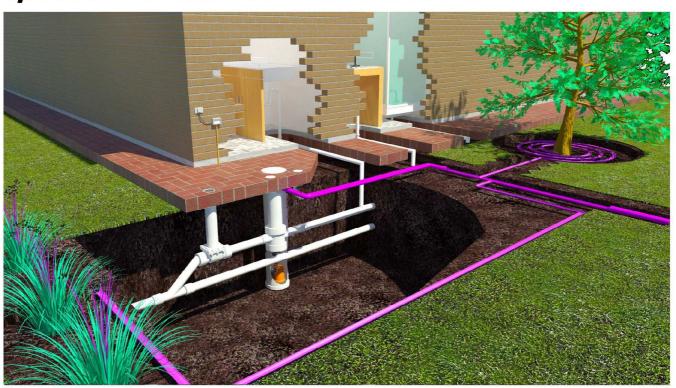


GreyFlow PS System

2-Stage Install for new homes on slab

OIM Manual

Operation - Installation - Maintenance







Grey Water Reuse System

Grey Flow PS Builder's Kit (GFPS-A)							
Grey Flow PS Finishing Kit Manual Filtration:							
100W Pump (GFPS-B-M1) 300W Pump (GFPS-B-M3)							
Grey Flow PS Finishing Kit Automatic Filtration:							

100W Pump (GFPS-B-S1) 300W Pump (GFPS-B-S3) 400W Pump (GFPS-B-S4)

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Selection and Operation

Congratulations, You've taken an important step towards environmentally friendly living with your purchase of the Grey Flow PS Grey Water diversion and reuse system.

The GreyFlow PS 2-Stage Install was developed specifically for new homes on slab, where the greywater waste pipe is located 100mm or more (up to 3m deep) below ground level. The system is a "whole-of-house" greywater diverter with a 100mm inlet and overflow pipe connection.

The 2-Stage installation process is ideal for new homes on slab where the sewer piping is performed at a pre-lay stage before the house walls are erected. The first stage consists of installing the basic carcass of the system "Builder's Kit" at the same time as the plumbing is being layed in the ground by a license plumber. This results in considerable costs saving to the home owner.

The second stage "finishing kit" is to be installed when the house is nearing completion before the outside paving is layed. The "finishing kit" comes in a manual and an automatic filtration option and does not require to be installed by a license plumber.

If the self-cleaning option is selected, it is strongly recommended that the "finishing kit" be installed by one of AWWS acredited installers. AWWS offers a two year warranty when the "finishing kit" and dripline system is installed or signed off by an acredited installer.

Please note: Water from the kitchen is not considered to be grey water, and is NOT suitable to use with the PS System. Manual diversion of the greywater to sewer is achieved by turning off the power supply to the unit. The Grey Flow PS System has Watermark certification, is approved for use in all states, and attracts government grey water rebates wherever available.

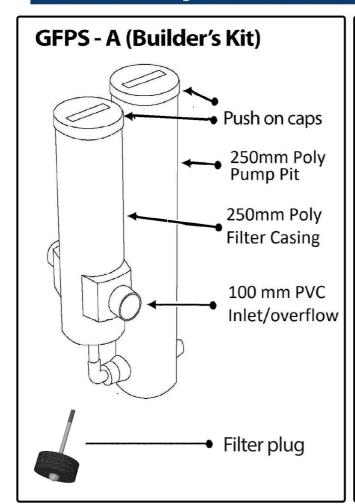
Requirements

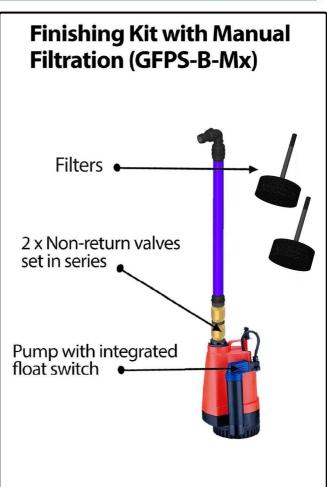
- The water discharge should be kept below mulch or soil (check for local state, municipal & council laws and regulations)
- A dedicated 220Volt power supply should be available
- Any PVC plumbing connections should be performed by a license plumber
- The Grey Flow PS must be turned off during wet conditions and any sign of accumulation or run-off
- All minimum irrigation areas and set back distances must be in accordance to local regulations
- Table 1.0 provides an estimated average volume of greywater that is generated in various parts of the house. Refer to your greywater state guidelines to evaluate your minimum requirements.

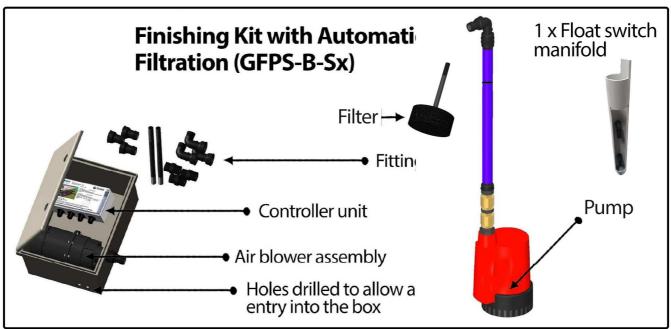
Table 1.0

Number of Bedrooms In the House	Assumed Number of People	Quantity of Grey Water Generated in L/day		Soil Types	Minimum Garden Area In Square m		Recommended Maximum area In Square m	
		Laundry Only	Whole of House		Laundry	House	Laundry	House
2	3	120	300	Sandy	12	30	24	60
				Loamy	18	45	36	90
				Clay	24	60	48	120
3	4	160	400	Sandy	16	40	32	80
				Loamy	24	60	48	120
				Clay	32	80	64	160
4	5	200	500	Sandy	20	50	40	100
				Loamy	30	75	60	150
				Clay	40	100	80	200
5	6	240	600	Sandy	24	60	48	120
				Loamy	36	90	72	180
				Clay	48	120	96	240
6	7	280	700	Sandy	28	70	56	140
				Loamy	42	105	84	210
				Clay	56	140	112	280
7	8	320	800	Sandy	32	80	64	180
				Loamy	48	120	96	240
				Clay	64	160	128	320

GFPS System Components

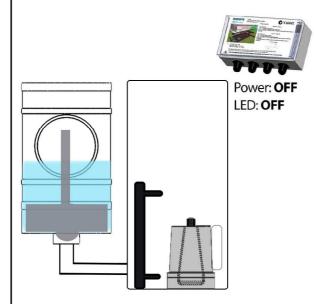






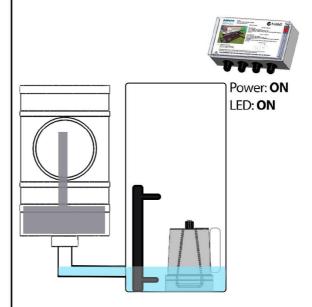
Operating Modes - Automatic systems

Shut off mode



Water enters the system from the inlet pipe, and exits via the overflow pipe

Standby mode

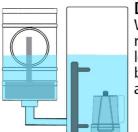


Water level in the main pit is below the float switch level

Operating mode



Power: **ON** LED: **BLINKING**



Delay

Water enters the pit and reaches the float switch level, a delay of 35 seconds begins, before the pump is avtivated.

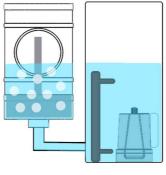


After 35 seconds, the pump starts and the water is directly pumped into the irrigation system.

Filter Backflush mode

Power: **ON** LED: **BLINKING**

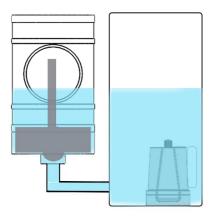




Every 20 pump-out cycle: The water pump turns off, The incoming water oveflows to sewer, The air blower mechanism is activated for 2.5 minutes

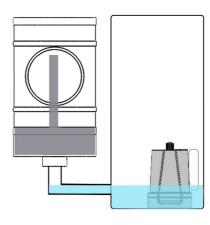
Operating Modes - Manual System

Shut off mode



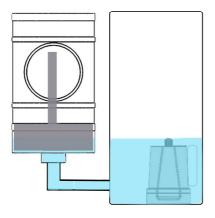
Water enters the system from the entry pipe, and overflows via the overflow pipe. Float switch integrated on the pump is not activated because power is off

Standby mode



Water level in the main pit is below the float switch level. Float switch integrated on the pump is not activated

Operating mode

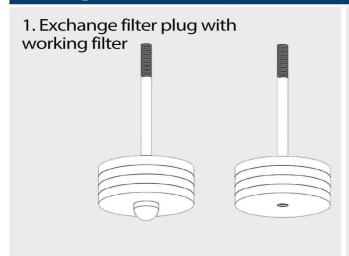


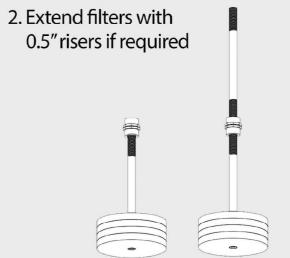
The pump is activated when the integrated float switch is lifted by the raising water in the tank. The pump is deactivated when water level is below the float switch

Step 1:Installing the Builder's Kit

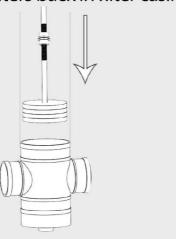
Extend the risers at least 100mm above ground I/O Access (NOT SUPPLIED WITH KIT) Ground Level Pipe extension GOMM to above ground level (NOT SUPPLIED WITH KIT) Height: 1500mm 100mm greywater pipe from house Overflow 420mm to sewer Approved reflux valve (NOT SUPPLIED WITH KIT)

Step 2: Installing the Finishing Kit (Manual Filtration)

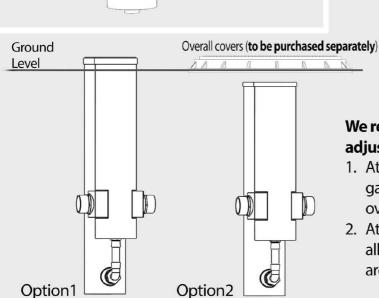




3. Insert filters back in filter casings



4. Cut and adjust the 250mm & 150mm PVC casings to the desired height

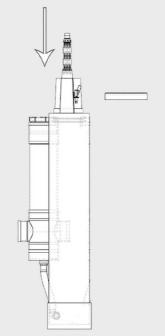


We recommend that the PVC be adjusted:

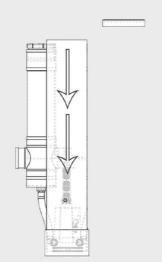
- 1. At least 100mm above ground level in garden bed areas when the optional overall cover will not be used
- 2. At least 50mm below ground level to allow for an overall top cover in paving areas

Step 2: Installing the Finishing Kit (Manual Filtration)

5. Install pump in pit

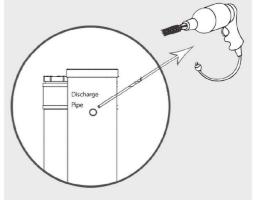


Install the pump all the way into the 250mm PVC pit



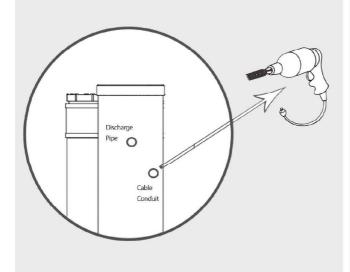
Secure the pump on the bottom of the pit

6. Drill for pump discharge outlet

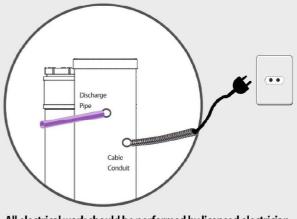


With 25mm low density poly pipe a 29mm hole is required

7. Drill for electrical conduit



8. Run cable through electrical conduit to wall mounted powerpoint



All electrical work should be performed by licensed electrician

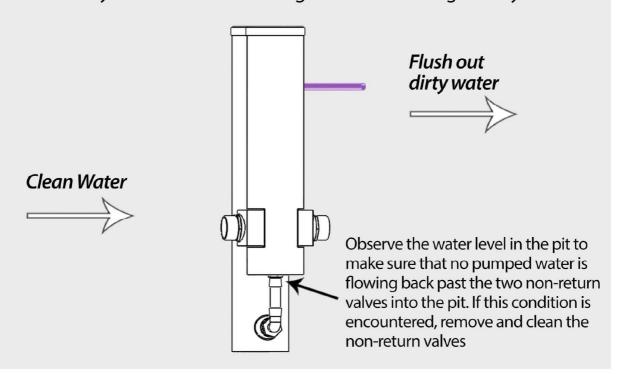
Make sure to seal all drilled holes after inserting pipe/conduit

Step 2: Installing the Finishing Kit (Manual Filtration)

9. Install optional overall cover (available in a round or square shape)



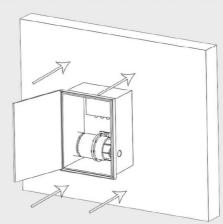
10. Flush the system before connecting to subsurface irrigation system

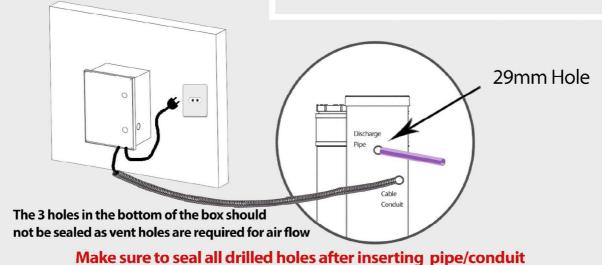


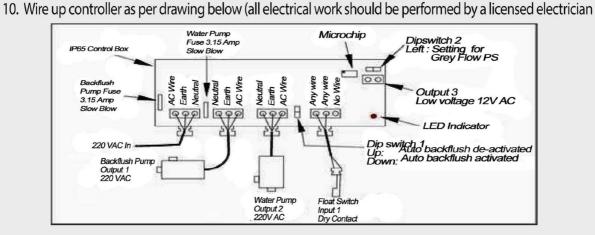
Step 2: Installing the Finishing Kit (Automatic Filtration)

Step 1 - 7. Same as Installing the Finishing Kit with Manual Filtration

Run cables (power cord & float switch cables) through electrical conduit to wall mounted cabinet 8. Install wall mounted cabinets







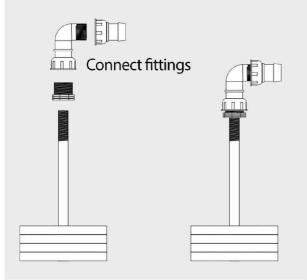
Equipment protected by double insulation



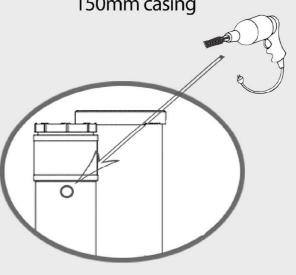
THIS EQUIPMENT MUST BE DISCONNECTED BEFORE ACCESSING AND/OR SERVICING

Step 2: Installing the Finishing Kit (Automatic Filtration)

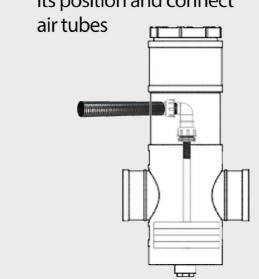
11. Prepare filters for connection to blower



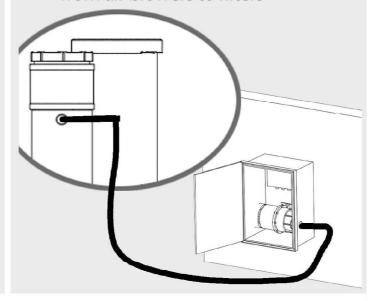
12. Drill a 29mm hole in each 150mm casing



13. Secure the filters back to its position and connect air tubes



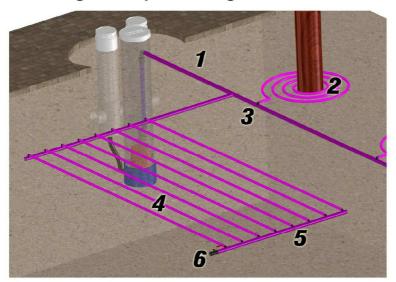
14. Run 25mm low density poly pipe from air blowers to filters



Step 14 - 15. Same as Step 9 - 10 of Installing Finishing Kit for Manual Filtration

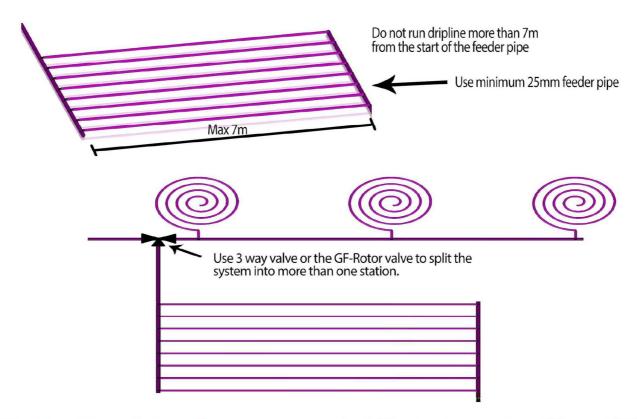
Step 3: Installing the Grey Flow Irrigation System

Installing the Drip Tube Irrigation lines



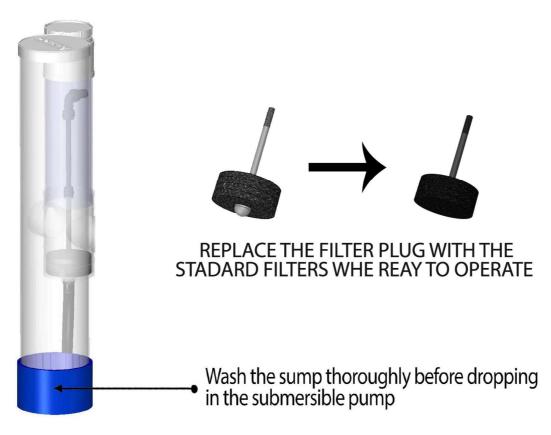
- 1. 25mm or larger feeder pipe
- Coil of GF Drip Tube around trees
- 3. Elbow takeoff adaptor
- 4. 16mm GF Drip Tube (no more than 7m length)
- 5. 25mm Flush manifold
- 6. Manual flush valve

To avoid grey water overflow to sewer, use all 100m dripline supplied per station



Warning: Use only GreyFLow recommended dripline. Warranty will be void if non-recommended dripline is used. Do not use more than 100m of dripline per station.

Important Do's and Don'ts





Never leave the dual interceptor without filters (2 extra filters have been provided for instant swap at filter cleaning time)



Make sure to insert filters all the way down to the bottom of the interceptor (the filter 1/2" risers should be standing vertically)

Maintenance

To retain the original reliability and performance of the GFPS System the following maintenance procedure should be followed. Please ensure that you wear gloves wash your hands thoroughly when in contact with greywater or handling any part of the GFPS System.

The following maintenance steps should be carried out at least every 2 months with the manual option of the GFPS or at least every 2 years with the self-cleaning systems

- Open top cover of the GFPS Tank
- Remove the filters and wash thoroughly in a bucket, with a garden hose or in any basin not connected to the dedicated grey water line.
- Wash thoroughly the tank with a garden hose and drain the tank using the pump.

Maintenance on the dripline irrigation system should be carried out at least once a year as per following steps:

- Disconnect the GFPS pump and connect directly the scheme water supply to the pump discharge
- Flush the greyflow emitters with fresh water for about five minutes.
- Re-insert the filters to their original position, close the lid of the tank and the system is ready to operate again.
- Top up mulch over the Grey Flow emitters to a minimum depth of 2".

Limited Consumer Warranty

ADVANCE WASTE WATER SYSTEMS

Two Year Limited Warranty

Advance Waste Water Systems (AWWS) warrants this product against material defects in materials and workmanship for a period of TWO YEAR from the date of the original retail purchase (warranty period). Warranty work will be done in accordance with the following terms and conditions. This warranty only benefits the original purchaser.

THIS WARRANTY COVERS ONLY DEFECTS IN MATERIAL AND WORKMANSHIP. THIS WARRANTY DOES NOT COVER ANY OF THE FOLLOWING:

- 1. Expendable items that can wear out from normal use, including but not limited to, filters, or similar perishable parts.
- 2. Damage to or failure of this system if it is not installed, operated, or maintained according to all instructions supplied with the system.
- 3. Damage to or failure of this system resulting from accident, abuse, misuse, or use for other than its intended purpose, Act of God.
- 4. Damage to or failure of parts or system resulting incomplete or improper installation or from unauthorized modifications made to this system.
- 5. If you purchase the system from an unauthorized retailer or dealer.
- Damage caused by power surges, electrical storm damage, incorrect power supply, or insect or vermin infestation
- 7. Damage to or failure of parts if this system is serviced or rapaired by anyone other than an Authorized Service Center.
- 8. This warranty extends only to you, the original purchaser. It is not transferable to anyone who subsequently purchased this product from you.
- 9. Use for more than a single family or use in a commercial establishment or for commercial non-household purposes.
- 10. Parts and systems not supplied by AWWS are not covered by this warranty

Any item which has been repaired or replace under this warranty shall be covered for the remainder of this original warranty as extended by the number of days that the product has been out of your hands for repair.

Disclaimer

Disclaimer of implied warranties; Limitation of remedies

- 1. All implied warranties, including implied warranties of merchant ability and fitness for a particular purpose, are limited in duration to one year from the date you purchased the product.
- 2. Neither AWWS nor its affiliates are responsible or liable for any loss, inconvenience or damage, whether special, exemplary, direct, incidental, consequential or otherwise, and whether known or should have been known to AWWS including damage to or replacement of other equipment and property and personal injury resulting from any breach of warranty, the inability to use the product or under any legal theory in contract or tort. There warranties and remedies are the sole and exclusive warranties and remedies given by AWWS in connection with the sale and use of the product. No other warranties, oral or written, express or implied are given.
- 3. In any event, AWWS's entire liability shall be limited to the actual purchase price you paid to the retail seller of the defective product. This limitation applies whether damages are sought or a claim made, under this warranty or as a tort claim (including negligence and strict product liability), a contract claim or any other claim. This limitation cannot be waived or amended by any person. This limitation of liability is effective even is AWWS or any authorized repre sentative of AWWS has been advised by you of the possibility of such damages. This limitation of liability, however, shall not apply to claims of personal injury.
- 4. No AWWS dealer, agent or employee is authorized to make any modification, extension, change or amendment to this warranty.

YOUR RESPONSIBILITY

The above limited warranties are subject to the following conditions:

You must provide your original bill of sale, invoice or other proof of purchase of the system showing that you are the original purchaser, that the purchase was made within two years of the date of your claim and that you purchased it from an authorized dealer or retailer. No warranty work will be done without this information. Keep a copy of your receipt or invoice for your own records. These limited warranties are effective only if this system is purchased and used in AU region Labor and service charges for warranty repair, installation, set up, and adjustment of customer control are not covered by these limited warranties. Should you encounter a defect in the system, www.greyflow.net.au to find the closest authorized service center. Contact the center and it will arrange for an inspection and corrective action, if needed and if covered by this warranty.

Should the center determine that the system is not covered by this warranty; any corrective work will be performed at your request and at your expense. If the center makes a second and/or subsequent visit and determines that there is no problem or that the system is not covered, the service call will be charged to you.

When making a warranty clain, please be prepared to provice a description of the system, your name, address, work day telephone number, a description of the problem, the date you purchase the system and the identity of the seller.



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