HAYWARD[®]

PowerFlo LX[™] / PowerFlo II[™] / EP Pump Series

Owner's Manual



see back of manual for details



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INSTALLATION, OPERATION, & PARTS

IMPORTANT SAFETY INSTRUCTIONS

Basic safety precautions should always be followed, including the following: Failure to follow instructions can cause severe injury and/or death.

This is the safety-alert symbol. When you see this symbol on your equipment or in this manual, look for one of the following signal words and be alert to the potential for personal injury.

A WARNING warns about hazards that **could** cause serious personal injury, death or major property damage and if ignored presents a potential hazard.

CAUTION warns about hazards that **will** or **can** cause minor or moderate personal injury and/or property damage and if ignored presents a potential hazard. It can also make consumers aware of actions that are unpredictable and unsafe.

The **NOTICE** label indicates special instructions that are important but not related to hazards.

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WARNING - Read and follow all instructions in this owner's manual and on the equipment. Failure to follow instructions can cause severe injury and/or death.

A WARNING – Suction Entrapment Hazard.

Suction in suction outlets and/or suction outlet covers which are, damaged, broken, cracked, missing, or unsecured can cause severe injury and/or death due to the following entrapment hazards:

Hair Entrapment- Hair can become entangled in suction outlet cover.

Limb Entrapment- A limb inserted into an opening of a suction outlet sump or suction outlet cover that is damaged, broken, cracked, missing, or not securely attached can result in a mechanical bind or swelling of the limb.

Body Suction Entrapment- A negative pressure applied to a large portion of the body or limbs can result in an entrapment. **Evisceration/Disembowelment** - A negative pressure applied directly to the intestines through an unprotected suction outlet sump or suction outlet cover which is, damaged, broken, cracked, missing, or unsecured can result in evisceration/ disembowelment.

Mechanical Entrapment- There is potential for jewelry, swimsuit, hair decorations, finger, toe or knuckle to be caught in an opening of a suction outlet cover resulting in mechanical entrapment.

A WARNING - To Reduce the risk of Entrapment Hazards:

- o When outlets are small enough to be blocked by a person, a minimum of two functioning suction outlets per pump must be installed. Suction outlets in the same plane (i.e. floor or wall), must be installed a minimum of three feet (3') [1 meter] apart, as measured from near point to near point.
- o Dual suction fittings shall be placed in such locations and distances to avoid "dual blockage" by a user.
- o Dual suction fittings shall not be located on seating areas or on the backrest for such seating areas.
- o The maximum system flow rate shall not exceed the flow rating as listed on the suction outlet cover.
- o Never use Pool or Spa if any suction outlet component is damaged, broken, cracked, missing, or not securely attached.
- o Replace damaged, broken, cracked, missing, or not securely attached suction outlet components immediately.
- o In addition two or more suction outlets per pump installed in accordance with latest ASME, APSP Standards and CPSC guidelines, follow all National, State, and Local codes applicable.
 - Installation of a vacuum release or vent system, which relieves entrapping suction, is recommended.

WARNING – Failure to remove pressure test plugs and/or plugs used in winterization of the pool/spa from the suction outlets can result in an increase potential for suction entrapment as described above.

WARNING – Failure to keep suction outlet components clear of debris, such as leaves, dirt, hair, paper and other material can result in an increase potential for suction entrapment as described above.

WARNING – Suction outlet components have a finite life, the cover/grate should be inspected frequently and replaced at least every ten years or if found to be damaged, broken, cracked, missing, or not securely attached.

A CAUTION – Components such as the filtration system, pumps and heater must be positioned so as to prevent their being used as means of access to the pool by young children.

A WARNING – Never operate or test the circulation system at more than 30 PSI.

A WARNING – Never change the filter control valve position while the pump is running.

WARNING – To reduce risk of injury, do not permit children to use or climb on this product. Closely supervise children at all times. Components such as the filtration system, pumps, and heaters must be positioned to prevent children from using them as a means of access to the pool.



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WARNING – Hazardous Pressure. Pool and spa water circulation systems operate under hazardous pressure during start up, normal operation, and after pump shut off. Stand clear of circulation system equipment during pump start up. Failure to follow safety and operation instructions could result in violent separation of the pump housing and cover, and/or filter housing and clamp due to pressure in the system, which could cause property damage, severe personal injury, or death. Before servicing pool and spa water circulation system and pump controls must be in off position and filter manual air relief valve must be in open position. Before starting system pump, all system valves must be set in a position to allow system water to return back to the pool. Do not change filter control valve position while system pump is running. Before starting system pump, fully open filter manual air relief valve. Do not close filter manual air relief valve until a steady stream of water (not air or air and water) is discharged.

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MWARNING – Separation Hazard. Failure to follow safety and operation instructions could result in violent separation of pump and/or filter components. Strainer cover must be properly secured to pump housing with strainer cover lock ring. Before servicing pool and spa circulation system, filters manual air relief valve must be in open position. Do not operate pool and spa circulation system if a system component is not assembled properly, damaged, or missing. Do not operate pool and spa circulation system unless filter manual air relief valve body is in locked position in filter upper body.



MWARNING – Risk of Electric Shock. All electrical wiring MUST be in conformance with applicable local codes, regulations, and the National Electric Code (NEC). Hazardous voltage can shock, burn, and cause death or serious property damage. To reduce the risk of electric shock, do NOT use an extension cord to connect unit to electric supply. Provide a properly located electrical receptacle. Before working on any electrical equipment, turn off power supply to the equipment.

🛦 WARNING – To reduce the risk of electric shock replace damaged wiring immediately. Locate conduit to prevent abuse from lawn mowers, hedge trimmers and other equipment.

🔺 WARNING – Electrical ground all electrical equipment before connecting to electrical power supply. Failure to ground all electrical equipment can cause serious or fatal electrical shock hazard.



WARNING — Do NOT ground to a gas supply line.

M WARNING – To avoid dangerous or fatal electrical shock, TURN OFF POWER to all electrical equipment before working on electrical connections.

🛦 WARNING – Failure to bond all electrical equipment to pool structure will increase risk for electrocution and could result in injury or death. To reduce the risk of electric shock, see installation instructions and consult a professional electrician on how to bond all electrical equipment. Also, contact a licensed electrician for information on local electrical codes for bonding requirements.

Notes to electrician: Use a solid copper conductor, size 8 or larger. Run a continuous wire from external bonding lug to reinforcing rod or mesh. Connect a No. 8 AWG (8.4 mm²) [No. 6 AWG (13.3 mm²) for Canada] solid copper bonding wire to the pressure wire connector provided on the electrical equipment and to all metal parts of swimming pool, spa, or hot tub, and metal piping (except gas piping), and conduit within 5 ft. (1.5 m) of inside walls of swimming pool, spa, or hot tub. IMPORTANT - Reference NEC codes for all wiring standards including, but not limited to, grounding, bonding and other general wiring procedures.

MWARNING – Risk of Electric Shock. Connect only to a branch circuit protected by a ground-fault circuit-interrupter (GFCI). Contact a qualified electrician if you cannot verify that the circuit is protected by a GFCI.

A WARNING – Risk of Electric Shock . The electrical equipment must be connected only to a supply circuit that is protected by a ground-fault circuit-interrupter (GFCI). Such a GFCI should be provided by the installer and should be tested on a routine basis. To test the GFCI, push the test button. The GFCI should interrupt power. Push reset button. Power should be restored. If the GFCI fails to operate in this manner, the GFCI is defective. If the GFCI interrupts power to the electrical equipment without the test button being pushed, a ground current is flowing, indicating the possibility of an electrical shock. Do not use this electrical equipment. Disconnect the electrical equipment and have the problem corrected by a qualified service representative before using.

🕰 CAUTION — This pump is intended for use with permanently-installed pools and may be used with hot tubs and spas if so marked. Do not use with storable pools. A permanently-installed pool is constructed in or on the ground or in a building such that it cannot be readily disassembled for storage. A storable pool is constructed so that it is capable of being readily disassembled for storage and reassembled to its original integrity.

SAVE THESE INSTRUCTIONS

Installation Instructions

Pump Location

The PowerFlo LX[™] and EP series pumps MUST be installed below the pool water line (see Figure to right).

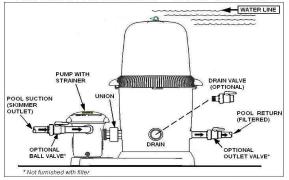
Self-priming PowerFlo II[™] pumps may be installed up to four (4) feet above the pool water line.

Install pump on a firm, level base or pad to meet all local and national codes. The field supplied base or pad must be level and vibration-free.

Pump motors require free circulation of air for cooling.

Do NOT install pump in a damp or non-ventilated location.

Though the pump is designed for outdoor use, it is strongly advised to protect the electrical components from the weather. Select a well-drained area, one that will not flood when it rains.



PREFERRED FILTER LOCATION - BELOW WATER LINE

Pump Mounting

Fasten pump to base or pad with screws or bolts to further reduce vibration and stress on pipe or hose joints. The base MUST be solid - level - rigid - vibration free.

Pump mount must:

- Allow pump inlet height to be as close to water level as possible.
- Allow use of short, direct suction pipe (to reduce friction losses).
- Allow for ball valves in suction and outlet piping.
- Be protected from excess moisture and flooding.
- Allow adequate access for servicing pump and piping.

Plumbing

Use **TFE tape** to seal threaded connections on molded plastic components. All plastic fittings must be new or thoroughly cleaned before use. **NOTE: Do NOT use Plumber's Pipe Dope as it may cause cracking of the plastic components.**

When applying **TFE tape** to plastic threads, wrap the entire threaded portion of the male fitting with one to two layers of tape. Wind the tape clockwise as you face the open end of the fitting, beginning at the end of the fitting.

The pump suction and outlet ports have molded-in thread stops. Do **NOT** attempt to force hose connector fitting past this stop. It is only necessary to tighten fittings enough to prevent leakage. Tighten fitting by hand and then use a tool to engage fitting an additional 1 ½ turns. Use care when using TFE tape as friction is reduced considerably; **do NOT over-tighten** fitting or you may cause damage. If leaks occur, remove connector, clean off old Teflon tape, re-wrap with one to two additional layers of TFE tape, and re-install connector. **Piping - Flexible Hose, PVC, or Reinforced Hose are all acceptable piping methods**

For pump outlet use 1-1/2" PVC pipe or reinforced hose. For pump suction on ALL models, use 1-1/2" reinforced hose. Increase size if a long run is needed. For pipe larger than port, use reducing fitting in strainer port.

To avoid pump strain, support suction and outlet independently. Place supports near pump. To avoid strain left by a gap at last connection, start all piping at pump and run pipe **AWAY** from pump.

NEVER use suction pipe **SMALLER** than pump suction connections. Suction pipe inlet must be lower than pump inlet port.

NOTE: ANSI/NSPI-4 Article V, standard for above-ground and on-ground pools, advises that components such as the filtration system, pumps and heater be positioned so as to prevent their being used as a means of access to the pool by young children.

Fittings

Fittings restrict flow. For better efficiency, use the fewest possible fittings. Avoid fittings that could cause an air trap.

Electrical



▲ WARNING – Ground motor before connecting to electrical power supply. Failure to ground pump motor can cause serious or fatal electrical shock hazard.

▲ WARNING – Do NOT ground to a gas supply line.

▲ WARNING – To avoid dangerous or fatal electrical shock, turn OFF power to motor before working on electrical connections.

▲ WARNING – Ground Fault Circuit Interrupter (GFCI) tripping indicates electrical problem. If GFCI trips and won't reset, consult electrician to inspect and repair electrical system.

A WARNING – Fire Hazard. Match supply voltage to motor nameplate voltage.

Insure that the electrical supply available agrees with the motor's voltage, phase, and cycle, and that the wire size is adequate for the H.P. (KW) rating and distance from the power source.

NOTE: All electrical wiring MUST be performed by a qualified professional, and MUST conform to local codes and regulations.

Voltage

Voltage at motor **MUST NOT** be more than 10% above or below motor name plate rated voltage, or motor may overheat, causing overload tripping and reduced component life. If voltage is less than 90% or more than 110% of rated voltage when motor is running at full load, consult power company.

Grounding/Bonding

Install, ground, bond, and wire motor according to local or national electrical code requirements.

Permanently ground motor. Use green ground terminal provided under motor canopy or access place; use size and type wire required by code. Connect motor ground terminal to electrical service ground.

Bond motor to pool structure. Use a solid copper conductor, size or larger. Run wire from external bonding lug to reinforcing rod or mesh. Connect a No. 8 AWG (8.4 mm²) solid copper bonding wire to the pressure wire connector provided on the motor housing and to all metal parts of swimming pool, spa, or hot tub, and to all electrical equipment, metal piping or conduit within 5 ft. (1.5 m) of inside walls of swimming pool, spa, or hot tub.

Wiring

Pump MUST be permanently connected to circuit. If other lights or appliances are also on the same circuit, be sure to add their amp loads before figuring wire and circuit breaker sizes. (NOTE: If unsure how to do this or if this is confusing, consult a licensed electrician). Use the load circuit breaker as the Master On-Off switch.

Install a Ground Fault Circuit Interrupter (GFCI) in circuit; it will sense a short-circuit to ground and disconnect power before it becomes dangerous to pool users. For size of GFCI required and test procedures for GFCI, see manufacturer's instructions.

In case of a power outage, check GFCI for tripping, which will prevent normal pump operation. Reset if necessary.

NOTE: If you do not use conduit when wiring motor, be sure to seal wire opening on end of motor to prevent dirt, bugs, etc., from entering.

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New Installation – Start-Up & Operation

Prior to Start-Up

Fill strainer housing with water to suction pipe level. **NEVER operate the pump without water**. Water acts as a coolant and lubricant for the mechanical shaft seal.

▲ WARNING – NEVER run pump dry. Running pump dry may damage seals, causing leakage and flooding. Fill strainer housing with water before starting motor.

▲ CAUTION – Do NOT add chemicals to pool/spa system directly in front of pump suction. Adding undiluted chemicals may damage pump and voids warranty.

▲ CAUTION – Before removing strainer cover:

- 1. STOP PUMP before proceeding.
- 2. CLOSE VALVES in suction and outlet pipes.
- 3. RELEASE ALL PRESSURE from pump and piping system.



▲ WARNING – If pump is being pressure tested, be sure pressure has been released before removing strainer cover.

▲ WARNING – Do NOT block pump suction. To do so with body may cause fatal injury. Small children using pool MUST always have close adult supervision.

Priming Pump

- Open all valves before starting system.
- Release all air from filter and piping system. See filter owner's manual.
- When water source is higher than the pump, pump will prime itself when suction and outlet valves are opened. If water source is lower than the pump, unscrew and remove strainer cover; fill strainer and pump with water.
- Clean and lubricate strainer cover O-ring with "Jack's 327" each time it is removed.
- Clean and inspect O-ring; re-install on strainer cover.
- Replace strainer cover on strainer housing; turn clockwise to tighten cover.

NOTE: Tighten strainer cover by hand only (no wrenches) 1/4 turn.

Pump should prime. Priming time will depend on vertical length of suction lift and horizontal length of suction pipe. If pump does NOT prime within ten minutes, stop motor and determine cause. Be sure all suction and discharge valves are open when pump is running. See Troubleshooting Guide.

Storage/Winterization

- ▲ WARNING Explosion Hazard. Purging the system with compressed air can cause components to explode, with risk of severe injury or death to anyone nearby. Use only a low pressure (below 5 PSI), high volume blower when air purging the pump, filter, or piping.
- ▲ CAUTION Allowing the pump to freeze will void the warranty.
- ▲ CAUTION Do NOT use anti-freeze solutions (except propylene glycol) in your pool/spa system. Propylene glycol is non-toxic and will not damage plastic system components; other anti-freezes are highly toxic and may damage plastic components in the system.

Drain all water from pump and piping when expecting freezing temperatures or when storing pump for a long time (see instructions below). Gravity drain system as far as possible.

Keep motor dry and covered during storage. To avoid condensation/corrosion problems, do NOT cover or wrap pump with plastic film or bags.

Storing Pump for Winterization



▲ WARNING – To avoid dangerous or fatal electrical shock hazard, turn OFF power to motor before draining pump.

- 1. Drain water level below all inlets to the pool.
- 2. Remove drain plug from bottom of strainer body.
- 3. Disconnect pump from base.
- 4. Once the pump is removed of water, re-install the strainer lid and strainer plug.
- 5. Store pump in a dry enclosure.

Start-Up for Winterized Equipment

- 1. Follow filter manufacturer's instructions for reactivation of the filter.
- 2. Inspect all electrical wiring for damage or deterioration over the shutdown period. Have a qualified serviceman repair/replace wiring as needed.
- 3. Securely mount pump to base.
- 4. Install all intake and output fittings and piping.
- 5. Refill pool to proper water level.
- 6. Prime pump according to instructions.

Shaft Seal Change Instructions

IMPORTANT SAFETY INSTRUCTIONS PLEASE READ AND FOLLOW ALL INSTRUCTIONS

When servicing electrical equipment, basic safety precautions should always be observed including the following. Failure to follow instructions may result in injury.

WARNING – To reduce risk of injury, do not permit children to use this product.

- A. Disconnect all electrical power service to pump before beginning shaft seal replacement.
- B. Only qualified personnel should attempt rotary seal replacement. Contact your local authorized Hayward Dealer or service center if you have any questions.
- C. The National Electrical Code requires either a three (3) foot maximum twist-lock cord set with a GFCI protected receptacle or hard wire (conduit) connection for swimming pool pump installation. Do not use extension cords.

Exercise extreme care in handling both the rotating and the stationary sections of the two-part replacement seal. Foreign matter or improper handling will easily scratch the graphite and ceramic sealing surfaces.

- 1. Shut off water flow to pump by closing appropriate valves or by plugging both the skimmer outlet port and return port to pool. Disconnect piping or hoses from the motor/pump assembly.
- 2. Remove the strainer by disengaging and removing the strainer cover. Remove the basket. Lift up on strainer 'C' clip and remove. Finally, slide strainer housing forward and remove.
- 3. Unscrew eight (8) screws and remove pump cover, exposing the impeller.
- 4. Remove the canopy or the shaft cover plate from the end of motor opposite the impeller.
- 5. Hold the motor shaft securely by either inserting a screwdriver in slot at end of shaft or by using an open-end wrench to engage the flat surfaces provided near end of motor shaft. Rotate the impeller ina a counterclockwise direction and remove it from the motor shaft.
- 6. Note how the steel spring section of the old seal is positioned on impeller hub and remove it by pulling from the impeller.
- 7. Loosen four (4) motor through bolts from the back of motor and remove pump housing/shroud from the front of the motor.
- 8. Remove the ceramic stationary portion of the old seal by pressing the white ceramic seat out of the pump housing recess. If assembly is tight, tap lightly from the "motor" side.
- 9. Clean and lubricate the impeller stem and the pump housing recess with a dilute solution of non-granulated liquidtype soap. Do not use petroleum or silicone lubricants as these can contribute to seal leakage.
- 10. Press the new rotating portion of the seal assembly onto the impeller stem with the polished black graphite surface facing away from the impeller.
- 11. Carefully press the stationary ceramic portion of the seal into the recess of the pump housing/shroud, with the polished flat surface facing out.
- Carefully insert the motor shaft through the pump housing/shroud and align with white ceramic stationary seal assembly in place and secure the motor to pump housing/shroud with four (4) motor through bolts removed in step #7. Be sure motor base and pump discharge port are positioned properly. Alternately tighten the motor through bolts until the pump housing is secure. Make certain motor shaft turns freely before proceeding.
- 13. Screw the impeller (clockwise) with the rotating portion of seal in place onto the motor shaft. Hand-tighten the impeller in place.
- 14. Clean (replace if necessary) the O-ring and replace on pump cover. Assemble the pump cover to the pump housing/ shroud with the eight (8) screws removed in step #3. Tighten screws alternately and evenly.
- 15. Re-assemble strainer by sliding strainer housing onto pump cover. Install strainer 'C' clip by pushing clip down onto grooved pump cover coupling. Insert basket and fasten strainer cover.
- 16. Reconnect pump to the piping or hoses provided. Open all valves and make sure that the pump strainer housing is full of water before restarting the pump.

Troubleshooting

Motor Will NOT Start – Check For:

- 1. Improper or loose wiring connections; open switches or relays; tripped circuit breakers, GFCI's, or blown fuses.
- 2. Manually check rotation of motor shaft for free movement and lack of obstruction. (See steps 4 & 5 of "Shaft Seal Change Instructions" in this manual.)
- 3. If you have a timer, be certain it is working properly. Bypass it if necessary.

Motor Shuts OFF – Check For:

- 1. Undersized wiring; loose connections; etc.
- 2. Low voltage at motor or power drop (frequently caused by undersized wiring or extension cord use).
- 3. Mechanical binding and electrical overload.

NOTE: Your Hayward pump motor is equipped with an "automatic thermal overload protector." The motor will automatically shut off if power supply drops before heat damage can build up causing windings to burn out. The "thermal overload protector" will allow the motor to automatically restart once the motor has cooled, provided the power source is again up to proper levels. It will continue to cut On/Off until the problem is corrected. **Be sure to correct cause of overheating.**

Motor Hums, But Does NOT Start – Check For:

- 1. Centrifugal switch stuck in OPEN position.
- 2. Binding of motor shaft.

Pump Won't Prime

- 1. Make sure pump/strainer housing is filled with water and the cover O-ring is clean, also be sure it is properly seated in the cover O-ring groove. Make sure strainer cover is locked firmly in position and lubricated with "Jack's 327."
- 2. Make sure all suction and discharge valves are fully open and not blocked, that pool water level is at proper level, and that skimmer weir is not hung up or binded on skimmer wall.
- 3. Block off to determine if pump will develop a vacuum. You should have 5"-6" of vacuum at the strainer cover (Only your pool dealer can confirm this with a vacuum gauge). You may be able to check by removing the skimmer basket and holding your hand over the bottom port with skimmer full and pump running. If no suction is felt, check for line blockage.
 - a. If pump develops a vacuum, check for blocked suction line or dirty strainer basket, an air leak in the suction piping may be the cause.
 - b. If pump does not develop a vacuum and pump has sufficient "priming water":
 - i. Re-check strainer housing cover and all threaded connections for suction leaks. Check if all hose clamps are tight.
 - ii. Check voltage to ensure that the motor is rotating at full RPM's.
 - iii. Open housing cover and check for clogging or obstruction in suction. Check impeller for debris.
 - iv. Remove and replace shaft seal only if it is leaking.

Low Flow – Generally, Check For:

- 1. Clogged or restricted strainer or suction line; undersized pool piping.
- Plugged or restricted discharge line of filter, valve partially closed (high gauge reading). <u>How to correct:</u> Sand filters – backwash as per manufacturer's instructions; D.E. filters – backwash as per manufacturer's instructions; Cartridge filters – clean or replace cartridge.
- 3. Air leak in suction (bubbles issuing from return fittings). Re-tighten using Teflon tape.
- 4. Plugged or restricted impeller or impeller sheared off. Replace including new seal assembly.



Noisy Pump – Check For:

- 1. Air leak in suction piping causing rumbling in pump.
- 2. Cavitation due to restricted or undersized suction line or leak at any joint, low water level in pool, and unrestricted discharge return lines. Correct suction condition or throttle return lines, if practical. Holding hand over return fitting will sometimes prove this point or putting in a smaller eyeball fitting.
- 3. Vibration due to improper mounting, etc. Put a rubber pad under metal mounting feet.
- 4. Foreign matter in pump housing. Loose stones/debris hitting impeller could be cause, remove any of the above.
- 5. Motor bearings noisy from normal wear, rust, overheating, or concentration of chemicals causing seal damage which will allow chlorinated water to seep into bearings wiping out the grease causing bearing to whine. All seal leaks should be replaced at once.
- 6. Equipment base vibrating.

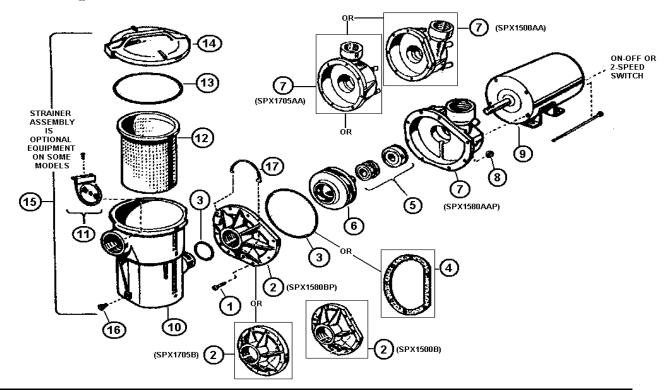
Maintenance

- Clean strainer basket regularly. Do NOT strike basket to clean. Inspect strainer cover gasket regularly and replace as necessary.
- Hayward pumps have self-lubricating motor bearings and shaft seals. No lubrication is necessary.
- Keep motor clean. Insure air vents are free from obstruction.
- Occasionally, shaft seals must be replaced, due to wear or damage. See "Shaft Seal Change Instructions" in this manual.

DATE OF INSTALLATION		
INITIAL PRESSURE GAUGE READING	(CLEAN FILTER)	
PUMP MODEL	HORSEPOWER	
FILTER MODEL	SERIAL NUMBER	

Replacement Parts

Parts Diagram



Ref. No.	Description	Model No. SP1540C	Model No. SP1580, SP1580X15, SW1585X20, SW1585X25, EP1550LX	Model No. SP1750, 1775, 1780
	Housing Bolt, No. 10-24 Hex Head	SPX1500N2 (7 Reg'd.)	SPX1500N2 (8 Reg'd.)	SPX1500N2 (6 Reg'd.)
	Housing Cover	SPX1500B	SPX1580BP	SPX1705B
	Housing O-Ring	SPX1580Z1	SPX1580Z1	SPX1580Z1
-	Housing Gasket	SPX1500E1	SPX1500H	SPX1500H
	Seal Assembly	SPX1500KA	SPX1500KA	SPX1500KA
-		Refer to Part No. on	Refer to Part No. on	Refer to Part No. on
6	Impeller	Original Equipment	Original Equipment	Original Equipment
7	Pump Housing	SPX1500AA	SPX1580AAP	SPX1705AA
8	Housing Nut, No. 10-24 Hex Head	SPX1500Y2 (7 Req'd.)	SPX1500Y2 (8 Req'd.)	SPX1500Y2 (6 Req'd.)
	Motor (for SP1540C) - 40 GPM	SPX1540Z1E		
	Motor (for SP1750) - 1/2 HP			SPX1500Z1E
	Motor (for SP1775) - 3/4 HP			SPX1510Z1E*
	Motor (for SP1780) - 1 HP			SPX1510Z1XE*
	Motor (for SP1580) - 1 HP		SPX1510Z1XE	
	Motor (for SP1580X15) - 1-1/2 HP		SPX1515Z1E	
	Motor (for SW1585X20) - 2 HP		SPX1520Z1ESC	
9	Motor (for SW1585X25) - 2-1/2 HP		SPX1524Z1ESC	
10	Strainer Housing with Basket	SPX1500CAP	SPX1500CAP	SPX1500CAP
11	Check Valve Assembly (Optional)	SPX1500RA	SPX1500RA	SPX1500RA
12	Strainer Basket	SPX1250RA	SPX1500LX	SPX1250RA
13	Strainer Cover O-Ring	SPX1500P	SPX1500P	SPX1500P
	Strainer Cover with O-Ring	SPX1500D2A	SPX1500D2A	SPX1500D2A
15	Complete Strainer Assembly	SP1516	SP1516	SP1516
16	Drain Plug with Gasket	SPX1700FG	SPX1700FG	SPX1700FG
17	C-Clip	SPX1515C	SPX1515C	SPX1515C
18	6' Cord Set (14/3)	SPX1250WA	SPX1250WA	SPX1250WA
19	3' Cord Set (12/3) Twist Lock	SPX1550WA1	SPX1550WA1	SPX1550WA1

* To order 2-speed motor, change "1" in suffix of model number to a "2" (i.e. SPX1510Z2E) *All Twist Lock versions for each pump have "TL" at end of part number (i.e. SP1580TL)



HAYWARD® Pool Products Limited Warranty

To original purchasers of this equipment, Hayward Pool Products, Inc. warrants its products to be free from defects in materials and workmanship for a period of ONE (1) year from the date of purchase, when used in single family residential applications.

The limited warranty excludes damage from freezing, negligence, improper installation, improper use or care or any Acts of God. Parts that fail or become defective during the warranty period shall be repaired or replaced, at our option, within 90 days of the receipt of defective product, barring unforeseen delays, without charge.

Proof of purchase is required for warranty service. In the event proof of purchase is not available, the manufacturing date of the product will be the sole determination of the purchase date.

To obtain warranty service, please contact the place of purchase or the nearest Hayward Authorized Service Center. For assistance on your nearest Hayward Authorized Service Center please visit us at www.hayward.com.

Hayward shall not be responsible for cartage, removal, repair or installation labor or any other such costs incurred in obtaining warranty replacements or repair.

The Hayward Pool products warranty does not apply to components manufactured by others. For such products, the warranty established by the respective manufacturer will apply.

The express limited warranty above constitutes the entire warranty of Hayward Pool Products with respect to its' pool products and is in lieu of all other warranties expressed or implied, including warranties of merchantability or fitness for a particular purpose. In no event shall Hayward Pool products be responsible for any consequential, special or incidental damages of any nature.

Some states do not allow a limitation on how long an implied warranty lasts, or the exclusion of incidental or consequential damages, so the above limitation may not apply to you. This warranty gives you specific legal rights, and you may also have other rights, which vary from state to state.

Hayward Pool Products 400 Connell Drive, Ste 6100 Berkeley Heights, NJ 07922

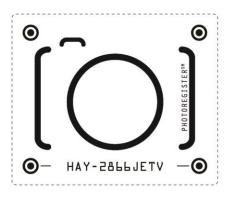
*Supersedes all previous publications.

▲ Retain this Warranty Certificate (upper portion) in a safe and convenient location for your records.

90 DAY EXTENDED WARRANTY^{*} REGISTER WITH YOUR SMARTPHONE

PROTECT YOUR INVESTMENT IN 2 EASY STEPS -

1. TAKE A PHOTO Take a photo of the camera icon



2. SEND IT IN

Send it in using one of the methods below



ONLINE Visit Hayward.com/Warranty

MESSENGER Send photo to photoregister

- OR --

'Extended warranty is in addition to applicable product warranty and is for parts only, labor not included. Need help? Visit photoregister.com/help or text HELP to 71403.

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