



## RX Series & E Series Sand Filters

# INSTALLATION AND OPERATING INSTRUCTIONS



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## RX SERIES SAND FILTERS

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Capacity Table						
Model No.	Tank Diameter	Filter Area	Port Size	6 Hr. Turnover	8 Hr. Turnover	Media Req'd.
RX 280	610 mm	0.29 Sq M	40 mm	85,000ltrs	114,000ltrs	125 kg
RX 360	700 mm	0.38 Sq M	50 mm	130,000ltrs	173,000ltrs	175 kg
RX 400	760 mm	0.43 Sq M	50 mm	144,000ltrs	192,000ltrs	200 kg

Dimensions With Valve Installed			
Model	Height	Width	Shipping Weight
RX 280	105 cm	61 cm	22 kg
RX 360	106 cm	70 cm	32 kg
RX 400	114 cm	76 cm	38 kg

## E SERIES SAND FILTERS

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Model No.	Tank Diameter	Filter Area	Port Size	6 Hr. Turnover	8 Hr. Turnover	Media Req'd
Eco 550	550 mm	0.20 Sq M	40 mm	65,000 ltrs	85,000 ltrs	80 kg
Eco 650	650 mm	0.33 Sq M	40 mm	92,000 ltrs	120,000 ltrs	120 kg
Eco 750	750 mm	0.42 Sq M	50 mm	120,000 ltrs	160,000 ltrs	170 kg

Dimensions With Valve Installed			
Model	Height	Width	Shipping Weight
Eco 550	79 cm	55 cm	13 kg
Eco 650	89 cm	65 cm	17 kg
Eco 750	106 cm	75 cm	28 kg

INFORMATION AND SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE.

## GENERAL NOTES

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1. When unpacking the filter, be sure the unit is complete and no visible shipping damage has occurred.
2. Allow sufficient clearance around filter system for access and maintenance.
3. Provide adequate ventilation for pumping equipment, installed in conjunction with filter.
4. Provide solid mounting for filter and pump. If installed outdoors, install the system on a slab or solid concrete base to avoid risk of settlement. Filter systems once located with media can exceed a weight of 250 kg. If installed indoors, ensure doorway allows sufficient clearance should filter tank require replacing.
5. Installation of filters and pumps should be located as close to the pool as possible to avoid excessive piping friction loss.
6. If system is installed below pool level it is important to install isolating valves to prevent risk of flooding from back up water, from the pool or spa.
7. The proper media selection is critical to good filter performance. Ensure that the media is an approved form of Quartz Silica, glass or Zeolite.
8. The installation of filters requires no special tools.
9. Confirm that plumbing lines from pool are correctly identified. This will ensure proper connection to markings on filter valve (i.e. "Pump", "Waste", and "Return").

## LOADING FILTER MEDIA

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Once the filter system has been positioned, the installation of filter media may be undertaken as follows:

1. Check filter size in order to determine necessary amount of media required.
2. Double check that the internal system consisting of a lateral hub and stand pipe are intact inside the tank.
3. Fill tank half full with water.
4. Place the disposable loading disc into the upper tank opening and the plastic cover over stand pipe to stabilise the filter and stand pipe. It is important that the stand pipe remains centered through the media loading procedure to ensure alignment with valve assembly opening.
5. Proceed to load correct volume of dry media slowly (if media is saturated loading can be difficult).
6. Once media is loaded discard loading disc and check to determine if stand pipe is properly centered in tank opening.

## INSTALLATION OF SELECTOR VALVE

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1. Following the media loading, clean any media particles or debris from upper surface of tank opening.
2. Install six (6) position selector valve after placing **O-Ring** in cavity in underside of valve body. Place valve into tank opening while ensuring that the **O-Ring** has remained in position.
3. Install selector valve into top tank opening and rotate valve to best suit plumbing lines. Once positioned, fit clamp band assembly around neck of filter and valve and tighten sufficiently for good engagement. **Note: It is not necessary to over tighten.**
4. Double check that incoming pool lines are connected to appropriate valve openings as marked on valve port (i.e. pump, return (pool) and waste).
5. The threaded openings on valve are 40mm or 50mm thread which all accommodate Astral Pool barrel unions supplied with the filter. O-rings are supplied to fit between the multiport valve and barrel union. It is only necessary to tighten by hand. **The use of Teflon tape is not required.**
6. Remove plug from side wall of valve and install threaded pressure gauge using Teflon tape wrap (**do not over tighten**). Minimal hand tightening is adequate to provide a good seal.

## VALVE OPERATION

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The operation and the positions of valve settings are as follows:

Valve Settings	Direction of flow through Valve
Filter (also during vacuuming)	From pump down through valve, through sand bed, up through stand pipe to valve and back through pool return.
Back Wash	From pump, through valve, down through stand pipe, up through sand bed, and through valve to waste.
Rinse	Flow from pump, through valve, down through sand bed, up through stand pipe, through valve to waste. (Position also used for initial start-up and leveling sand bed after Back-wash)
Waste	From pump, through valve to waste. Also position for lowering water level or assist in draining pool.
Closed	From pump to valve without further circulation. Prevents any flow to filter and pool.
Recirculate	From pump through valve to pool. This position bi-passes the filter and is used for circulation of pool water only.

**NOTE: Always “STOP” pump when changing selector valve position.**

## INITIAL START - UP

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1. Make sure the correct amount of media is in the filter tank.
2. Prime pump.
3. Set valve handle in BACK WASH position.
4. Start pump and operate in BACK WASH cycle for three (3) minutes. This will purge the filter of excess fines in the media.
5. Turn pump OFF and set valve handle to RINSE. Start pump and run for one (1) minute.
6. Stop pump and set valve handle to FILTER. Restart pump. System is now operating on a normal FILTER cycle.
7. Adjust the valves in the skimmer and main drain lines (if provided) to achieve balanced flow rates.
8. When a pool is filled initially, the filter may have to be BACK WASHED once a day until the water becomes sparkling clear. From that point on, BACK WASH when pressure gauge indicates 30 to 40 kPa higher than at starting pressure.

## OPERATIONAL & INSTALLATION TIPS

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1. Always turn pump “**OFF**” before changing valve positions.
2. Never run pump dry as it depends on water for lubrication.
3. Always maintain minimum water level to ½ way up the skimmer mouth.
4. Clean pump strainer regularly.
5. Maintain a proper chemical balance in the pool.
6. Maximum operating pressure is 250kPa on RX Series and 140kPa on E-Series
7. Ensure pressure gauge on valve is positioned so that rain water cannot collect on glass face.
8. Back wash filter regularly for 3-5 minutes each time to ensure sand is completely cleaned.

## Maintenance of your filter

**Maintenance Schedule:** Your new product incorporates moving parts and withstands high velocity water with chemicals in it. Some of these parts will wear in the normal course of use and require regular checks and maintenance. Performing these checks and maintenance will identify parts that have worn and require repair/replacement before further serious damage is sustained. A small amount of regular care and attention to your pool equipment will help ensure long life and trouble free performance.

Timing	Maintenance Check	Service action (if required)
Fortnightly	Check pressure gauge. If pressure increase is greater than 20kPa cleaning may be required	Perform backwash according to instructions
Three Monthly	Check inlet/outlet o'rings for leaks	Isolate Pump, turn power off, clean and grease O rings or replace if necessary
Annually	Compare operating pressure of backwashed filter to initial pressure (when new) If using Zeolite or M3, regenerate filter media. This is important in commercial applications as it aids in the removal of ammonias.	If pressure is more than 30 – 40 kPa different from new filter, a media change may be required Add salt to filter media per supplier. Allow to sit for 24 hours then backwash, rinse and return to filter.

**Important note:** Regular maintenance is important to ensure long life and trouble free performance of your pool equipment. If unable to perform the maintenance yourself, contact your local AstralPool office who will arrange a trained service technician to perform the maintenance for you.

Record your Equipment details here for quick reference:

Model No.: \_\_\_\_\_

Serial No.: \_\_\_\_\_

Initial Pressure (kPa): \_\_\_\_\_

## WARRANTY – RX SERIES

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### Residential Pools

Your RX Filter is covered by a limited 10 year warranty against defects in materials and faulty workmanship from the date of purchase (plus 30 days to allow for installation)

### Commercial Installations

Your RX Filter is covered by a limited 3 year warranty against defects in materials and faulty workmanship from the date of purchase (plus 30 days to allow for installation)

Limitations: In field labour warranty is covered for a period of 12 months from the date of purchase (plus 30 days to allow for installation). The valve, unions, gauge and internals are covered for a period of 12. Exclusions include but are not limited to; sanitiser in excess of 15 ppm, water pressure exceeding 250 kPa, inadequate access for service, use of filter other than swimming pool and spa filtration, water temperature above 40 deg. Celsius, incorrect filter media or misuse and abuse whether by accident or intention. AstralPool assumes no liability for consequential damages of any kind. No person is authorised to make any representations on behalf of AstralPool other than what is written here.

## WARRANTY – E SERIES

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Your E Series filter is covered by a limited pro rata ten year warranty against defective parts and manufacture. In field labour warranty is covered in capital city metropolitan areas or within a 20 km radius of an authorized AstralPool service agent. For filters located outside this radius, a travelling time and kilometre charge is applicable. The valve and filter internals are covered by a 1 year warranty, while the filter tank is covered by a pro rata 10 year warranty. Should a tank failure occur during the first two years, it shall be replaced free of charge, between two and four years you will be charged 20% of the list price, four and six years 40%, six and eight years 60% and eight and ten years 80% of the list price. AstralPool reserves the right to inspect all merchandise for compliance with warranty conditions and reserves the right to repair or replace defective parts. AstralPool shall not be responsible for consequential damages of any kind whatsoever. Warranty does not cover accidental or deliberate misuse or abuse. The warranty is valid only while the filter is used in accordance with these instructions. Maximum operating pressure is 140 kPa.

### Commercial Installations

On Commercial Installations, such as health clubs, motels/hotels and hydrotherapy, parts and in field labour warranty (within capital city metropolitan areas or 20km radius of authorized service agents) is ONE YEAR from the date of purchase.