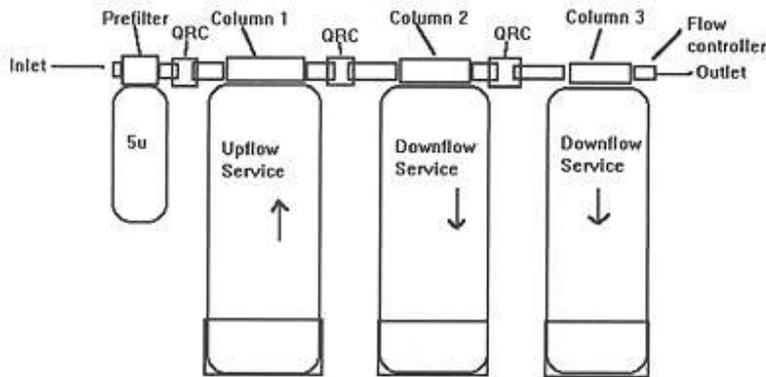


THE EAST RIDING KOI Co Ltd

Internet Address: <http://www.koicarp.net> email: info@koicarp.net

THE AQUASTAR TRIPLE COLUMN MANUAL WATER FILTRATION SYSTEM



UNPACKING THE AQUASTAR:

Please check all components to ensure that there has been no damage of the equipment in transit to you . any damage must be notified to us at your earliest convenience and within 48 hours at the latest ..

The System comprises of three pressure vessels filled with different filtration media, plus a cartridge type pre-filter in its own clear bowl housing . (this is to remove sediment etc within the water supply and will vary from one Water Authority to another) ..

Important Note:

Product information may be impaired if the flow controller (fitted at the end of the system) is removed and it is not recommended. Input water conditions, including pH and chloride can vary widely from area to area. We suggest that you refer to your local water authority for area to area advice if you are unsure of these levels contained within your water .

When the Blanket Weed in your pond has gone completely . then Column 1 Must be removed from the system as it is no longer needed . this will conserve the media and the vessel must be thoroughly flushed out in the direction of service for at least 5 minutes . then carefully store away column 1 until it is required again to combat the return of the Blanket Weed . It is essential that the input flow of water never exceeds the specification for this model (i.e. never use a pressure cleaner etc to feed water into this system) or extremely high water pressure over and above the normal water mains .. if a very low pH is detected defer use of this system until water conditions return to normal.

NEVER install the system DOWNSTREAM of a Nitrate removal system as this will release low levels of chloride which will degrade the media in column 1.

UNDER NO CIRCUMSTANCES should the Aquastar be connected to a recirculating pump either on the filter of the pond or within the pond .. **IT MUST ONLY BE CONNECTED TO THE MAINS WATER SUPPLY** .. the system is only designed to work on normal mains pressure supply - any deviation from this will invalidate the guarantee.

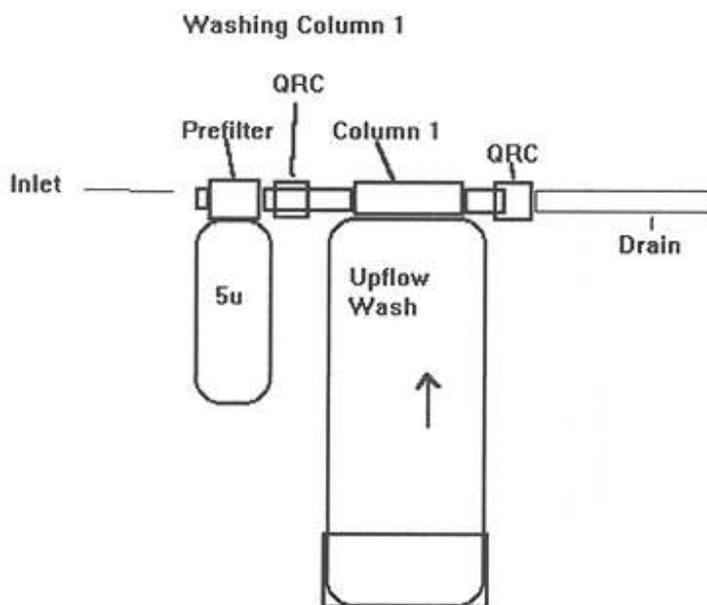
Where possible the system should be fitted with a double check valve in the supply line, this will protect the system and these double check valves are available from any plumbers merchants . Outdoor taps are also available already fitted with these double check valves if you need to fit one for convenience to supply the water mains to the Aquastar.

Column 1 is connected to the incoming mains water supply for normal use. The Service Flow through Column 1 is in an upwards direction and this is the reason we say flush out column one in the direction of service and do not Backwash this column as you would with both columns 2 and 3 .

FLUSHING OUT THE SYSTEM.

Column 1. To flush, turn off the mains water supply and depressurise the system if necessary.

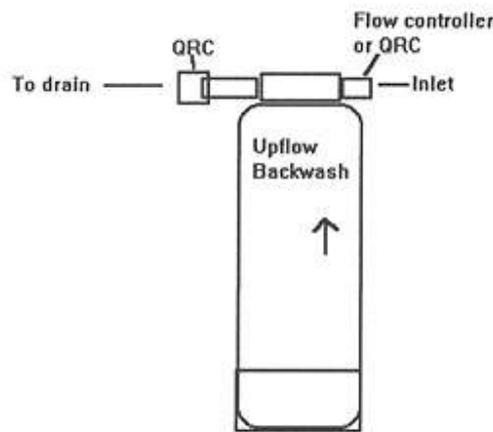
Separate Column 1 from Column 2 at the Quick Release Coupling (QRC) and connect the flushing hose (supplied) to the QRC on Column 1 (inlet). Turn on the water supply and allow the water to run to drain at FULL FLOW in the direction of service for a maximum of 10 minutes .. (minimum 5 minutes) . this will ensure that the column is thoroughly flushed out and any caking of the media is broken down . THIS FLUSHING OF COLUMN 1 IS EXTREMELY IMPORTANT and this flushing MUST BE DONE AT THE VERY LEAST ONCE DURING EVERY 7 DAYS COLUMN ONE IS IN USE IN THE SYSTEM . the automatic model we produce automatically flushes out Column 1 . 3 times during any 7 day period . so if you can and have the available time then this is also recommended with the manual system . this will keep the Media (KDF) in good condition and the system will continue to do the job it has been carefully designed to do and will give you good service ..



Columns 2 and 3 are connected sequentially to the outlet from Column 1 using the close coupled QRC for normal use. **Service flow through the second and third columns is downwards.**

Prior to initial service it is recommended that the complete assembled system is flushed through in the direction of service, to remove any finings and black dust from the media contained within both columns 2 & 3 . failure to do this may result in the water entering your pond system being black .. this will normally not harm the water within the pond but it is best avoided by this initial flushing out of the system . this flushing out can be done for anything up to 15 minutes ..

Backwashing column 2 and column 3



To .BACKWASH. both columns 2 and 3. Depressurise the system (if necessary) and separate columns 2 and 3 at the QRC. Each column should be individually backwashed.

Connect a high pressure water supply (normal mains pressure) to the outlet flow controller on column 3 and run the water backwards through the column and out to drain through the uncoupled QRC. Backwashing column 2 follows the same procedure as backwashing column 3.

MAINTENANCE

The System is essentially maintenance free. Periodic flushing of Column 1 (as described above) is all that is required as far as column 1 in concerned ..

Columns 2 & 3 will require a periodic .Backwashing. to keep the media in those columns in good condition . these columns will remove any excess Heavy Metals, Chloride, Chlorine, Fluoride etc that the water authorities put into the water to ensure that the water they provide is fit for human consumption . but as we all know they are not, as they tell us, in the business to supply water for fish to swim in.. We would recommend that both Columns 2 & 3 are Backwashed out every couple of months .. After approximately 12 months of continuous use the media within columns 2 & 3 will become exhausted and will need replacing . the refills supplied in granular form are available from us and instructions for the changing of the refills will be provided at the time ..

INSTRUCTIONS FOR USE . IMPORTANT THAT YOU FOLLOW THESE INSTRUCTIONS.

If your pond is plagued with Blanket Weed, as it is in most cases when customers seek the help of the Aquastar, then follow these simple instructions:

If your system is a Gravity Fed System (bottom drains to the filter) then you will need to switch off the system and drop out 20% of the water within the pond as the system will not run at this greatly reduced water level. Then using your Aquastar (all three columns and pre-filter) allow the water from the Mains water supply to enter the system . this is best to top up directly to the pond and not via the filtration system as fresh water in such volumes will knock back dramatically the bacteria within your biological filters .. this should be avoided at all costs where possible ..

Because we do fit a .Flow Regulator. at the end of the system . the water passing through the system will be set at approximately 2 gallons per minute . This means it may take some time to top the water levels back up to full running .. perhaps overnight in some cases if the pond is a large one . but you can start the system again once you are sure that you do have enough water back into the system to allow the filtration to run correctly ..

Repeat this action each day (evening time is best when the temperatures are a little lower than midday) for the following 6 days . giving you a total of 7 days . **DO NOT FORGET TO FLUSH OUT COLUMN 1 AT THE VERY LEAST ONCE DURING THIS PERIOD .**

At the end of the seventh day you will (we hope) begin to notice that the Blanket Weed has changed colour and is dying back .. gather as much as you can using a net etc to avoid this dropping to the bottom of the pond and blocking the bottom drains and being pulled through into the filtration system . After this 7 day period you need not drop out large quantise of your pond water providing your system has been fitted with an .Overflow. (which it should have been in the first place) and we then recommend that you allow the water to trickle into the pond system at say half tap pressure and allowed to run to overflow until you are sure that every single trace of Blanket Weed has gone . even the spores of the weed . this is important otherwise the Blanket Weed will regenerate again .

If your pond system is a Pump Fed System . then you will need to pump out the 20% each day and then top up as described above ..

If you follow the above instructions we guarantee that the Aquastar will accomplish its task and will leave your pond water completely free of Blanket Weed and that your water will be of the finest quality possible ..

We hope that the Blanket Weed will not return for many months and when it does start to reappear then simply follow the latter part of the instructions and allow the water to enter the pond system and run to overflow if possible until the new growth as completely gone ..

Every effort has gone into the production of the Aquastar which was first introduced to the Aquatic World in 1994 and we strive to make any modifications to the system as we feel are required to ensure that the Aquastar will do exactly what we claim it will . remember if you are not entirely happy with the Aquastar for any reason then we will give a complete refund if the equipment is returned to us and there is no damage or misuse evident upon our examination of the returned equipment.

The Aquastar is a remarkable, if not a very controversial, piece of equipment and if used carefully and it is looked after will give many years of use . please note that the maximum possible levels of copper introduced into any pond system, in the worst scenario, is 3 mg/l . that is less than the permitted levels within the standards set by the EEC for the Water Authorities

Remember once the Blanket Weed has gone and you have removed Column 1 from the system - Columns 2 & 3 along with the pre-filter can and should be used to filter and purify every drop of water entering your pond via the mains water supply . this will ensure and give you peace of mind that the water entering your pond system is of the highest possible standard.

If used correctly we guarantee that it will not harm your fish or other plant life ..

Finally, the Aquastar has cost you quite a lot of money and we do not recommend that you allow your best friend or neighbour to borrow the Aquastar unless you are 100% sure that the instructions as set out in this leaflet are strictly adhered to . otherwise you may find when you next wish to use the Aquastar yourself that it is not killing the Blanket Weed as it should or did do previously..

**Do not leave the Aquastar unit out in the winter months unprotected .
This could result in frost damage to the vessels.....**

If this damage does occur all spare vessels and parts are available, but work out expensive.

The Aquastar is made exclusively for The East Riding Koi Company Ltd by one of the most leading Water Purification System manufacturers in Europe . so you can be totally sure that you do have the very best equipment possible ..

We at the East Riding Koi Company Ltd wish you every success in clearing the Blanket Weed from your pond and to being able to keep your pond completely free of it ..