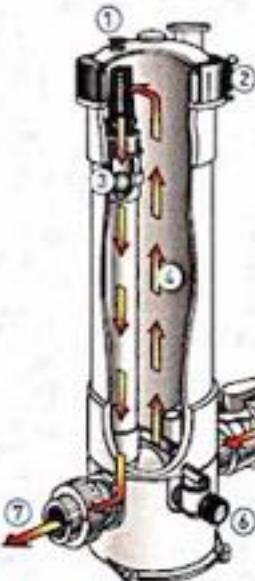
Prevents fumes from escaping—no special venting required.

### Easy access design

For easy recharging, servicing and simple maintenance.

### Threaded fittings included

Standard threaded inlet and outlet fittings included for easy installation.



**CALCIUM HYPOCHLORITE IS NOT TO BE USED IN ANY FORM.**  
Use of chemicals other than those recommended by manufacturer may be hazardous.

1. Vent valve bleeds air to ease lid removal.
2. Lock ring spins off, freeing lid and providing easy access. Snap-lock provides secure seal.
3. Screen and check ball are easy to reach for cleaning and periodic maintenance.
4. Flow-through circulation allows maximum output of sanitized water.
5. External dial control for easy flow rate adjustment.
6. Drain valve makes it easy to drain feeder for safer recharging and winterizing.
7. Unions are included for easy installation.

## MODELS & SPECIFICATIONS

Model	HC-3315	HC-3330	HC-3340	
Part Number	R17025	R17030	R17040	
Height	26"	39.25"	48.75"	
Width	8"	8"	8"	
Depth	15"	15"	15"	
Maintenance Clearance	22.75"	40.375"	51"	
Capacity (ft <sup>3</sup> )	15	30	40	
Flow Rate (GPM)	34	34	34	
100% Setting	Maximum Output Rate, Chlorine* (bs./hr.)—Pool at Listed Flow Rate	3.85	5.2	8.54
50% Setting	Maximum Output Rate, Chlorine* (bs./hr.)—Spa at Listed Flow Rate	3.87	6.59	8.89
0% Setting	Maximum Output Rate, Bromine* (bs./hr.)—Pool at Listed Flow Rate	1.59	2.63	2.57
Flow Rate (GPM)	17.0	17.0	17.0	
100% Setting	Output Rate, Chlorine* (bs./hr.)—Pool at Listed Flow Rate	1.28	2.61	3.39
50% Setting	Output Rate, Chlorine* (bs./hr.)—Spa at Listed Flow Rate	1.19	2.54	3.86
0% Setting	Output Rate, Bromine (bs./hr.)—Pool at Listed Flow Rate	0.68	1.26	1.50
Maximum Pool Size @ 34 GPM (Chlorine-Gal)	224,000	360,000	658,500	
Maximum Pool Size @ 34 GPM (Bromine-Gal)	93,200	164,000	292,600	

Maximum working pressure—50 psi

\*Results based on use of 1" Trichlor tablets.

Maximum operating flow—34 GPM





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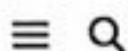
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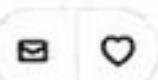
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**SR Smith**  
**6' 3 Bend SS Handrail**  
**With Escutcheons**

Delivery to  
Ronda, NC

Home &gt; #3HR-6-049-1-TP



## S.R. Smith 6' 3 Bend, Stainless Steel - Powder Coated Taupe Handrail w/ Escutcheons & 1' Extension, .049"

S.R. Smith 3HR-6-049-1-TP

[Write a Review](#) | [Ask a question](#)**\$755<sup>.29</sup>** ~~\$779.99~~

\$24.7 Saved! (3.2%)

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4.7 ★★★★★  
Google  
Customer Reviews

Special Order



Free Delivery

Generally ships in 7 Days.

Deliver to Ronda, NC

1

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### Quick Overview

3-Bend Stair Rails come in a wide variety of lengths to accommodate almost any pool.

Constructed of stainless steel, these rails can also be powder coated for additional protection.



Questions? Contact our pool professionals:

Email Us

Call Us

Chat with us

### Product Overview

### Specs & Details

Product Name	6' 3 Bend, Stainless Steel - Powder Coated Taupe Handrail w/ Escutcheons & 1' Extension, .049"
Manufacturer Part Number	3HR-6-049-1-TP
Sku	SRS-35-1734
UPC	840671105808

### Manufacturer



S.R. Smith



For more than 80 years, S.R. Smith has had a singular focus: Create products that make the pool experience better for both swimmers and owners. If ... [Show More](#)

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0 reviews

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Be the first to write a review

## Shipping & Returns

### Free shipping!

We ship to

Ships by Ground (faster options available)

### Delivery Options

To Ronda, NC

Standard	Est. Delivery: 2-5 days
Economy	Est. Delivery: 3-7 days

## >Returns

Don't love the item? We offer easy returns through pre-paid labels.

### 30-Day Return Policy

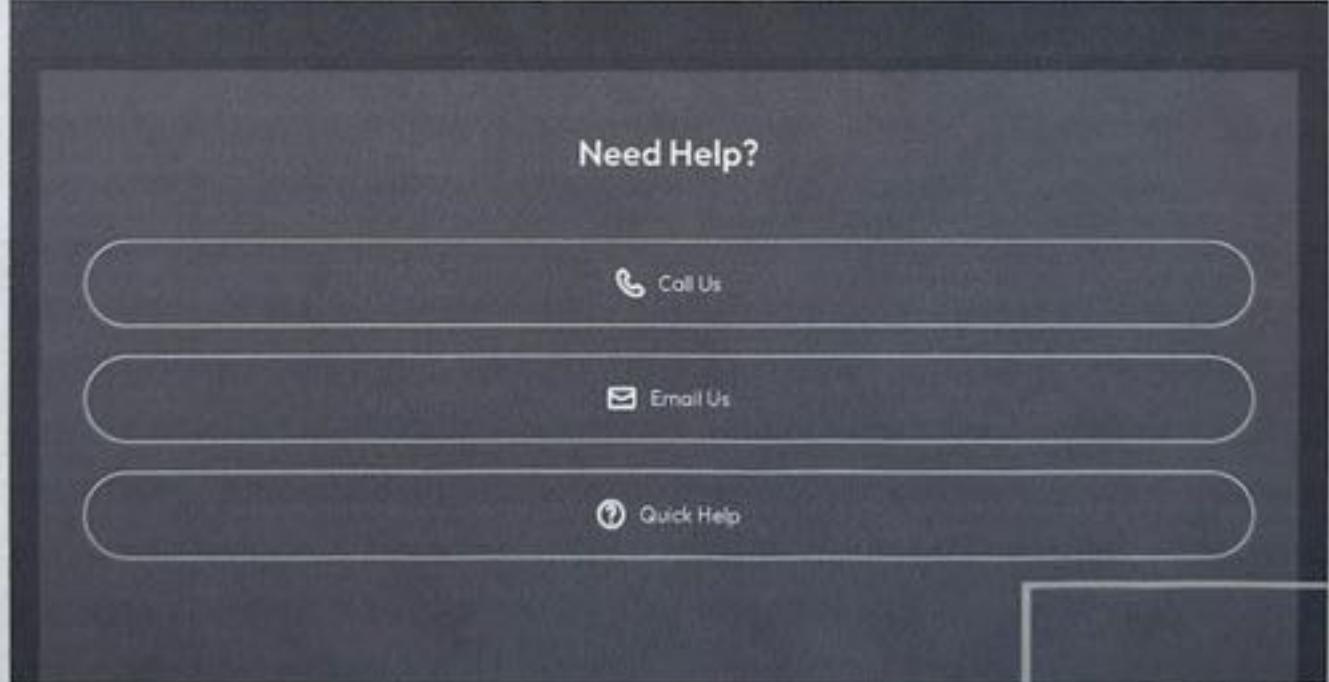
 **Shipping**

Your order means a lot to us. That's why we offer safe and reliable delivery options.

## Shipping Policy

#### ① California Proposition 65 Warning

WARNING: This product contains chemicals known to the state of California to cause cancer and birth defects or other reproductive harm. For more information: [www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov)





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# Aqua Creek Ranger-AT Pool Lift



# Ranger-AT Pool Lift



**PART #: F-411RPL-AT1**

US PATENT NUMBER: [D507,769 S] [7,249,386 B2]  
350 LB. [158 kg] MAXIMUM WEIGHT CAPACITY

## **MANDATORY** LEAVE THIS MANUAL WITH LIFT OWNER

Read and follow all instructions.  
Lift safety can only be ensured if the lift is installed and  
operated according to these instructions.

- NEVER permit children to play on or around the lift
- Do not allow children to use the lift without adult supervision
- NEVER apply direct water pressure to the electronics
- NEVER use the lift with a dry pool
- For safety reasons, NEVER swim alone



## **READ CAREFULLY**

Check entire box and all packing materials for parts. Before beginning assembly, read the instructions and identify parts using the figures and parts listed in this document.

It is critical that all parts be carefully inspected by the installer prior to installation to ensure no damage occurred in transit. If any damage occurred in transit, Aqua Creek Products, LLC must be notified within three days of receipt of unit.

Proper installation cannot be overstressed, as an improper installation voids Aqua Creek's warranty and may affect the safety of the user.

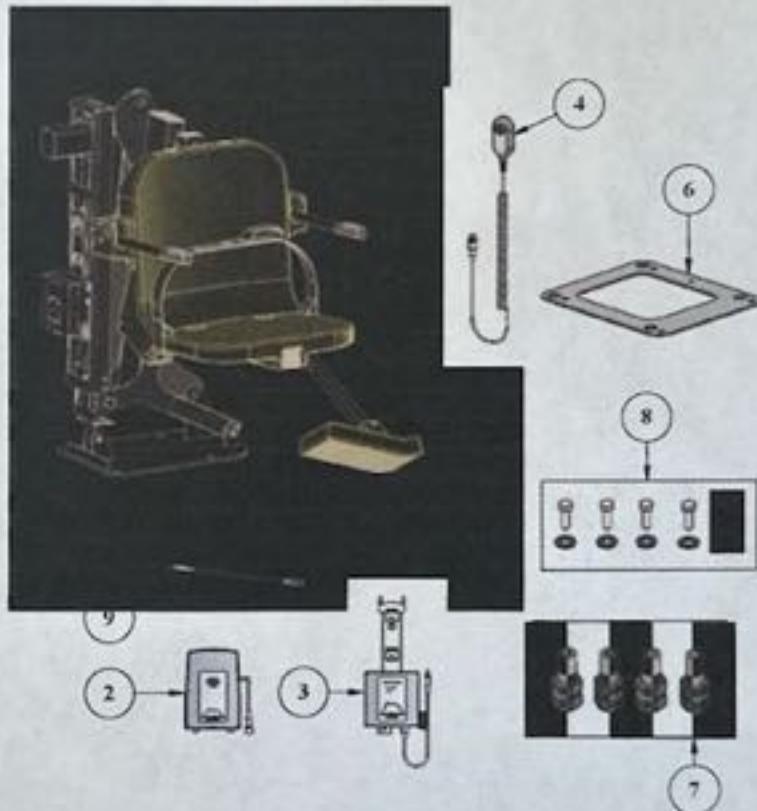
# Ranger-AT Lift

## Table of Contents

PAGE	DESCRIPTION	PAGE	DESCRIPTION
2	Ranger-AT Components	9-10	Basic Troubleshooting
3	ADA Installation Guidelines	11	Proper Care of Pool & Spa Lifts
4-5	Anchor Installation: Core-Drill Retro-Fit	12	Ranger-AT Parts List
6-7	Anchor Installation: Saw-Cut Retro-Fit/ New Construction	13	Seat Assembly Parts List
8	Ranger-AT Lift Assembly Instructions	14	Warranty

## Ranger-AT Components

1. RANGER-AT LIFT MAIN ASSEMBLY
2. 24 V BATTERY
3. BATTERY CHARGER
4. HANDSET
5. SAFETY BELT
6. ANCHOR JIG PLATE  
(IF ORDERED WITH ANCHOR)
7. ANCHOR INSERT BAG - SET OF 4  
(IF ORDERED WITH ANCHOR)
8. HARDWARE BAG  
(IF ORDERED WITH ANCHOR)
9. BATTERY TEST CABLE  
(SEE PAGE 10)



# Installation: ADA Guidelines

## ADA REQUIREMENTS:

The Ranger-AT Lift is ADA Compliant.

The installation must meet the following requirements:

- Clear Deck Space Dimensions (see FIGURE 1)
- Lift installed between 14.5-19 inches from the pool edge
- Deck slope no greater than 1:48
- The seat must go at least 18 inches into the water. The lift should be installed at a location with 42-48 inches of depth (deck to pool floor)
- Anchor setbacks are based on straight pool/spa walls. Curved pool/spa walls will effect the anchor setback.

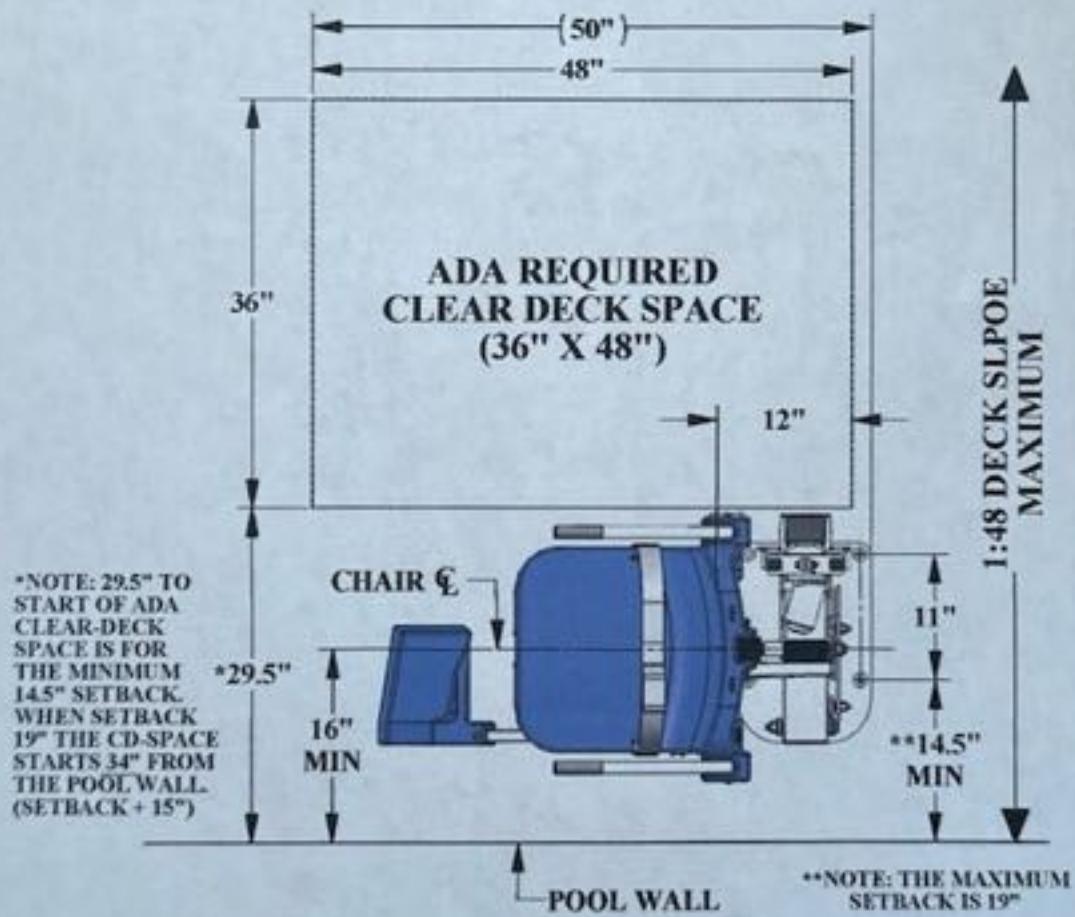


FIGURE 1

# Anchor Installation: Core-Drill Retro-Fit

NOTE: FOR DECKS 6" THICK OR MORE, 2500PSI MINIMUM STRENGTH CONCRETE REQUIRED

**You will need:**

- Core drill and 1½" core drill bit
- Tape measure
- Marking pen
- Hammer
- Cold chisel
- Torpedo level
- High strength 2-part construction epoxy\*
- Masking Tape
- Black electrical tape (optional)
- Anti-Seize packet

\*Aqua Creek recommends either Hilti™ Brand HIT RE-500-SD or Simpson™ brand SET-XP or equivalent (not included)



Anchor jig plate with hardware

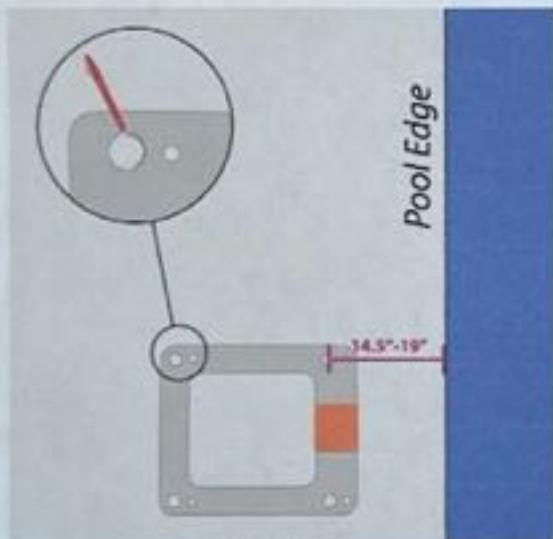


FIGURE 2

1. Mark the 4 hole locations on your deck using the larger holes of the anchor jig plate as a template. Make sure the center of the holes on the anchor jig plate are 14.5 to 19 inches from the pool's edge. SEE FIGURE 2

2. Drill the 4 hole locations to about 4 1/2 inches deep using the 1 1/2 inch drill bit. Make sure the holes are completely dry and clear of debris.

*NOTE: Create a depth marker on the drill bit with black electrical tape to make sure you drill to the right depth.*

*NOTE: Your local bonding regulations may require you to drill one hole larger than the others in order to bond at least one of the anchor inserts. You may need to saw cut a portion of your deck.*

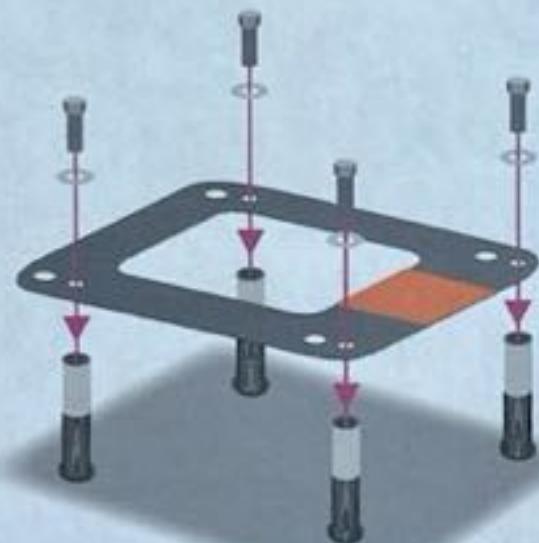
See "Saw Cutting Retro-Fit Instructions" on page 6.

3. Remove the nuts and the black protective coverings from the threaded anchor inserts.

## Anchor Installation: Core-Drill Retro-Fit (CONTINUED)

4. Thread the mounting hardware through the smaller anchor jig plate holes and into the anchor inserts. Make sure to use anti-seize on the threads! Make sure the tops of the inserts are flush with the bottom of the plate.

*NOTE: We recommend using masking tape around the holes on the bottom of the anchor jig plate to help prevent the anchor plate from being accidentally epoxied to the pool deck.*



5. Bond at least one of the anchor inserts according to your local code requirements. For more information see NEC Article 680.26.
6. Test fit the anchor inserts to make sure they line up properly. Place the anchor assembly into the pre-drilled holes and use a torpedo level to ensure your anchoring system is level.
7. Remove the anchor assembly and fill each hole halfway full with 2-part construction epoxy.
8. Place the anchor assembly back into the holes. Wiggle the assembly as you reinsert it to make sure the epoxy fully coats the threads.
9. Make sure your anchor assembly is level.
10. Once the epoxy has set up, remove the hardware and the anchor jig plate. Your lift is now ready to be mounted to the anchoring system. The anchor jig plate may be recycled or used to install other anchors.

## Anchor Installation: Saw-Cut Retro-Fit

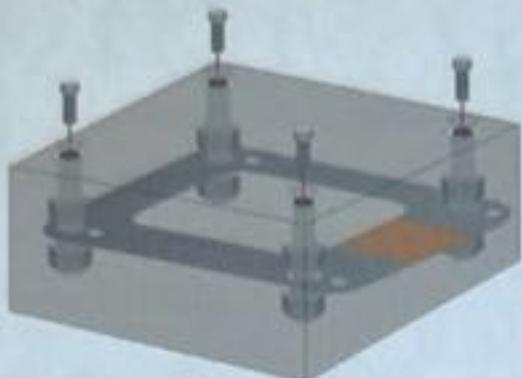


FIGURE A

### You Will Need:

- Concrete saw with diamond blade
- Tape measure
- 4' long straight edge or chalk line
- Sledge hammer
- Cold chisel
- Torpedo level
- String Line
- Concrete & concrete finishing tools
- #5 rebar

1. Remove 1 nut from each anchor insert. Place the anchor inserts through the larger hole of the anchor jig plate. Thread the removed nuts back onto the anchor inserts. The anchor plate should be sandwiched between the two nuts on each anchor insert. SEE FIGURE A

2. Mark out a section of the pool deck that you are removing. Plan on removing at least 4 feet 0 inches x 4 feet 0 inches.

3. Cut along your marks with a diamond blade concrete saw.

4. Using the sledge hammer break up the concrete within the cut area and remove the pieces.

6. Install rebar in the open area of the deck. Tie the rebar into the existing deck if possible. SEE FIGURE B



FIGURE B

7. Set the anchor system in place. Make sure the center of the large anchor jig plate hole is no more than 19 inches from the pool's edge. SEE FIGURE C, PAGE 7

8. Using the string line or a straight edge, make sure the top of each anchor body is level with the FINISHED deck surface. Each anchor body can be individually adjusted by turning the nuts with a large wrench.

9. Bond the anchoring system according to your local code requirements by using the bonding lug on the anchor plate. SEE FIGURE C, PAGE 7 (See NEC Article 680.26)

10. Pour concrete and finish the pool deck surface. SEE FIGURE A

11. Once the concrete has cured, your lift is ready to be mounted to the anchoring system. SEE FIGURE A

## Anchor Installation: New Construction

**NOTE:** For installations where a new deck is being poured, or where a dedicated pad is being poured just for the pool lift, the concrete must satisfy the ADA requirements outlined on page 4 of this manual.

**Your pool deck must be at least 4'-0" long by 4'-0" wide by 6" thick. It must be reinforced with 5 sticks of #5 rebar E-W, 2" clear (min) from the top and bottom of the footing.**

1. Remove 1 nut from each anchor insert. Place the anchor inserts through the larger hole of the anchor jig plate. Thread the removed nuts back onto the anchor inserts. The anchor plate should be sandwiched between the two nuts on each anchor insert.

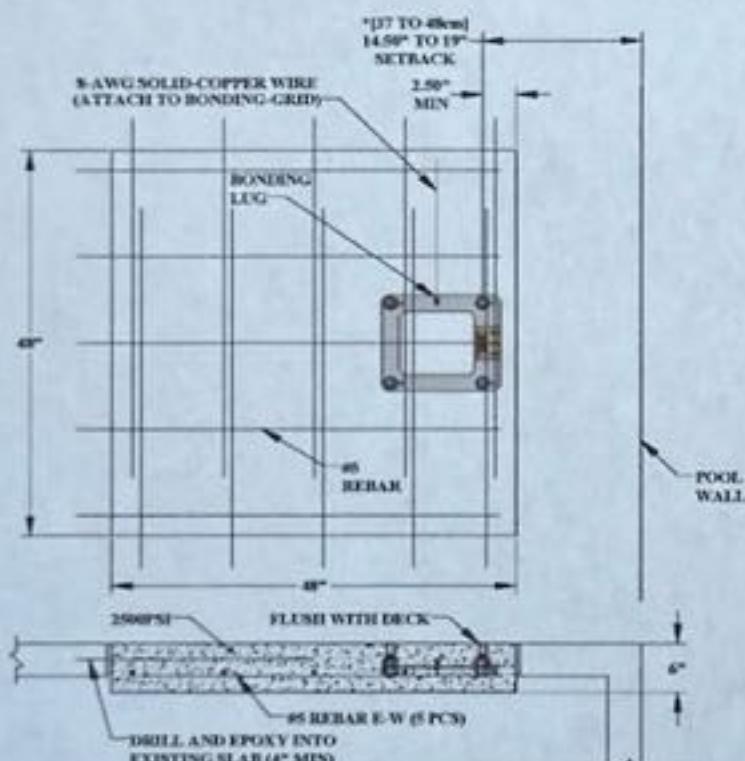
SEE FIGURE A, PAGE 6

## 2. Install rebar in the open area of the deck.

SEE FIGURE B, PAGE 6

3. Set the anchor system in place. Make sure the center of the large anchor jig plate holes are no more than 19 inches from the pool's edge.

SEE FIGURE C



\*SETBACK DIMENSIONS ARE FOR **FLAT DECK** APPLICATIONS  
FOR SLOPED DECKS OR OTHER FRAMING, CONTACT AQUA  
CRETE BEFORE INSTALLATION.

4. Make sure the top of each anchor body is flush with the FINISHED deck surface. Each anchor body can be adjusted individually by turning the nuts with a large wrench.

5. Bond the anchoring system by using the bonding lug on the anchor jig plate. Bond the system according to your local code requirements. (See *NEC Article 680.26*)

**SEE FIGURE C**

## 6. Pour your concrete and finish the pool deck surface.

**SEE FIGURE A, PAGE 6**

**7. Once the concrete has cured  
your lift is ready to be mounted to  
the anchoring system.**

SEE FIGURE A, PAGE 6

FIGURE C

# Ranger-AT Assembly Instructions

1. Attach seat belt to the seat. SEE FIGURE D



FIGURE D

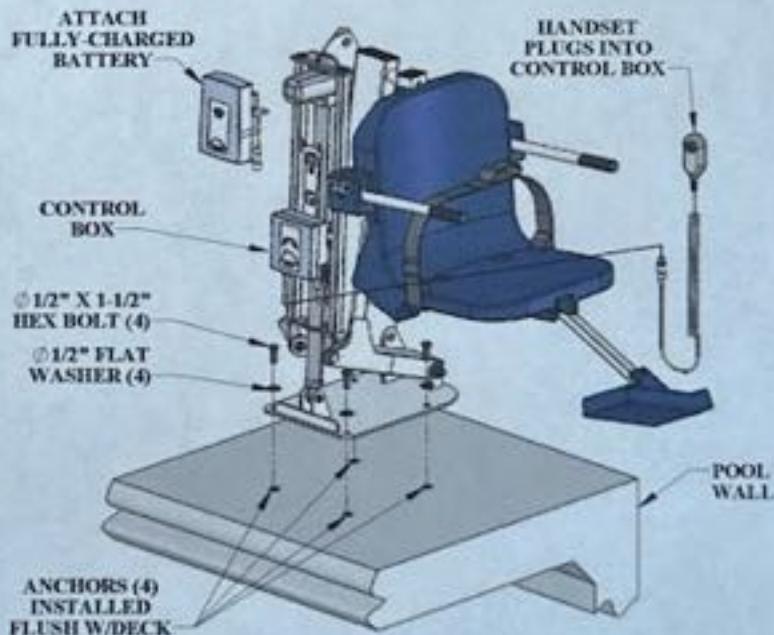
2. Install the Ranger-AT pool lift onto the four (4) anchors using the supplied 1/2 inch x 1 1/2 inches stainless steel hex-head bolts and 1/2 inch stainless steel flat washers. Make sure all bolts are tight before using the lift.

3. Apply dielectric grease to the plug terminals, including the o-ring seal. Plug the handset cable into the large handset socket on the bottom of the control box. Press the cord end firmly into the socket until you are sure it is completely in the socket. Failure to fully push the remote cord into the socket may result in faulty or interrupted operation.

4. Before installing the battery, place it on the charging unit and let it charge for 24 hours. Make sure the orange "charge" light illuminates when the battery is being charged.

5. Remove the fully charged battery from the charger and install it on top of the control box. The battery will line up with the control box, and will 'click' when it properly locks in place. Apply dielectric grease to the plug terminals, including the o-ring seal, and then connect the battery cable to the control box cable.

**WHEN NOT IN USE, STORE THE BATTERY ON THE CHARGER!**



# Basic Troubleshooting

**Problem:** The lift won't move.

## Solution:

1. Make sure the cords are properly plugged in:



**NOT Properly Inserted:**  
The cord plug is flush with  
or sticking out of the outlet



**Properly Inserted:**  
The cord plug is recessed  
into the outlet

Check the ends of the cords for corrosion or damage. The cord plugs should be recessed into the outlet. You should feel them pop into place when they are correctly inserted.

2. Check the contact points:



Make sure the contact point of the control box and the battery are not damaged or corroded. If there is corrosion clean with Scotch-Brite™ pad. Put some dielectric grease on the contact points before reattaching the battery.

3. Make sure the battery is fully charged:



The Charger is ON  
when the green  
light is glowing

The Battery is  
CHARGING when the  
orange light is glowing

When the Battery  
is fully charged the  
orange light will stop  
glowing

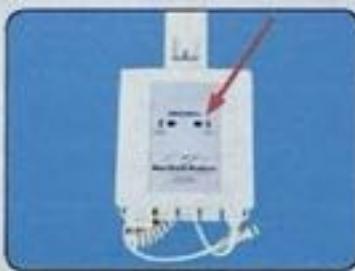
**Problem:** The lift stopped moving and is stuck.

## Solution:

1. Press the Emergency button

Press the emergency retract button on the front of the control box to retract the lift.

Note: the lift will not retract if the battery is not fully charged or if the control box is not working. The emergency button only overrides the remote handset.



For troubleshooting videos  
Visit: [www.aquacreek.com](http://www.aquacreek.com)  
or scan the QR Code below  
using your smartphone.

### FOR TROUBLESHOOTING ASSISTANCE

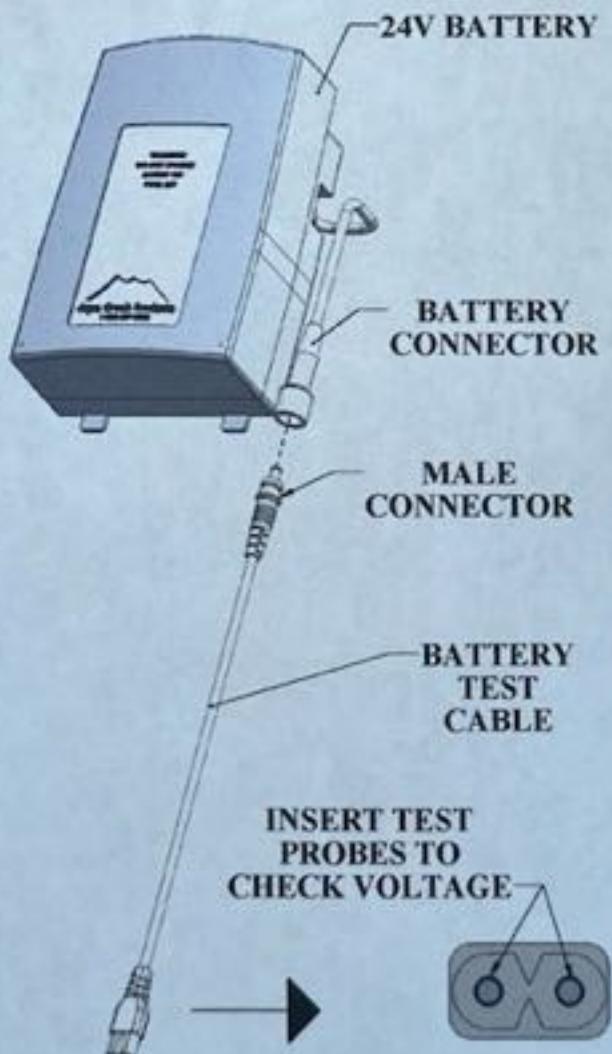


**Note:** If you feel your lift is malfunctioning due to a faulty battery or connections, contact Aqua Creek Products for a testing kit.

# Battery Test Cable Instructions

**WARNING! DO NOT ATTEMPT TO DIRECTLY PROBE THE BATTERY CONNECTOR TO TEST VOLTAGE. THIS MAY CAUSE PERMANENT DAMAGE TO THE BATTERY! USE THE SUPPLIED BATTERY TEST CABLE ONLY FOR CHECKING THE BATTERY VOLTAGE!**

The Aqua Creek 24V battery has a cable and connector for connecting to the control box or to the battery charger. The battery connector is not suitable to check the battery voltage, as it is very hard to probe the connector without shorting-out the battery, which will cause damage. For this reason, a separate battery test cable is provided. To safely check the battery voltage, use a voltmeter or multimeter with standard test probes, and insert the probes into the test cable as shown below.



# Proper Care of Pool & Spa Lifts

PROCEDURE	DAILY	WEEKLY	MONTHLY
Wash lift with fresh water and dry with clean, soft, non-abrasive cloth	✓		
Recharge battery	✓		
Run the lift through a complete test cycle to verify it is functioning properly	✓		
Visually inspect lift for damage, corrosion, and loose or missing hardware	✓		
Check all contact points for damage and/or corrosion		✓	
Repair, clean and apply dielectric grease to all contact points		✓	
Thoroughly clean lift frame and apply a liberal coat of car wax to maintain the lift's finish			✓
Check all Warning and Cautionary labels to make sure they are not faded or worn. Replace as needed.			✓

## PROPER CARE NOTES

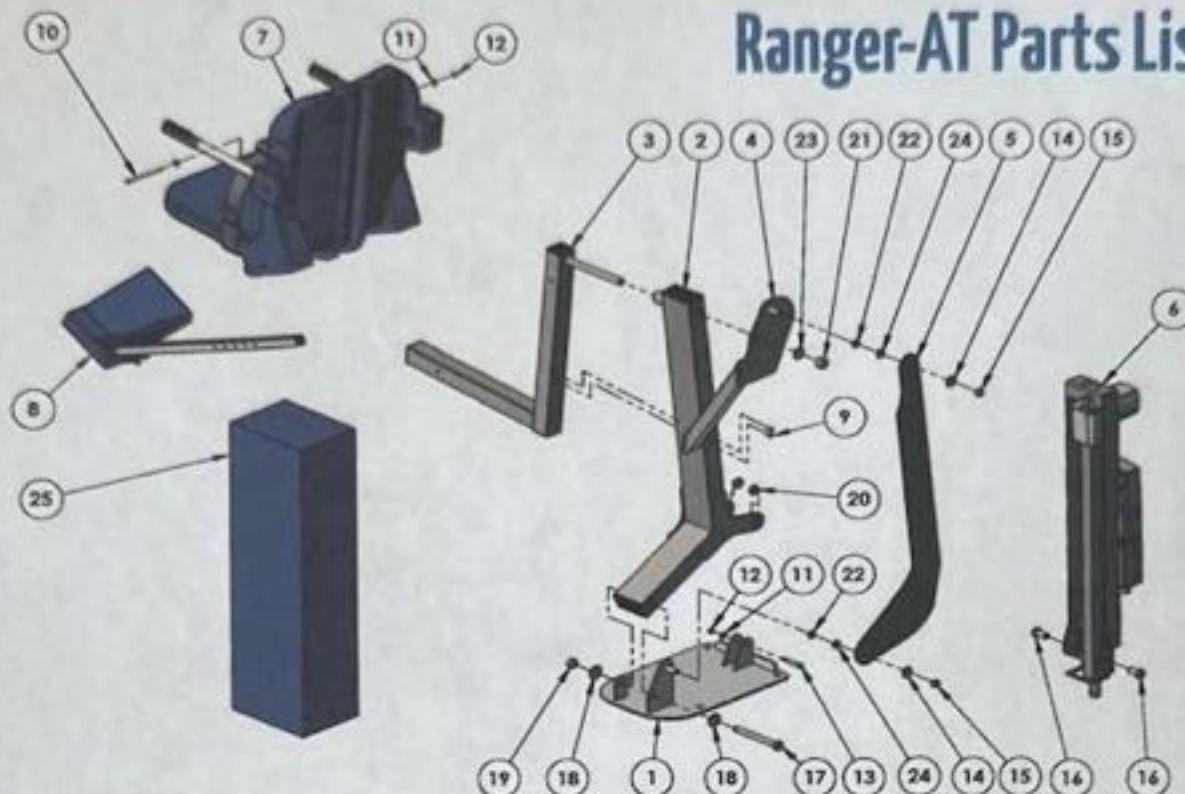
- Use only fresh water to wash your lift. Do not wash with pool water.
- Use only clean, soft, non-abrasive cloths on your lift.
- Do not store lift in pump room or near chemicals.
- Do not allow children to play on or around this lift.
- When cleaning the lift, do not spray water directly on control box or battery.
- The lift may need to be bonded according to local code requirements.

## STAIN REMOVAL TIPS:

*To remove stubborn stains from finish, spray affected area with mild dish soap, rub briskly with a 3M Scotch Brite™ pad. Use white epoxy paint to touch up the finish. Apply wax to protect when dry.*

For service and/or replacement parts, contact Aqua Creek Products  
Toll free: (888) 687-3552

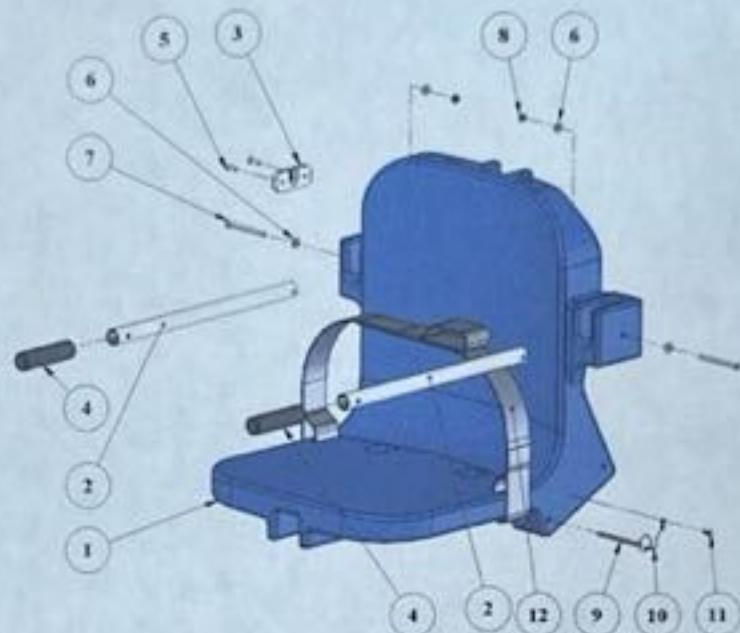
# Ranger-AT Parts List



ITEM #	QTY	PART #	DESCRIPTION
1	1	PPB-100-11	BASE ASSEMBLY
2	1	PPF-200-11	MAIN FRAME ASSEMBLY
3	1	A-2012ARM-R1	CHAIR ARM ASSEMBLY
4	1	A-2012SR52	SEAT SUPPORT ASSEMBLY
5	1	L-2014FBL-PAT-R2	CONTROL ARM
6	1	UHF-RV-00	UNIVERSAL ACTUATOR ASSEMBLY
7	1	SA-0904CA-A	18" CHAIR ASSEMBLY
8	1	F-0904FRA	FOOTREST ASSEMBLY
9	2	BHW 1/4 X 3/4	BOLT, 316 SS, 1/4-20 X 3/4 HWH
10	1	BH 5/16 X 4-1/2	BOLT, 316 SS, 5/16-18 X 4 1/2 HCS
11	3	WF 5/16	WASHER, FLAT, 5/16, 316 SS
12	2	NN 5/16	NUT, 316 SS, NYLOCK, 5/16"-18
13	1	BS 3/8 X 1-3/4 18-8	BOLT, 18-8 SS, 3/8 X 1 3/4 SHOULDER, 5/16-18 THREAD

ITEM #	QTY	PART #	DESCRIPTION
14	2	WF 1/2	WASHER, FLAT, 1/2, 316 SS
15	2	NN 1/2	NUT, 316 SS, NYLOCK, 1/2"-13
16	2	BH 5/8 X 1-1/4	BOLT, 316 SS, 5/8-11 X 1 1/4 HCS
17	1	BH 5/8 X 5-7/8 18-8	BOLT, 18-8 SS, 5/8-11 X 5 7/8 HCS, CUSTOM
18	2	WF 5/8	WASHER, FLAT, 5/8, 316 SS
19	1	NN 5/8	NUT, 316 SS, NYLOCK, 5/8"-11
20	2	NNJ 5/8	NUT, 316 SS, NYLOCK, 5/8"-11, JAM NUT
21	1	NN 3/4	NUT, 316 SS, NYLOCK, 3/4"-10
22	2	THRUST WASHER, 1/2, BRONZE	WASHER, BRONZE, 1/2", TT-1001-1
23	1	THRUST WASHER, 3/4, BRONZE	WASHER, BRONZE, 3/4", TT-1205-1
24	2	BRB FL-50-3	BUSHING, BRONZE FLANGE, 1/2 X 5/8 X 3/8 X 1/8
25	1	F-45ACB-C	COVER, ACTUATOR, WATER RESISTANT

## Seat Assembly Parts List



ITEM #	QTY	PART #	DESCRIPTION
1	1	P-901	CHAIR, PLASTIC, 18" BLUE
2	2	P-2100FLA-38	CHAIR II ARMREST TUBE
3	1	P-1208HSB	BRACKET, PLASTIC, HANDSET BRACKET
4	2	RUBBER HAND GRIPS	GRIP, RUBBER HAND GRIPS
5	2	SFL 12 X 3/4	SCREW, 316 SS, #12 X 3/4", FHMS
6	4	WF 1/4	WASHER, FLAT, 1/4, 316 SS
7	2	BB 1/4 X 3-1/4	BOLT, 316 SS, 1/4-20 X 3 1/4 BHSCS
8	2	NN 1/4	NUT, 316 SS, NYLOCK, 1/4"-20
9	1	COTTER PIN, 1/4 X 3 1/4	PIN, COTTERLESS PIN, 18-8 SS, 1/4 X 3 3/4
10	1	LANYARD	LANYARD, FOR FOOTREST PIN, SS
11	1	SPH 10 X 3/4	SCREW, 316 SS, #10 X 3/4", PHSMS
12	1	F-385B	SEAT BELT, 2" BLACK w/ VELCRO

## **AQUA CREEK PRODUCTS, LLC LIMITED FIVE (5) YEAR WARRANTY:**

### **RANGER POOL LIFT**

(ITEM #'S: F-411RPL-AT1, F-411RPL-R-AT1, F-411RPL-AT1-EU)

Aqua Creek Products, LLC (a.k.a. Aqua Creek) warrants to the original end user purchaser that products manufactured by Aqua Creek, when properly installed in accordance with assembly and installation instructions, and properly used and maintained, shall be free from defects in material and workmanship for a period of **five (5) years from the date of original purchase**, provided that Aqua Creek receives prompt notice in writing of any defect or failure and satisfactory proof thereof, with the following exception(s):

#### **Exceptions:**

- All electrical components, including the linear actuator shall have the following warranty period:
  - Year 1-2: 100% Coverage
  - Year 3: 60% Coverage (Customer is responsible for 40% of replacement cost)
  - Year 4: 50% Coverage (Customer is responsible for 50% of replacement cost)
  - Year 5: 40% Coverage (Customer is responsible for 60% of replacement cost)
- Hydraulic actuators and mesh slings shall have a warranty period of **one (1) year from the date of original purchase**.
- Powder coat finish scratches, scrapes, corrosion, or dents from customers normal use, negligence, or abuse

This warranty specifically excludes reimbursement for labor to remove, repair, or install the product and any shipping charges. These warranties do not cover any damages due to accident, misuse, abuse, negligence or failure to properly maintain any products, or normal wear and tear from day to day operations. In the event that any products are altered, repaired, or improperly installed or improperly used by anyone without the prior written approval by Aqua Creek, all warranties are void. **IMPORTANT: AMOUNT OF WEIGHT PLACED ON LIFT SHALL NOT EXCEED THE RATED LIFTING CAPACITY FOR THE LIFT. NEVER OPERATE THE LIFT UNDER LOAD IN A DRY POOL (WITH NO WATER IN THE POOL).** It is the responsibility of the lift owner to verify the weight of the patron for warranty claim purposes and to ensure that the lift is not overloaded. Non-payment for product to Aqua Creek may void warranty.

To initiate a warranty claim, the owner of an Aqua Creek product must provide the place of purchase, in writing, with a full description of the product, its serial number, the dates of purchase and installation, and the exact nature of the defect. Within thirty (30) days after receipt of a written warranty claim by Aqua Creek, and barring any unforeseen delays, the place of purchase will be notified of Aqua Creek's decision regarding the claim.

If requested by Aqua Creek, any defective product must be returned, freight prepaid by customer, to Aqua Creek's designated factory location or duly appointed distributor for inspection and/or repair. Aqua Creek will, at its option, repair or replace the failed or defective item, and deliver the repaired product or replacement to the customer. All freight charges are the responsibility of the customer. Products returned to Aqua Creek for which Aqua Creek provides replacement under this limited warranty shall become the property of Aqua Creek. A new warranty period shall NOT be established for the repaired or replaced products. Such products shall remain under warranty only for the remainder of the original warranty period on the original products purchased.

This written limited warranty constitutes the final, complete and exclusive statement of warranty terms. No person or organization is authorized to make any other specific or implied warranties or representations on behalf of Aqua Creek.

**THE WARRANTIES SET FORTH HEREIN ARE IN LIEU OF ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED, WHICH ARE HEREBY DISCLAIMED AND EXCLUDED, INCLUDING WITHOUT LIMITATION ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR USE.**

**THE SOLE AND EXCLUSIVE REMEDIES FOR BREACH OF ANY AND ALL WARRANTIES WITH RESPECT TO THE PRODUCTS SHALL BE LIMITED TO REPAIR OR REPLACEMENT AT AQUA CREEK'S DESIGNATED FACTORY LOCATION, OR DULY APPOINTED DISTRIBUTOR, OR IN PLACE AT AQUA CREEK'S OPTION. IN NO EVENT SHALL AQUA CREEK'S LIABILITY EXCEED THE ENTIRE AMOUNT PAID TO AQUA CREEK BY THE ORIGINAL PURCHASER FOR THE FAILED OR DEFECTIVE PRODUCT.**

**IN NO EVENT SHALL AQUA CREEK PRODUCTS, LLC BE LIABLE FOR ANY INCIDENTAL, CONSEQUENTIAL, SPECIAL, INDIRECT, PUNITIVE OR EXEMPLARY DAMAGES OR LOST PROFITS FROM ANY BREACH OF THIS LIMITED WARRANTY OR OTHERWISE.**

**THIS WARRANTY GIVES YOU SPECIFIC LEGAL RIGHTS AND YOU MAY ALSO HAVE OTHER RIGHTS, WHICH MAY VARY FROM STATE TO STATE. SOME STATES DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL, SPECIAL OR CONSEQUENTIAL DAMAGES, SO SOME OF THE ABOVE LIMITATIONS OR EXCLUSIONS MAY NOT APPLY TO YOU.**

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Missoula, MT 59808  
Toll Free: (888) 687-3552  
Local/Intl: (406) 549-0769  
[www.aquacreek.com](http://www.aquacreek.com)



***Mastin Aquatic Group LLC***  
***Established April 1973***



**Design**

**Development**

**Construction**

**Renovations**

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NC Lic: 38992      SC Lic: G118939      VA Lic: 2705157885

**Pentair**  
**Intellibrite 5G White LED**  
**Lighting**



## INTELLIBRITE® 5G WHITE LED COMMERCIAL WHITE LIGHTING



### PURE WHITE LIGHTING

Assure the purest and whitest illumination in your commercial water with the IntelliBrite 5g white LED light. With an equivalent light output equal to a 300, 400 and 500 watt incandescent light, the commercial IntelliBrite 5g white LED light enhances the beauty of commercial water features, water theme parks and municipal pools.

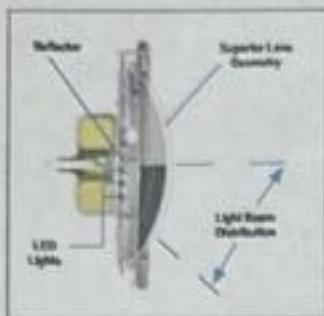
These energy saving LED lights provide powerful illumination while utilizing minimal electrical consumption. Let IntelliBrite 5g white LED commercial lighting systems from Pentair delight evening swimmers.

### STANDARD FEATURES

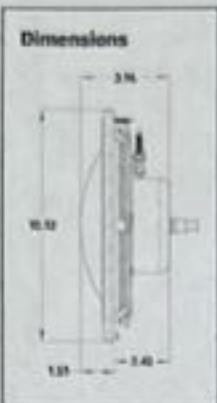
- IntelliBrite 5g white LED lights use only 45-70 watts.
- Now in 300, 400 and 500 watt incandescent light equivalents.
- The brightest white LED pool lighting option on the market.
- LED technology provides longer life, and up to 86% less energy than comparable incandescent lights.
- Superior lens geometry and innovative reflector design combine to create a wider beam and more uniform light distribution.
- Solid-state technology with no internal filament.
- Compatible with our stainless steel and plastic niches.
- Available in 120V and 12V versions.



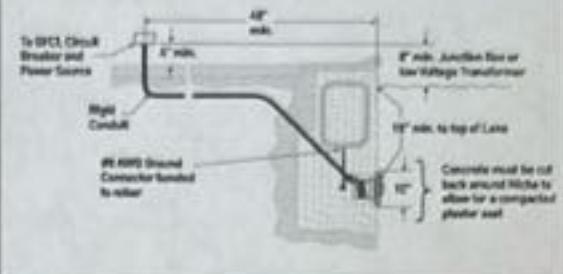
## INTELLIBRITE® 5G WHITE LED COMMERCIAL WHITE LIGHTING



Drawing shows innovative lens and reflector designs which combine to provide superior light beam distribution.



Front and back cover



Installation requires meeting electrical requirements and standard local codes.

Available in 300, 400 and 500 watt incandescent light brightness equivalents.

### Energy Output in Watts

Incandescent Light	IntelliBrite 5g White LED Light
300 Watts	45 Watts
400 Watts	55 Watts
500 Watts	70 Watts



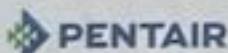
Also available is the IntelliBrite 5g white LED spa light, equal to 108 watts of incandescent brightness, while using only 18 watts.

An Eco Select® Brand Product

LED [Light Emitting Diode] pool and spa lights are the most energy efficient pool and spa lighting option available. That's why IntelliBrite 5g white LED lights are an Eco Select brand product.

The Eco Select brand identifies our "greenest" and most efficient equipment choices. These products save energy, conserve water, eliminate noise, or otherwise contribute to a more environmentally responsible equipment system.

As the global leader in pool and spa equipment manufacturing, we strive to provide greener choices for our customers. We hope you will join us in embracing more eco-friendly poolscapes by choosing Eco Select braided products for your swimming pool.



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***Mastin Aquatic Group LLC***  
***Established April 1973***



**Design**

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**Pentair**  
**Automatic Water Filler**

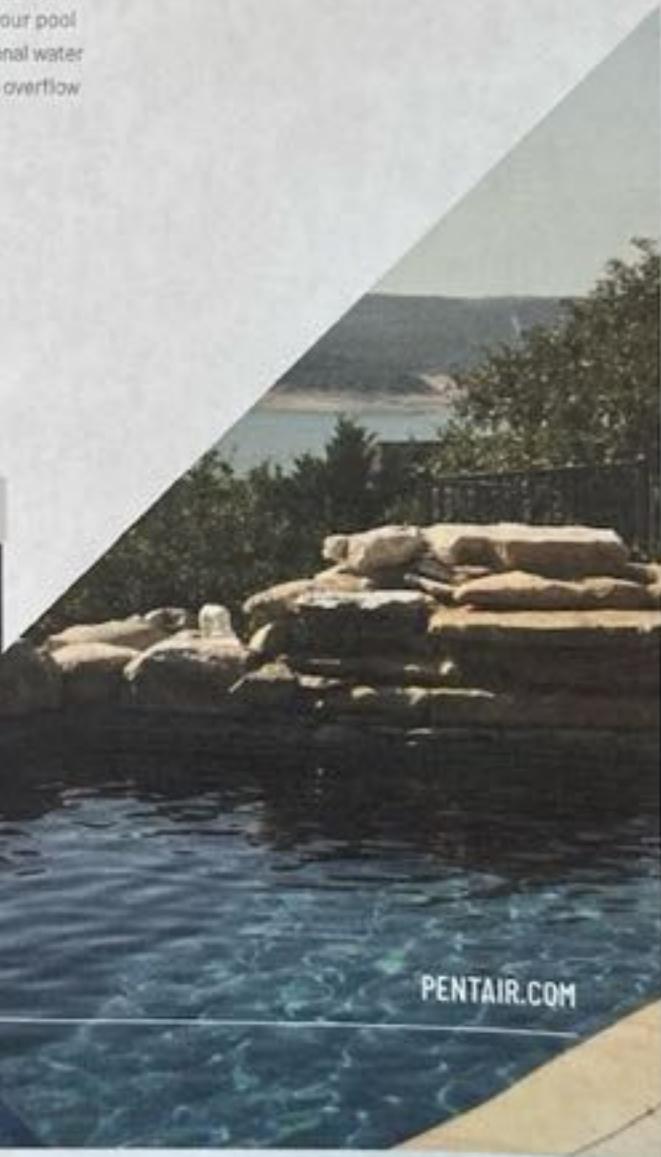


AUTOMATIC WATER FILLER

# AUTOMATIC WATER FILLER

Help protect your pool equipment by ensuring proper water level.

Failure to keep your water level right can result in damage to pool equipment. The Pentair automatic water filler helps protect your investment by using simple, reliable float mechanisms to monitor and control the water level in your pool or spa. When water drops below a preset level, the unit meters in additional water until the proper level is restored. If water levels are too high, the built-in overflow will take the right amount of water out of the system.



PENTAIR.COM

## AUTOMATIC WATER FILLER

Helps prevent equipment and landscape damage



Pentair automatic water filters are the latest in automatic pool and spa water level controls. Simple and reliable, with no need for electronic controls, they ensure that your water levels are right for pool and spa operation and enjoyment.



### KEY FEATURES

#### Side- or bottom-mounted valves

All models are available with side- or bottom-mounted plastic fill valves. Standard model can be equipped with either a side-mounted valve or a bottom-mounted Fluidmaster® Valve.

#### Compact design

Compact, seven-inch diameter design makes it easier to incorporate into new designs or renovations in both standard and vanishing edge pools.

#### ABS polymer construction

Tough, corrosion- and chemical-resistant ABS polymer construction.

#### Low water prevention

Prevents low water levels that can damage equipment.

#### Availability options

Available for standard inground and vanishing edge pools.

#### Color matching lid and rings

Top lid and ring available in white, black, gray, dark gray and tan. Lid assembly colors match that of all Pentair skimmers, laminars and deck jets.

#### Reduces overfill damage

Reduces water waste and landscape damage that can result from overfilling pool.



400 Regency Forest Dr | Cary, NC 27518 | United States | 800.831.7133 | [pentair.com](http://pentair.com)

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***Mastin Aquatic Group LLC***  
***Established April 1973***



**Design**

**Development**

**Construction**

**Renovations**

North Wilkesboro, NC Office • (336) 984-2570 • Cincinnati, OH Office • (513) 324-3349  
NC Lic: 38992      SC Lic: G118939      VA Lic: 2705157885

**S.R. Smith**  
**Commercial SS Swimming**  
**Pool Ladder**

Polished  
Stainless  
Steel[FIND A DEALER](#)

## STANDARD PLUS COMMERCIAL LADDER

### PRODUCT DESCRIPTION

Standard Plus Commercial Ladders are made from thick stainless steel tubing, and are suitable for heavy duty use in commercial aquatic facilities. These ladders can be configured with either durable plastic or stainless steel treads. Standard Plus Commercial



Ladders are available in other Powder-Coated or SealedSteel® finishes as custom orders. Please reach out to [customerservice@srsmith.com](mailto:customerservice@srsmith.com) to confirm details.

**Specifications:** Tubing: 1.50" or 1.90", OD, .065", .109" or .145" wall. Type: 304 stainless steel. Number of treads: 2, 3, 4, or 5. 6" radius bends.

#### Shipping Dimensions:

30-86 lbs, 61"-76'L x 29"-40"W x 2'H

#### PART NUMBERS

##### PLASTIC TREAD Stainless Steel / Marine Grade

23"	29"	35"
2-Step: 10001 / 10001-MG	2-Step: 10013 / 10013-MG	2-Step: 10025 / 10025-MG
3-Step: 10004 / 10004-MG	3-Step: 10016 / 10016-MG	3-Step: 10028 / 10028-MG
4-Step: 10007 / 10007-MG	4-Step: 10019 / 10019-MG	4-Step: 10031 / 10031-MG
5-Step: 10010 / 10010-MG	5-Step: 10022 / 10022-MG	5-Step: 10034 / 10034-MG

##### STAINLESS STEEL TREAD Stainless Steel / Marine Grade

23"	29"	35"
2-Step: 10037 / 10037-MG	2-Step: 10049 / 10049-MG	2-Step: 10061 / 10061-MG
3-Step: 10040 / 10040-MG	3-Step: 10052 / 10052-MG	3-Step: 10064 / 10064-MG
4-Step: 10043 / 10043-MG	4-Step: 10055 / 10055-MG	4-Step: 10067 / 10067-MG
5-Step: 10046 / 10046-MG	5-Step: 10058 / 10058-MG	5-Step: 10070 / 10070-MG

Documents

Photos

Specifications

[Standard Plus Ladder Data Sheet \(pdf\)](#)

[Rails and Ladders Brochure \(pdf\)](#)



#### REGISTER YOUR PRODUCT





***Mastin Aquatic Group LLC***  
***Established April 1973***



**Design**

**Development**

**Construction**

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**SGM**  
**Diamond Brite Plaster**



*The Leader in Quality  
Swimming Pool, Spa  
& Fountain Finishes*

*There's more to a great pool finish  
than meets the eye...*

A great pool finish is durable, comfortable, easily maintained and enhances your poolscapes environment. Diamond Brite from SGM is all that and more.

Diamond Brite combines natural quartz aggregate, polymer-modified cement and non-fading Diamond Quartz in a stunning variety of colors. The result is a unique finish that stands up to the harshest pool environments while providing years of enjoyment.

800.641.9247

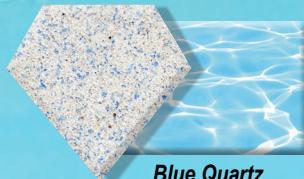
[www.sgm.cc](http://www.sgm.cc)

**SGM** SWIMMING  
POOL, SPA &  
DECK FINISHES

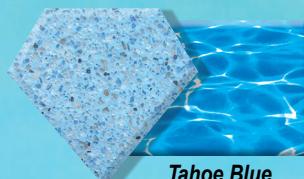
Diamond Brite's dynamic, factory blended finishes and simple maintenance feature makes it well suited for fountains and spas, as well as other water features. Its insoluble quartz aggregate is unaffected by the harshest pool chemicals and resists permanent staining. The Diamond Quartz accent colors won't rust, rub off or fade like other colored aggregates because our coating technology produces a tough, permanently bonded color aggregates. Additionally, the accent colors in Diamond Brite give the surface a variegated appearance, masking the slight imperfections that are readily apparent in traditional finishes. You'll also have an added sense of security knowing that your pool is comfortable to the feet and slip resistant.



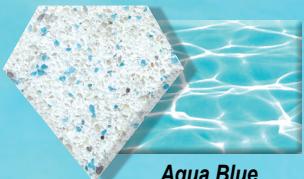
Oyster Quartz



Blue Quartz



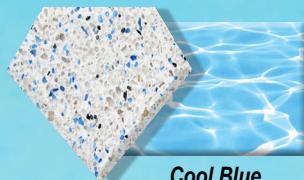
Tahoe Blue



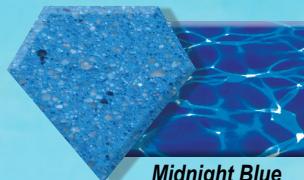
Aqua Blue



Ivory



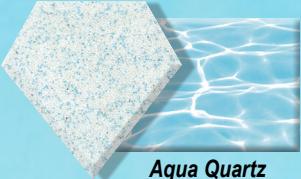
Cool Blue



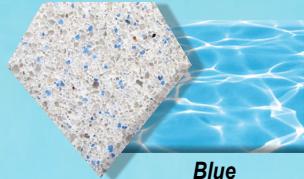
Midnight Blue



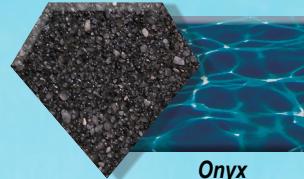
Marlin Blue



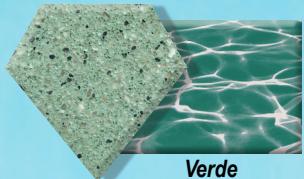
Aqua Quartz



Blue



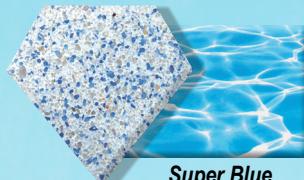
Onyx



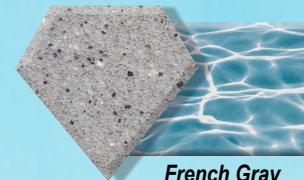
Verde



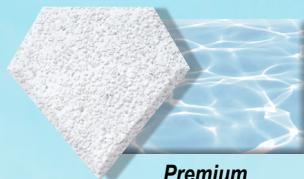
Classic



Super Blue



French Gray



Premium Commercial White

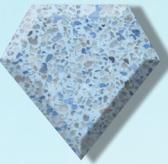
**Commercial Projects:** Premium Commercial White is specially formulated for commercial installations, and is the only Diamond Brite choice that offers a 10 year extended warranty for commercial pools. Made from 100% Pure Diamond Quartz ceramic colored white aggregate, Premium Commercial White meets and exceeds Industry and Municipal Standards for Total Solar Reflectance.

## DIAMOND BRITE® Watercolors

Two or more Diamond Brite selections can be blended to create the unique finishes of the **Watercolor Series**, which complement a variety of poolscapes.



Cool Quartz



Tahiti Blue



Bahama Breeze



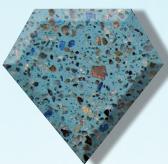
Grecian Slate



Steel Blue



Aegean Sea



Isla Verde



Ocean Blue



Cobalt

### Warranty

You can be assured the highest quality materials have been used and our products are supported by the best warranty program in the industry. It's a sign of our commitment to achieve the highest quality standards in all our swimming pool, spa and fountain finishes.

To register your warranty online visit:  
[www.sgm.cc](http://www.sgm.cc)

\*Sample colors are as accurate as modern printing can produce. The color of your pool may vary due to water depth, lighting conditions at job-site, mixing and installation methods. For best results, match to a keychain sample chip or wet cement sample chip.

800.641.9247

[www.sgm.cc](http://www.sgm.cc)

**SGM** SWIMMING  
POOL, SPA &  
DECK FINISHES

800-641-9247 (tel:18006419247)

📍 SGM Pompano Beach (<https://goo.gl/maps/gh9ujfkTGk94moA77>)

📍 SGM Tampa (<https://goo.gl/maps/ZMZiQd97XPij8wV78>)

📍 SGM Dallas (<https://goo.gl/maps/mf2gDPzaNmWAiZgF8>)

🔍 Search

# POOL PRODUCTS



## Diamond Brite®

Exposed Aggregate Pool Finish

Diamond Brite® finishes are blends of selected quartz aggregates and fortified white Portland cement ideal for new or re-finished swimming pools.

Diamond Brite® finishes are factory blended to provide the pool owner with an extremely durable and attractive alternative to traditional pool coatings. Available in a variety of colors and textures.

800-641-9247 (tel:18006419247)  
REQUEST INFO

SGM Pompano Beach (<https://goo.gl/maps/gh9ujfkTGk94moA77>)

SGM Tampa (<https://goo.gl/maps/ZMZiQd97XPij8wV78>)

SGM Dallas (<https://goo.gl/maps/mf2gDPzaNmWA1zgF8>)

## **INFO      COLORS      TECHNICAL      WARRANTY**

### **SURFACE PREPARATION**

Examine pool surfaces to identify conditions that might interfere with the proper bonding of coating. Look for algae, mold, mildew, dirt, paint, mortar droppings, efflorescence, patching compounds, loose tile, cracked plaster, et cetera. Identify hollow spots in plaster by sounding. Clean pool surfaces of all material that might interfere with the proper bonding of coatings. Clean with high-pressure water or by sandblasting. Wash with chlorine until algae, mold, and mildew are gone. Wash oil and grease spots using tri-sodium phosphate or equivalent and water; soak if necessary. Remove all cleaning solutions via high-pressure washing. Remove and repair all hollow and de-laminated plaster. Saw cut an area three (3) inches around bad spots and remove plaster inside the saw cut. Undercut the edges of the remaining plaster. Fill holes with specified patching cement SGM HSR High Strength Render to a level of existing plaster. Remove loose tile and fittings; undercut existing plaster two (2) inches below the tile line, and around return lines and fittings to a depth of 3/8 inch. Stop water penetration from the outside pool. Plug cracks and leaks around fittings using hydraulic cement (*SGM Dynamite Pool Patch*). Etch clean the surface with a muriatic acid solution. Use concentration necessary to clean and roughen the surface; smooth surfaces may require higher concentration. Neutralize surface with a solution of baking soda and water to eliminate acid residue, which can cause bond failure. Remove remaining acid solutions via high-pressure washing. Plug pool inlets and outlets to prevent clogging with expandable plugs or threaded caps. Mark location of fittings

using tape on coping or on a measured drawing. Place the <https://www.sgmcc.com/product/diamond-brite/> main drain to remove all running and standing water. Do not begin installation until the concrete pool shell has cured at least 28 days. For renovation projects (plastering over an <https://www.sgmcc.com/product/diamond-brite/> shell) apply SGM BOND-KOTE™ as directed. Allow BOND-KOTE to cure for at least six (6) hours before plastering. The plaster should be applied to BOND-KOTE within three (3) to five (5) days. If left for a longer period before the finish is applied, ensure Bond Kote is clean and free of dirt, efflorescence, and other contaminants. If necessary, clean BOND-KOTE by brushing vigorously while spraying with water; chlorine may be used as needed.

## MIXING

Diamond Brite is made in batches of 4,000 to 20,000 lbs. (1,800 to 9,000 kg.) using natural ingredients. For this reason, there will be variations in shade between batches. Batch numbers are printed at the end of each individual bag. It is important that the user follow these instructions carefully to ensure the most consistent color throughout the pool.

Jobsite additives, such as calcium chloride solutions, pump-aides, or bonding agents can affect the color of this product. For best results mix product using only cool clean, potable water. If adding any other approved additives, hold a portion of the mix water to dissolve the additives, screen and add the final amount to mixer. Additives should be introduced at the end of the mixing process. Ensure that the additives are mixed with water and pre-dissolved.

1. Separate the bags according to the batch numbers on the bottom of each bag. Record all batch numbers. Warranties submitted without valid batch numbers are VOID.
2. Blend different batches together in each mix according to the ratio present at the job site.
  - o **FOR EXAMPLE:** If there are thirty (30) bags total on the job and there are twenty (20) bags of Batch A and ten (10) bags of Batch B, then use two

(2) bags of Batch A to one (1) bag of Batch B (80 lbs bag mix) (Ref: 18006419247)

- **SGM Pompano Beach** (<https://goo.gl/maps/gh9ujfkTGk94moA77>)  
Coverage: Each 80 lbs. bag will cover approximately 22–25 sq. ft., to a thickness of 1/8" (0.125 in.)

- **SGM Dallas** (<https://goo.gl/maps/mf2gDPzaNmWAiZgF8>)

3. The shelf life of Diamond Brite is up to one (1) year in the unopened properly stored container. Diamond Brite can be mixed by using a low-speed paddle mixer, low RPM drill with mud paddle, ribbon blender, or concrete plaster mixer. Measure and add 1½ to two (2) gallons (5.7 to 7.6 L) of clean potable water to mixer.

Hold back a portion of the water and add as necessary as mixing progresses. Lower water to cement ratios will produce plaster of greater strength and density. Therefore it is best to use as little water as needed to produce a workable mix. Excess water will reduce strength and increase shrinkage (check) cracks.

- **NOTE:** Mix water quality is extremely important. Well water or water high in metal and mineral content will cause discoloration in finished Diamond Brite. Additionally, water of high hardness or alkalinity will cause the plaster to effloresce, releasing high levels of salts that produce calcium scale. This is especially true of colored Diamond Brite such as *Midnight Blue, Onyx, Tahoe Blue, and French Gray*.

Check mix water for metals, minerals, hardness, and alkalinity before use. Start the mixer and add Diamond Brite as quickly as possible to ensure that all the material has the proper mix time. Mix for a minimum of five (5) minutes but no more than ten (10) minutes. This ensures even distribution of aggregates and increases the working time of the plaster. Insufficient mix time will result in uneven setting and shade variations. Too much mix time will produce an overall weaker plaster and may entrain undesirable air bubbles. As a rule of thumb, mix for only the amount of time required to produce a consistent, homogenous mix. Calcium Chloride may be used as an accelerator. It must be

fully dissolved in the water allowing impurities to settle out (Ref. 18006419247) solution from the top being careful not to add impurities to the mix. The impurities found in calcium chloride flake and pellets have been known to cause discoloration (Ref. 18006419247) (about 1/2 lb. per bag) can be used. Overuse may cause discoloration. (Ref. 18006419247)

## PUMPING

Although it is not necessary to use a plaster pump, many contractors do. Included here are some helpful hints for successful pumping. Increase the size of the pump manifold from three (3) inches to four (4) inches. Change the valve ball from plastic to steel to improve longevity. Set a plaster pump to the lowest gear by moving the belt. Always begin pumping with a full stroke on the main piston. This is accomplished by advancing the wheel until the cam is at its highest position. Prepare a slurry of cement and water or pump aid and run it through the pump first to prime the pump and lubricate the hoses. Pour the mixed plaster slowly into the pump hopper. Do not pour all the material in at once. Agitate the material in the hopper to prevent separation of the cement and aggregate. Avoid unnecessary stopping during the pumping process. Diamond Brite aggregate will tend to settle in the pump manifold and hoses when the pump is stopped. Agitate the remaining material left in the hopper to reduce clogging. Do not try to clear a blockage using the pump. Disassemble and clean the manifold and hoses when clogged. Do not over-water mix. This will only cause the material to separate, clogging the pump and hoses.

## APPLICATION

The substrate should be cool and damp but not dripping wet. Mist the shell with cool, clean potable water. Non-absorbed water may be removed by using sponges and/or air. Standing water will weaken Diamond Brite and may cause washouts. Note: Hot, dry shells will cause the rapid setting of the plaster and result in check or shrinkage cracking and de-lamination. All materials and effected areas should remain above 50°F / 10°C (fifty degrees Fahrenheit / ten degrees Celsius) or below 100°F / 38°C (100 degrees Fahrenheit / 38 degrees

Celsius) 24-hours prior and 72-hours after ~~plaster~~ (https://goo.gl/maps/gh9uifkTGk94moA77) ~~Discard unmixed~~ (tel:18006419247) material (lumps). Apply plaster liberally with the flat side of the trowel using sufficient pressure to key in a scratch coat on the vertical surfaces. Beginning with the shady wall ~~and~~ (https://goo.gl/maps/7M2lQdA7x2lje8o478) to the walls and allow to set up until it becomes tacky. The set time will vary ~~SGM Dallas~~ (https://goo.gl/maps/mf2gDPzaNmWAiZgF8) according to temperature and humidity. Once the scratch coat has become tacky, apply a finish coat to the entire pool surface beginning in bowl area and working toward the shallow end, troweling and blending walls and floor together to achieve a seamless appearance while working to a final thickness of 3/8" to one-half inch (½") (10 mm — 12 mm). Uniform troweling will help to ensure even exposure, reduce washouts and produce a comfortable slip-resistant finish. The technique of "slick troweling" is recommended. During application make several passes with pool trowels to compact the aggregate and ensure a smooth dense finish. In this process, the cement paste is brought to the surface during troweling, then removed with the trowel. This produces a slick surface and minimizes the exposure needed. Small amounts of lubrication water may be necessary for smoothing out and compacting the finish in this process. The aggregate can be seen through a thin film of cement paste after troweling is complete. Special attention must be given to the filling in of spike holes. The applicator must be careful to fill all spike holes with Diamond Brite aggregate to avoid visible spike holes. Extra care must be taken to ensure proper troweling in the coves and corners. Specialty trowels are required for these areas. Insufficient troweling in these areas will result in roughness and washouts (loss of cement and aggregate) during the exposure process.

## EXPOSURE

**NOTE:** You must have one workman for every 300 square feet to properly expose Diamond Brite. The exposure time is limited to approximately one hour but will vary according to local conditions. Beginning too early or too late will result in uneven exposure. Some areas may be ready for exposure while other

areas are still being troweled. Constant inspection of the Diamond Brite® (800 641 9247 / 704 888 4927) readiness is imperative. There are several techniques commonly used to expose Diamond Brite. The following is a list of the most popular techniques.

📍 SGM Tampa (<https://goo.gl/maps/ZMZiQd97XPij8wV78>)

- **Water Washing with Brushes:**

📍 SGM Dallas (<https://goo.gl/maps/mf2gDPzaNmWAiZgF8>)

- **NOTE:** *This is by far the most effective technique and produces the best results with standard Diamond Brite pool finishes. It is not recommended for the Diamond Brite® Quartz Series pool finishes.*

When the Diamond Brite has lost its sheen or is no longer damp, it may be ready for exposure with soft bristle brushes and water. The material must be sufficiently set up to allow applicators to walk on the floor without leaving footprints. Wear white cotton socks or foam shoes when exposing Diamond Brite. Boots and bare feet are not recommended. Test the plaster for readiness by carefully washing a small area with a soft bristle brush. If the cream washes away without losing aggregate the exposure process may begin. Starting with sunny or fast setting areas begin washing away cement paste with water and brushes. Use a bucket first then progress to a soft flow of water from a garden hose as the material begins to harden. Begin using stiff bristle brushes as the set progresses. Examine the plaster for hot spots that may be set quickly. Mist these areas with water to allow longer exposure time. Over-cured cement paste will not remove easily and may require stiff bristle brushes to remove. Avoid slow setting areas like shady walls and the bowl. Washing too soon in these areas will cause washouts. If an area washes out it must be re-troweled immediately. Keep some extra Diamond Brite mixed up for use in patching washout areas. Keep a sump pump running in the main drain at all times to discharge the wash solution. Dispose of wash as directed by local requirements. Avoid leaving hoses, buckets or any other items on the plaster during exposure. Any object left on the plaster during this critical phase may leave a "shadow" on the surface. In the event of shadowing heat may be carefully applied to remove the discolored. When all of the cement paste has been removed from the surface uniformly, the

brush phase is complete. If done thoroughly this will complete the exposure process. The process of acid washing as described below is optional. If desired, an acid wash may now be performed using a 25% solution of muriatic acid (higher concentrations may be needed for stubborn areas) and water to remove the thin film that may remain on the surface. Proper safety equipment must be worn at all times. Begin washing the bowl first and work up to the shallow end. Following this procedure will minimize "rivers" or streaks on the floor. The use of an acid wash additive to reduce fumes and ensure uniform coverage is highly recommended. Neutralize and discard the wash solution according to local requirements. Neutralize acid remaining on the Diamond Brite with Soda Ash and water to avoid discoloration.

- **Acid Washing:**

- **NOTE:** *This technique is commonly used in cold climates or when the plasterers lack sufficient experience to undertake water washing. It is easier to do but can produce a less uniform finish. Use this technique when applying the Quartz Series.*

After troweling, allow the plaster to fully set up. This may take anywhere from one to a few hours or overnight, depending on local job site conditions. Begin acid washing by using a 25% solution of muriatic acid (higher concentrations may be needed for stubborn areas) and water to remove the cement film that may remain on the surface. Increase the concentration of the acid solution as needed. Proper safety equipment must be worn at all times. Begin washing the bowl first and work up to the shallow end. Following this procedure will minimize "rivers" or streaks on the floor. Acid wash walls and steps last. Do not allow acid wash solution to puddle in the bowl area. Use a sump pump to constantly discard the runoff after it is diluted and neutralized. The use of an acid wash additive to reduce fumes and ensure uniform coverage is highly recommended. Neutralize and discard the wash solution according to local requirements. Neutralize acid remaining on the Diamond Brite with Soda Ash and water to avoid discoloration.

- **Wet Acid Wash:**

- **NOTE:** Also called Acid Start-Up or No Drain Acid Wash. This technique is sometimes used after water washing. It is also used in areas where the fill water is high in ~~alkalinity~~ (https://goo.gl/maps/gh9ujfkTGk94moA77) water washing this technique produces the least desirable results. It will not remove all of the cement paste evenly and may result in a streaked appearance.

Remove all metal such as ladders and lights from the pool and turn off the circulation system. After filling the pool test the alkalinity to determine the amount of muriatic acid needed to lower the Total Alkalinity to zero.

Distribute the acid evenly throughout the pool. Brush the pool thoroughly over the entire surface twice daily for three (3) days. Add a sequestering agent and raise the pH to the proper level with soda ash. Start the circulation system and follow the start-up instructions.

- **Powerwash Exposure Technique:** Hard trowel pool to a uniform smooth finish. Let finish air dry for 1-3 hours after completion. Begin the acid wash process by filling a pool with eight (8) to ten (10) inches of water. This water will buffer the acid solution during the exposure process. Acid wash with 100% muriatic acid starting with walls working down to the bowl. Leave acid on for approximately one (1) to two (2) minutes before rinsing off with a hose. Keep constant water on the floor to diffuse acid solution avoiding streaks. Keep acid-washed areas wet through the entire process or cement paste will re-set. Complete the acid wash on the floor and the bowl of the pool, finish by pumping out water. Begin the power-washing phase with 2,500 psi machine using a 45-degree nozzle. Keep tip twelve (12) to eighteen (18) inches away from the surface perpendicular to the plaster finish. Power wash surface with approximately 20% of overlap to ensure complete exposure. Start power-washing walls from tile line thru cove of the pool, finish with the floor. Pump out remaining water; install main drain covers, lights, and fittings.

**DIAMOND BRITE COLOR COMBINATIONS ☎ 800-641-9247 (tel:18006419247)**

- **STEEL BLUE** – 8 Bags Tahoe Blue + 2 Bags Onyx  
📍 SGM Pompano Beach (<https://goo.gl/maps/gh9ujfkTGk94moA77>)
- **AEGEAN SEA** – 4 Bags Tahoe Blue + 6 Bags French Gray
- **OCEAN BLUE** – 4 Bags Tahoe Blue + 6 Bags French Gray  
📍 SGM Miami Beach (<https://goo.gl/maps/85gAMTiehmgf18>)
- **ISLA VERDE** – 4 Bags Verde + 3 Bags Midnight Blue + 3 Bags French Gray  
📍 SGM Dallas (<https://goo.gl/maps/mf2gDPzaNmWAiZgF8>)
- **GRECIAN SLATE** – 5 Bags French Gray + 3 Bags Verde + 2 Bags Onyx
- **TAHITI BLUE** – 8 Bags Super Blue + 2 Bags Tahoe Blue
- **COOL QUARTZ** – 5 Bags Cool Blue + 5 Bags Blue Quartz
- **BAHAMIA BREEZE** – 9 Bags Tahoe Blue + 1 Bags Onyx
- **COBALT** – 6 Bags Midnight Blue + 4 Bags Onyx

**INITIAL FILL AND BALANCING — OPTIMUM POOL AND SPA WATER CHEMISTRY CONDITIONS**

In accordance with the National Plasterers Council, Inc. ("NPC") standards, it is recommended that the following pool and spa water chemistry conditions be maintained on an ongoing basis for the longevity of the interior pool and spa finish. These values are important to prevent corrosion, deterioration, discoloration, scaling or other problems. For more information refer to your local agency having jurisdiction or NPC.

Follow recommended fill and balancing procedures to ensure a successful start-up. Fill pool completely and without interruption with clean, potable water. The use of a filter during fill is strongly recommended. The initial fill water is the most important water that the pool will receive and must be tested, recorded and adjusted according to the following parameters by an experienced pool professional. For the first thirty days (30) the pH and alkalinity must be monitored and adjusted (if applicable) every three (3) to five (5) days. All other chemicals monitored and adjusted (if applicable) every seven (7) to ten (10) days. The pool water must be tested regularly and documented monthly by a reputable company using a computerized system. Monitoring the pool water regularly will not only affect the new finish but will keep it looking new. Improper water chemistry will void the limited residential /

commercial warranty. It is recommended that a quality sequestering agent be used in the initial start-up in accordance with the manufacturer's instructions.  SGM Pompano Beach (<https://goo.gl/maps/gh9ujfkTGk94moA77>), and then a recommended maintenance dosage per the sequestering agent's manufacturer instructions.  SGM Tampa (<https://goo.gl/maps/ZMZiQd97XPij8wV78>)

 SGM Dallas (<https://goo.gl/maps/mf2gDPzaNmWAiZgF8>)

- **FIRST DAY:** Add sequestering agent upon initial fill per manufacturer's instructions. Adjust pH to 7.2 – 7.6 and total alkalinity to 80 -120 PPM. Maintain calcium hardness at a minimum of 125 PPM for the first three days, then adjust to 200-400 PPM thereafter. Dissolve chemicals completely in water and disperse throughout pool.
- **SECOND DAY:** Record pH, total alkalinity, calcium hardness, and temperature levels. Adjust pH to 7.4 — 7.6 and total alkalinity to 80—120 PPM. Dissolve all chemicals completely in water before adding to the pool, and allow sufficient time for each chemical to be fully dispersed before adding other chemicals. **DO NOT ADD CHLORINE.** Brush the entire surface twice daily for the first three (3) days.
- **THIRD DAY:** Repeat steps from Second Day. Adjust chemistry to the following levels:
  - **Free Chlorine:** 1.0 — 3.0 PPM
  - **pH:** 7.4—7.6
  - **Total Alkalinity:** 80—120 PPM
  - **Calcium Hardness:** 200—400 PPM
  - **Stabilizer:** 30—60 PPM

Adjust circulating pump timer to normal operating hours. Brush the pool walls and floor daily for the first two (2) weeks. Do not vacuum pool with wheeled vacuum for 14 days. Putting a wheel cleaner in the pool prematurely can cause wheel marks/ tracks to show up on the pool finish. Do not install an automatic pool cleaner for 28 days. No salt should be added for 28 days. Please make sure the water pH and alkalinity is balanced prior to the use of salt chlorine generators.

**DAILY WATER CHEMISTRY AFTER 28 DAYS** ☎ 800-641-9247 (tel:18006419247)

Maintain the water chemistry using the Langelier Saturation Index (LSI)  
 • SGM Pompano Beach (<https://goo.gl/maps/gh9ujfkTGk94moA77>)  
 maintained between 0.0 and +0.3.

• SGM Tampa (<https://goo.gl/maps/ZMZiQd97XPij8wV78>)

Description	Pool & Spa Water Levels
• SGM Dallas ( <a href="https://goo.gl/maps/mf2gDPzaNmWAIZgF8">https://goo.gl/maps/mf2gDPzaNmWAIZgF8</a> )	
Free Chlorine - Above 4.0 PPM may cause corrosion	1 - 3 PPM
Total Chlorine	1 - 3 PPM
pH	7.4 - 7.6
Alkalinity	80 - 120 PPM
Calcium Hardness	200 - 400 PPM
Cyanuric Acid	50 - 80 PPM
TDS (Non-Salt Pools)	300 - 1800 PPM
Salt Level (Salt Chlorination ONLY)	2500 - 3500 PPM

**SHELF LIFE**

Up to one (1) year from date of manufacture in an unopened properly stored container.

**CAUTION**

**WARNING — EYE IRRITANT CONTAINS PORTLAND CEMENT.** Product is alkaline on contact with water. Use paddle for mixing to avoid splashing into eyes or contact with skin. During mixing or application avoid contact with eyes. In case of such contact, flood eyes repeatedly with water and CALL A PHYSICIAN. Wash thoroughly after handling and before smoking or eating. Do not take internally. CONTAINS FREE SILICA — DO NOT BREATHE DUST. Prolonged exposure to dust may cause delayed lung disease (*Silicosis (<https://www.lung.org/lung-health-and-diseases/lung-disease-lookup/silicosis/>)*). **WARNING: This product may expose you to chemicals, including silica, which the State of California recognizes as a cause of cancer. For more information, visit the Proposition 65 Warnings Website ([www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov) (<https://www.p65warnings.ca.gov/>)). Use NIOSH (<https://www.cdc.gov/niosh/index.htm>) approved masks at all times to handle silica dust. KEEP OUT OF REACH OF CHILDREN.**



***Mastin Aquatic Group LLC***  
***Established April 1973***



**Design**

**Development**

**Construction**

**Renovations**

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**NPT**  
**Pool Tile**

[Home](#) / [Tile](#) / [6 X 6 Solids](#)

M6764C

[View this product on our app!](#)

## 6" x 6" Solids - Cobalt

Our line of solid-colored pool tiles get their depth and presence from the richness of their colors. Cobalt is bright blue with a slightly indigo tone.

- Basic pool tile
- Available in 6" x 6" bullnose tile (except for M6762), 6" x 6" radius bullnose and a 2"x6" mud cap
- Resistant to water, frost, changing temperatures, chemical damage and fading

### Available Sizes:

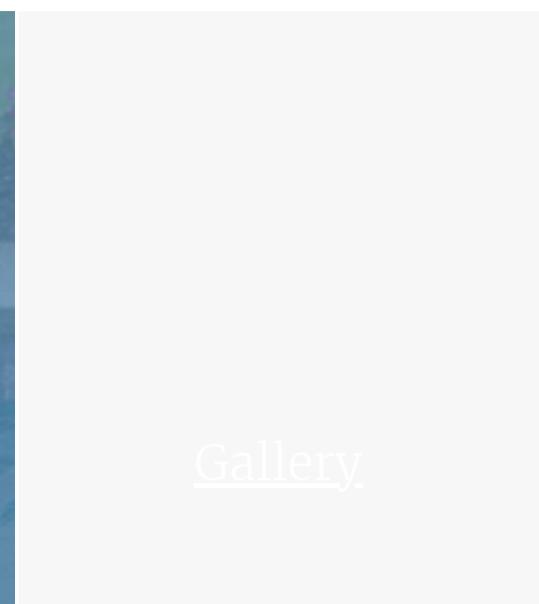
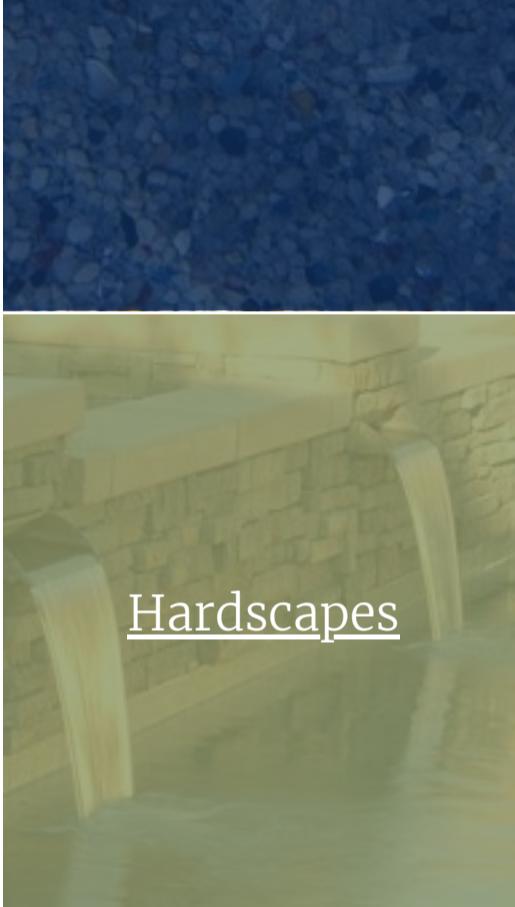
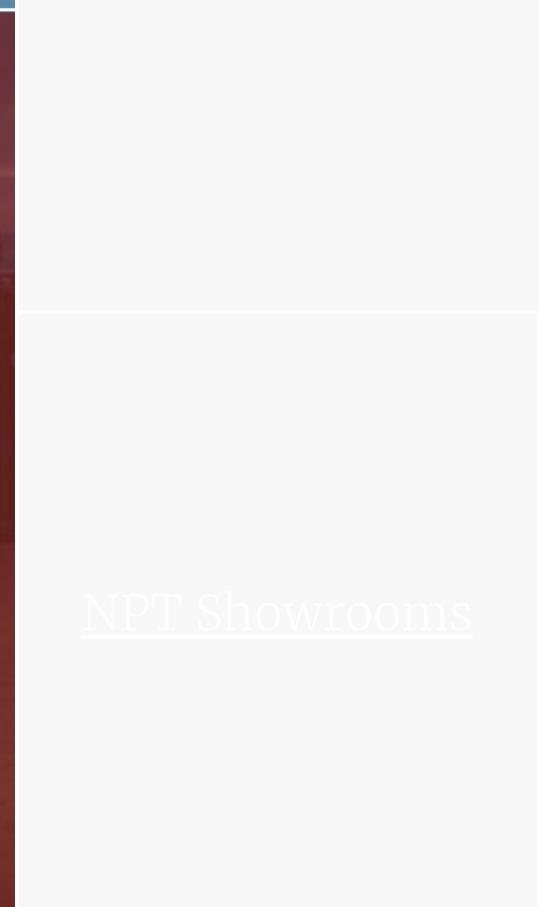
6" x 6"

### Available Colors:



### Get in Touch

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## Federal Stone Pre-Cast Swimming Pool Coping

federalstone  · Jan 17, 2019 · 1 min read

## Federal Stone® is now a registered trademark

Federal Stone® Industries, Inc., the industry leader in pre-cast swimming pool coping, has announced their registered trademarks with the U.S. Patent and Trademark Office.



The Federal Stone DQ® series straight coping stone.

"Federal Stone® is committed to serving the pool industry with the highest quality pre-cast coping," said Federal Stone® President, David Rethemeyer. "These registered trademarks exemplify the level of trust that we have earned over the past 54 years." Working in conjunction with Leveque Intellectual Property Law, P.C., Federal Stone® was able to secure registrations on the following:

Federal Stone

AQ®

DQ®

DV®

DX®

DY®

These identifiers have always been recognized and synonymous with a superior product and now they will forever be owned by the Federal Stone® brand.

If you would like more information on how to use these newly registered markings or provide correct attribution on marketing publications, please [contact us](#).



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**Pentair  
Intelliflow 3  
Commercial Pump**

# IntelliFlo3™

Variable Speed and Flow Pool Pump

## The only pump with patented sensorless flow technology just got smarter.

Meet the first pump to combine true set-it-and-forget-it flow technology paired with the smart connectivity of the Pentair Home app. It's just what customers want. And it's only from Pentair.

The IntelliFlo3 VSF pool pump sets the new bar for performance. With flow so steady and smart, your customers will wonder how they ever used anything else.

- Proprietary flow technology maintains the pool's optimal flow.**  
For ongoing pool enjoyment, parts longevity, and all systems performing at peak.
- Easy control via the Pentair Home app or optional touchscreen.**  
Easily monitor performance or dial up flow for big events, faster cleanups, more power in the water features, and more.
- Up to 90%\* energy savings.**  
Slower speed and regulated flow save energy and noticeably impact that monthly utility bill.
- New motor, drive, and hydraulics.**  
ENERGY STAR® rated and U.S. Department of Energy (DOE) pump regulation compliant.
- Optional onboard automation.**  
Two-relay automation gives pool owners easy control of up to two additional pool devices, such as lights and a salt chlorine generator.
- Easy setup and remote updates.**  
The Pentair Pro app puts time back into your busy day.

[pentair.com/intelliflo3](http://pentair.com/intelliflo3)



### PENTAIR HOME APP

For all the benefits of easy flow control.

### INTELLIFLO3

Variable Speed and Flow Pool Pump

\*Savings based on variable speed pump compared to a single-speed pump running 12 hours per day at an average of \$0.16 per kWh in a 20,000 gallon pool. Actual savings may vary based on local utility rates, pool size, pump run time, pump horsepower, pump rpm, plumbing size and length, pump model, service factor and other hydraulic factors. Individual Weighted Energy Factor (WEF) scores and savings may vary by model.

## INTELLIFLO3™ VARIABLE SPEED AND FLOW POOL PUMP

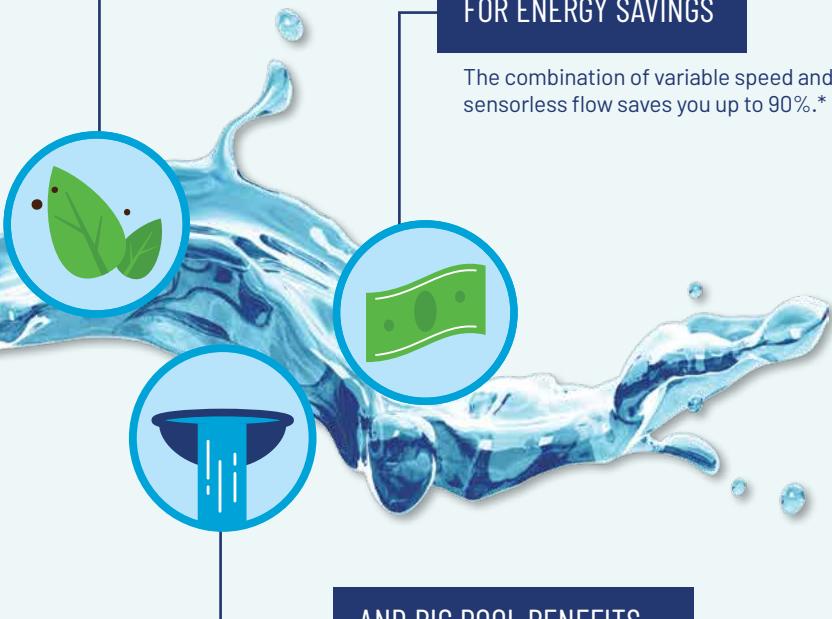
Optimal flow leads to the things pool owners love most.

And Pentair has the only built-in sensorless flow control to make optimal flow effortless.

The proprietary combination of variable speed plus auto-regulated flow means all good things flow from the IntelliFlo3—for your customers and for your business. Small pool or big, this pump is the simplest, smartest, most worry-free way to give pool owners the effortless, inviting pool experience they expect.

### FLOW IS EVERYTHING

So Pentair invented a game-changing pump.



#### ADJUSTS TO POOL CONDITIONS

As conditions change with your pool water, flow speed adjusts automatically.

#### FOR ENERGY SAVINGS

The combination of variable speed and sensorless flow saves you up to 90%.\*

#### AND BIG POOL BENEFITS

Clearer water, bubbling bubblers, cascading fountains, and critical equipment that is taxed less and lasts longer.



The Pentair IntelliFlo3 pump has earned the Eco Select® brand distinction as one of the greenest and most efficient choices from Pentair.

#### TRADEGRADE

The TradeGrade family of products is exclusively made for and sold by the world's most demanding pool professionals.

Part #	Description	THP	Input Voltage	Key Specifications	Amperage	Frequency	WEF	Certification
11075	IntelliFlo3 VSF 3.0HP	3	208V-230V		12.4-11.2 A	50 Hz or 60 Hz	7.1	UL, NSF
11076	IntelliFlo3 VSF 3.0HP w/ I/O board							

touch screen  
options  
coming soon

400 Regency Forest Dr | Cary, NC 27518 | United States | 800.831.7133 | [pentair.com](http://pentair.com)

All indicated Pentair trademarks and logos are property of Pentair. Third-party registered and unregistered trademarks and logos are the property of their respective owners.



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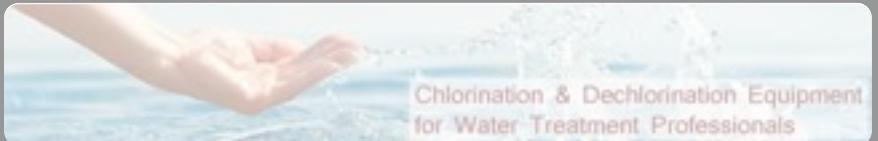
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# Arden Industries

## Dechlorinator



# ARDEN INDUSTRIES



Chlorination & Dechlorination Equipment  
for Water Treatment Professionals

[Home](#)[About Us](#)[Equipment by Name](#)[Equipment by Use](#)[Chemicals](#)[Contact Us](#)**Eliminator - Inline**

The Clean Water Act serves as the EPA's foundation for protecting the environment and public health. This Act prohibits all chlorinated swimming pool discharges and filter back-flushing without dechlorinating the water prior to discharge.



### The Eliminator: Swimming Pool Dechlorinator

The "Eliminator" is designed for installation directly in the backwash line. When the filter backwash valve is in the backwash position water passes through the "Eliminator" creating a vacuum which pulls the dechlor chemical into the mixing chamber making a homogeneous mixture. A Dip Tube is provided to insert into the chemical container. A flowmeter and control valve insure the correct amount of chemical is injected.

Inline Eliminator is good for flows up to 600 GPM. Flows over 600 GPM require the Bypass Eliminator.

**Eliminator - Inline****Eliminator - Bypass**

### Standard Equipment

- Eliminator
- Flowmeter with Control Valve
- 6 ft. length of 1/4" Flexible Suction Tubing
- Dip Tube Assembly - 10" long x 1/4" pipe

Calcium Thiosulfate Solution dechlor agent sold separately.

**FLOW THROUGH ELIMINATOR IN  
GALLONS PER MINUTE**

**SUPPLY PRESSURE**

SIZE	5 PSI	10 PSI	15 PSI	20 PSI	25 PSI
------	-------	--------	--------	--------	--------

ARDEN INDUSTRIES  
3252 Heights Drive, Cameron Park, CA 95682  
Phone: 530-677-3671

3"	270 GPM	375 GPM	460 GPM	535 GPM	600 GPM
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For flows over 600 GPM a 3/4" Bypass Eliminator is required.



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# Ceramic Depth Markers

## Skid-Resistant

# Ceramic Depth Markers - Skid-Resistant 6"x6"

[Online Store](#) > [All Products](#)



These skid resistant tiles are for deck or gutter applications. These tiles are frost resistant and printed with ceramic glaze inks then kiln fired to ensure the finest most durable depth and safety marker line available.

Note: 6" x 6", Skid Resistant Surface, White Background, Black Print, and English and Metric Available.

If you are looking for 8" x 8" or additional increments please call to order.

0 FT \$15.04  
*INL-C620000*

1 FT \$15.04  
*INL-C620010*

2 FT \$15.04  
*INL-C620020*

3 FT \$15.04  
*INL-C620030*

4 FT \$15.04  
*INL-C620040*

5 FT \$15.04  
*INL-C620050*

6 FT \$15.04  
*INL-C620060*

7 FT \$15.04  
*INL-C620070*

8 FT \$15.04  
*INL-C620080*

9 FT \$15.04

*INL-C620090*

11 FT \$15.04

*INL-C620093*

0 IN \$15.04

*INL-C620500*

1 IN \$15.04

*INL-C620501*

2 IN \$15.04

*INL-C620502*

3 IN \$15.04

*INL-C620503*

4 IN \$15.04

*INL-C620504*

5 IN \$15.04

*INL-C620505*

6 IN \$15.04

*INL-C620506*

7 IN \$15.04

*INL-C620507*

8 IN \$15.04

*INL-C620508*

9 IN \$15.04

*INL-C620509*

1 \$15.04

*INL-C621010*

3 \$15.04

*INL-C621030*

3 1/2 \$15.04

*INL-C621035*

4 \$15.04

*INL-C621040*

6 \$15.04

*INL-C621060*

8 \$15.04

*INL-C621080*

.0 \$15.04

*INL-C622500*

1. \$15.04

*INL-C622510*

2. \$15.04

*INL-C622520*

1M \$15.04

*INL-C623010*

2M \$15.04

*INL-C623020*

3M \$15.04

*INL-C623030*

4M \$15.04

*INL-C623040*

5M \$15.04

*INL-C623050*

6M \$15.04

*INL-C623060*

7M \$15.04

*INL-C623070*

8M \$15.04

*INL-C623080*

9M \$15.04

*INL-C623090*

FT \$15.04

*INL-C623500*

IN \$15.04

*INL-C623505*

No Diving \$18.60

Image

*INL-C621500*

No Running \$18.60

Image

*INL-C621505*

Slippery When \$18.60

Wet Image

*INL-C621510*

Quantity:

1

**ADD TO CART**

## Need help? Contact Us

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## Reinforcing Steel Rebar



# Reinforcing Steel Rebar, #4 Bar, 1/2" Diameter x 20' Long, Grade 60

Kuhlman Item Number: 6468050

**\$12.57**

Sold As: EA - EACH

Quantity:

## Product Overview



### Reinforcing Steel Rebar, #4 Bar, 1/2" Diameter x 20' Long, Grade 60

Rebar (short for reinforcing bar) is a steel bar used as a tension device in reinforced concrete and reinforced masonry structures to strengthen and aid concrete under tension. Rebar significantly increases the tensile strength of the structure. Rebar's surface is often deformed to promote a better bond with the concrete.

- #4 Rebar
- 1/2-inch diameter x 20-feet long
- Grade 60
- Meets ASTM A615/A996

## Product Specifications



<b>Product Name</b>	Reinforcing Steel Rebar, #4 Bar, 1/2" Diameter x 20' Long, Grade 60
<b>Kuhlman Item Number</b>	6468050
<b>Shipping Weight/Unit</b>	13.36 lbs
<b>Shipping Length/Unit</b>	240 in
<b>Shipping Width/Unit</b>	1 in
<b>Shipping Height/Unit</b>	1 in