

Tradewaste Lint Filter System

INSTALLATION, OPERATION &
MAINTENANCE MANUAL



CONTENTS

TRADEWASTE LINT FILTER SYSTEM	3 - 18
1. Safety	3
2. Pre-Installation Precautions	4
3. Pre-Installation Checklist	5 - 6
4. Pit Installation - Fibreglass	7
5. Pit Installation - Concrete	8 - 12
6. Electrical Installation	13 - 14
7. Completion Checklist	15
8. Routine Maintenance	16 - 17
9. Typical Drawing	18

APPENDIX A: Warranty and Service Information



SAFETY

In addition to any safety instructions in the various equipment sections of this manual, it is also essential that all persons involved in the operation and maintenance of the pump station are made aware of the dangers associated with the entry of a pump station and take the necessary safety precautions. **ONLY** qualified personnel with current Confined Space Entry certification should contemplate entering a pump chamber, and then only if there is a second qualified person equipped with required safety equipment supervising.

The following checklist, although not comprehensive, must be followed:

- Conduct a risk assessment before entering the chamber, and fill out associated form. Do not enter a pump station unless absolutely necessary.
- Never work alone. Use lifting harness, safety line and respirator. Do not ignore the risk of drowning. Beware! Rungs can give way without warning.
- Check that lifting equipment is of an approved type and is in good and safe condition.
- Do not ignore the risk of electric shock. Use only equipment protected by an RCD. Isolate power at the control panel before entering the chamber.
- Use a gas meter to make sure that there is sufficient oxygen and that there are no poisonous gases in the working atmosphere so as to prevent suffocation and explosions at the installation site. Ensure adequate forced ventilation.
- Check the explosion risk before welding or use of electric hand tools.
- Place a suitable barrier around the work zone that meets local rules for safety at work.
- Make sure there is a clear path of retreat from the point of installation.
- Use all the necessary personal safety equipment such as helmet, safety goggles, rubber gloves and protective footwear.
- Do not ignore the risk of infection. The highest standards of personal hygiene should be observed and all local regulations observed.
- When removing a pump from the chamber, make sure that power is isolated to the pump and that it cannot be accidentally turned on. Clean unit thoroughly before starting to work on it.

PRE-INSTALLATION PRECAUTIONS

Before installation, operation or maintenance of the system, read instructions and equipment manufacturer's specific instructions carefully.

System operation may cause injury. Take all necessary precautions. Wear necessary protective equipment. Refer to the engineers' department. Any maintenance of pump systems must be carried out by authorised qualified personnel only.

DANGER - HIGH VOLTAGE

Control boxes contain high voltage live wiring and terminals. Entry of control boxes is not permitted except by authorised service personnel only. Ensure controller is correctly isolated before entering.

WARNING - CONFINED SPACE

Under no circumstances should pump pit be entered by persons. Systems are designed to facilitate pump removal and component servicing from the surface. In the case of entry being unavoidable correct safety procedures should be carried out in accordance with current OH&S requirements. Personnel entering should be certified for confined space entry, have completed risk assessment, evacuated chamber of dangerous gases and be wearing breathing apparatus and safety lifting lanyard/body harness attached to an approved lifting system.

WARNING - NOXIOUS AND DANGEROUS GASES

System may emit dangerous gases. Ensure area is well ventilated prior to removing pit cover/lid

WARNING - DEEP PIT

Removal of pit access cover or incorrect fitting/installation of pit access cover may cause injury. Never leave an open pit unattended. Always have adequate barricading and warnings to prevent accidental falling. Ensure lid or cover is correctly reinstalled and sealed after removal. Removal of cover/lids must only be performed by authorised personnel.

CAUTION - CORROSIVE LIQUIDS

System may contain corrosive liquids/gases that may cause injury or equipment damage. Avoid all contact with skin and thoroughly wash/treat any equipment that contacts liquid.

WARNING - BIOLOGICAL RISK

The system may contain bacteria, infectious disease and other harmful substances. Exercise extreme care when near or working on the system. Avoid direct contact with components that have been in contact with waste liquids or gases.

Finally, take care and use common sense when working on or near system and report all faults to the maintenance manager.

PRE-INSTALLATION CHECKLIST

CAUTION:

- Installation should be carried out by experience and qualified tradesmen.
- Before digging, call any relevant authorities to locate any underground lines or cables.
- The installation of a pump station requires the prior approval of local authorities. Questions relating to this should be directed to a responsible officer of the local council and/or other relevant authority. Allied Pumps regrets we are unable to supply this information.

The following information must be regarded as a guide only and is to be read in conjunction with printed detail sheet for the particular tank installation proposed.

1. Determine the best location for your tank and control panel (if applicable).
2. Correct appraisal of site conditions is essential before installation of sewage and storm water tanks. Installers must recognise that whilst many sizes have a greater mass than the water they displace, other tank sizes can be affected by high water table conditions. Should the upthrust exceed the station dry weight, concrete ballast should be poured around the base of the tank.

Please consider:

- a. Drainage, particularly at the tank base
 - b. The rise in water due to
 - i. Tidal conditions
 - ii. Saturation of the ground during heavy rain
 - iii. Likelihood of flooding or run-off water from any source
 - c. The quality of available backfill
3. Check for any damage to tanks. During transport and handling over rough ground, be careful to avoid “bruising”. Contact with solid surfaces, lifting accessories or dropping of the tank may result in damage to the concrete surface, which must be repaired before installation. Refer to supplier.
 4. Minimise the use of elbows on the inlet line. If required, use only 45 degrees elbows.
 5. Plan your installation location carefully to ensure that the inlet pipe stays within the allowable inlet height.
 6. Determine where the incoming power will be supplied from and if it can handle rated load for your pump station.
 7. Mount the control panel, when applicable, in accordance with electrical codes and where the alarm light can be easily seen.
 8. Make sure you have all the necessary equipment and supplies before starting your installation.

9. Determine the length of electrical cable required as all joints in cables must be made by approved submersible splice. Only extend cables with cable of equal or greater submersion rating and current carrying capacity.
10. Finish ground level in relation to tank lid, as tank lid risers are not normally recommended. Also, the lid must not be buried at any time.
11. The temperature for pre-treated wastewater must not exceed 38 degrees Celsius at the TWSP. If there is a risk that this could occur then a grated cover must be fitted, in lieu of a gas-tight cover, to the top of the cooling pit chamber.
12. To ensure good ventilation cross-flow the penetration of standard vent line into pit must be on the opposite side of the chamber to the penetration of the turbo vent line.
13. Finished floor must be graded away (sealed areas) from the Trade Waste Sampling Point (TWSP) access cover and Lint Filter Cover. If system is located in un-sealed area then these access covers must be raised above the surrounding ground level. These measures are required to mitigate ingress of ponded liquids and debris.
14. Lint Filter ID Nameplate with system model number must be clearly visible inside the manhole opening of the unit when the lid is removed. Please ensure this is clean and intact prior to authority inspection.

Lint Filter Nameplate

ALLIED PUMPS LINT FILTER PACKAGE	
Model Number	
Req	
Serial Number	
Water Corp Approval Number	AN-022-

PIT INSTALLATION - FIBREGLASS

1. The hole for the tank should be no greater than 250 to 300mm oversize to tank diameter, with due regard to the amount of concrete or backfill to be used under and around the tank.
2. It is suggested the base of the tank be drained, especially in water charged ground, before, and until concrete encasement has set, to hold the tank securely in the ground.
3. Lay minimum of 100mm of 20mpa concrete in bottom of hole.
4. Lower tank into hole, while concrete is still slurry. Ensure no rocks or sharp objects fall into hole as damage to the tank and base could occur. NOTE: Lifting as recommended by tank manufacturer is to use, slings around tank neck, this in no way replaces standard lifting techniques – refer engineering department.
5. Where locking holes are provided in the base of the tank, fit reo bar so it penetrates the concrete slurry to stop the tank base moving.
6. Level and adjust tank to suit installation conditions.
7. Fill tank with water up to the first rib or at least 300-400mm depth.
8. Secure tank with stabilizing bars or timbers to hold in place before encasing with concrete.
9. The tanks are provided with a collar approximately 300mm from the base. The purpose of this collar is to create a bond between the tanks and the backfill material to withstand the upward forces when the tanks are empty.
10. Check local council and other authority's requirements concerning levels. Ensure you have relevant inspector's approval before backfilling commences.
12. Whilst site conditions will determine the amount of concrete encasement, you should refer to engineer's instructions for each individual site.
13. Backfill material must not exceed 100mm to underside of lid when fitted with Gatic type concrete in-fill lid.
14. When backfilling use sand or soil only. At all times be careful that rocky or sharp objects are not used. Avoid use of heavy soils that do not consolidate.
15. Inlet pipes must be vented.
16. Inlet pipes must be fitted with a "T" junctions and dropper pipe on the inside of tank.
17. All pipe connections to tanks must be flanged and sealed to stop water and dirt ingress.
18. Minimum inlet height from base of tank to the underside of pipe would be 600mm.

PIT INSTALLATION - CONCRETE

1. Delivery

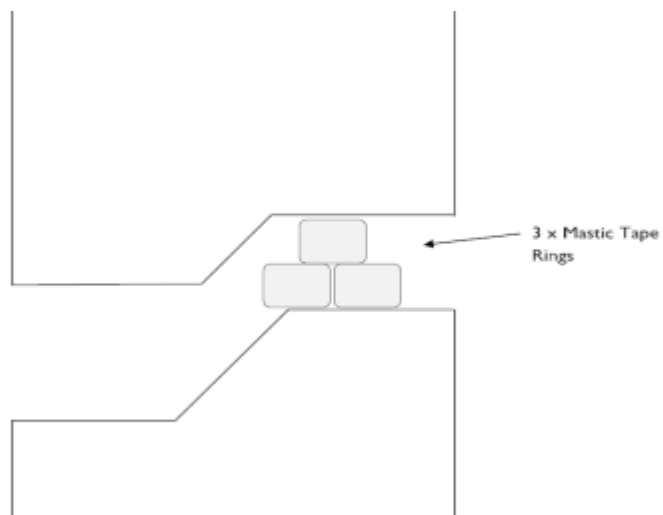
The pit will be delivered on-truck-on-site (in metro area only) in sections due to height limitations. “SWIFT LIFT” lifting eyes will be required. Please ensure these are on-site prior to delivery of the pump station. 4 x 5 tonne ‘SWIFT LIFTS’ AND 3 x 1.3 tonne is required. – Refer lift certification and diagrams in this manual.

2. Orientation

To ensure the base is installed correctly, the ‘key’ in the rebate on the top lip on the pit must face forward towards rising main. This is important as it determines location of discharge pipework etc. Install base unit in compacted fill (see note 3), then increments – using largest increments first – and then lid. Increment with discharge spigot is obviously last one on before lid (regardless of size – except in the case of valve chamber increment it may be different).

3. Sealing Increment Joints

Use only Mastic strip sealant supplied and should be inserted between each joint. Thoroughly clean rebate before applying the sealant and ensure it is free from defect or damage. If ground is water charged, rebate should be primed with a ‘butyl mastic’ primer. Sealant should be installed on the higher lip of the rebate and in 3 continuous rings. Sealant rings to be installed 2 side by side and the third on top of these. Take care that there is no break in the sealant rings, and that they are positioned such on the inner edge of the top lip as shown on the diagram. The internal joint should be filled with epoxy putty (example Megapoxy PI A & B) after installation.



4. **Base Preparation**

Refer 'Drawing Base Casting Details' in this manual for installation details. Note these are typical and special site conditions require special civil engineering. Base must be firmly compacted, dry and level. If the lean mix is to be poured around the base after installation in high water table areas, enlarge diameter of the hole around the base area only by approximately 500mm.

5. **Backfill**

Once the pit is installed, backfill and compact up to within 500mm of the invert level of the lowest inlet pipe.

6. **Fitout**

Pump guide rails will need to be inserted into the guide holes of the auto couplings at the base of the pit, trimmed to the exact length, and secured at the top of the wet well by the upper guide bracket.

7. **Coring**

If the pit has not been pre-cored, mark out holes and arrange coring.

8. **Pipework**

HDPE / PVC pipe lengths will be supplied loose with the shipment. These will need to be inserted into the sockets on the auto couplings at the bottom of the pit, and into the sockets of the valve array inside the valve chamber at the top of the pit. These fittings will need to be professionally fusion welded / glued. Pipework installation / connections to be as per AS/NZS 3500.

Note: A FUSAMATIC brand welder will be required to be available on site to carry out the welding of the above fittings.

9. **Pipe Penetrations**

Once pipes installed through the wall of the pit, use 'Ferropre' (or equal approved epoxy) to seal pipes inside and out.

10. **Electrical**

Pumps and level sensors are supplied with cable, (typically 10m) and should be conduited in 2 x 50mm conduits with large radius bends, from inside the pit just underneath lid, to pump controller (controller location should be maximum of 5-6 metres and in clear view of pump pit). If the control box is further than 5-6 metres away a water-proof below ground junction and cable extension will be necessary. All joints must be totally waterproof – either glue filled heat shrink or epoxy filled joint. Allow clear height of 2000mm above floor level and 600mm width for switchboard mounting. Pump and level sensor connections are as per the wiring diagram inside panel. Pump cable ends must be kept dry at all times. Conduits to be plugged after installation to prevent gasses entering controller.

11. **Discharge**

Discharge pipework finishes with a common outlet outside the pit for rising main connection. Discharge must be connected to a TWSP (Trade Waste Sampling Point) before going to sewer as per the water corporation drawing HX33 -I I-30.

12. **Completion**

When all above completed, finish backfill and site works, fix Gatic covers in position (if loose fitting) and pour concrete floor or level ground etc.

13. Power Supply

A permanent power supply must be terminated in the controller. For single phase pumps, power supply to be a minimum 4mm square two core and earth. For three phase pumps, power supply to be a minimum 4mm square, three core and earth and neutral. Ensure power supply is in accordance with S.A.A. wiring rules. Western Power regulations and to suit relevant motor KW.

14. Commission

When all above completed, fill in the pre-commission checklist and send to ALLIED PUMPS (service@alliedpumps.com.au or 08 9358 0060), leaving minimum one week notice to commission system.



POCUS & ASSOCIATES PTY. LTD.
 Consulting Civil & Structural Engineers
 1.32 Edge Terrace
 Woyville, S.Aust., 50354
 Telephone (08) 8572 5711
 Facsimile (08) 8572 0335

489 77 007 916 225

SITE: **STANDARD PUMPING STATION**

Project North

Design **SC**
 Drawn **MP/DA**

Ref. no. **6117**

TITLE: **BASE CASTING DETAILS**

Date **5/11/2008**
 Sheet **D1** of **7**

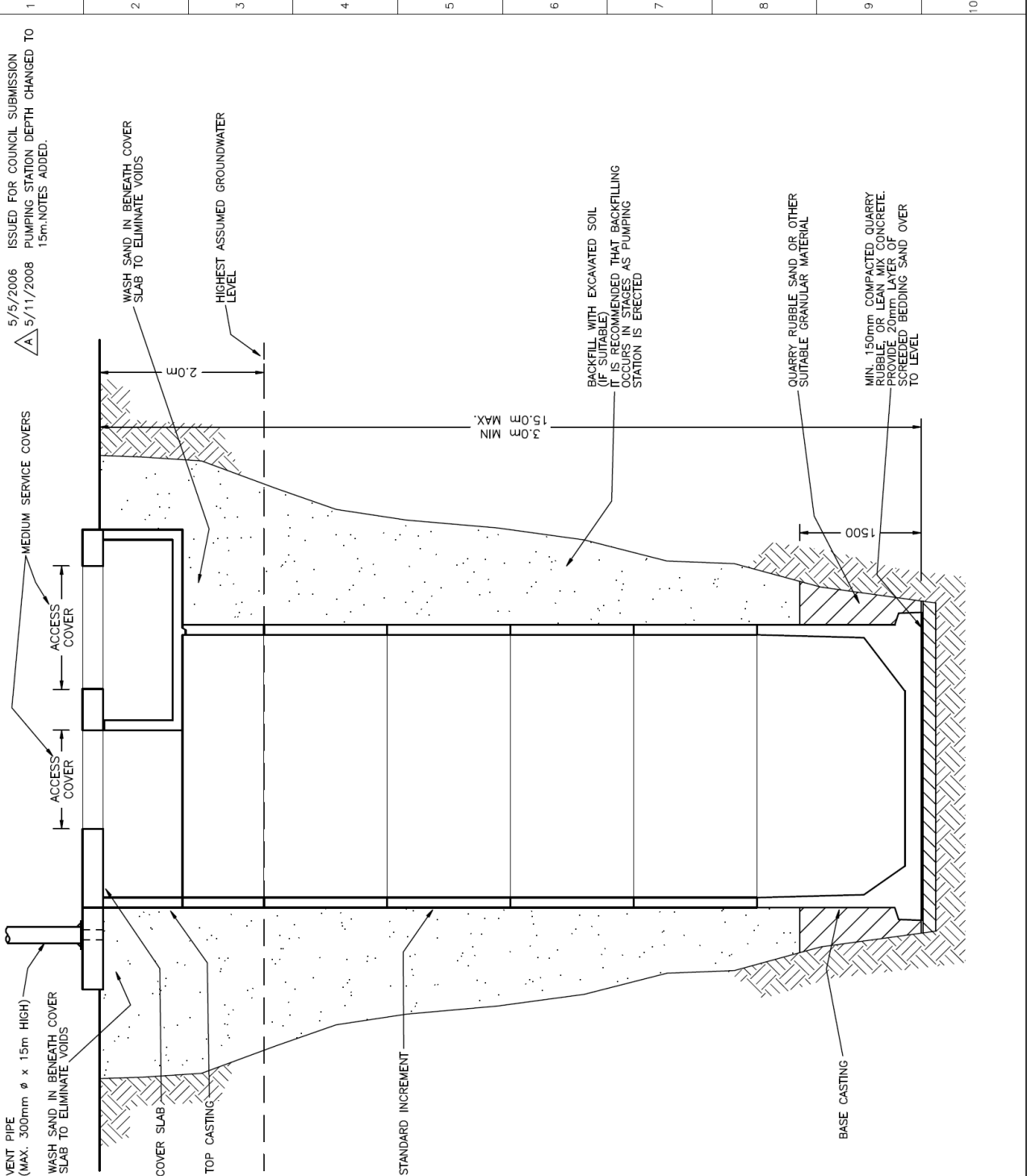
Scale **1 : 50**
 Rev. **A**

**VENT & SLAB DESIGNED FOR
 MAX. WIND SPEED OF 47m/s
 (ULTIMATE)**

**THESE CALCULATIONS AND
 DETAILS ARE VALID UNTIL ANY
 CODES OR STANDARDS
 GOVERNING THE DESIGN ARE
 AMENDED, OR FOR FOR A
 MAX. OF FIVE YEARS FROM
 THE DATE OF ISSUE.**

**SEGMENT WEIGHTS AND
 CONCRETE VOLUME**

- BASE CASTING**
 APPROX. 14.5 TONNES
 APPROX. 5.9m³ OF CONC.
- STANDARD INCREMENT**
 APPROX. 4.6 TONNES
 APPROX. 1.9m³ OF CONC.
- VALVE CHAMBER**
 APPROX. 7.3 TONNES
 APPROX. 3.0m³ OF CONC.
- COVER SLAB**
 APPROX. 5.8 TONNES
 APPROX. 2.4m³ OF CONC.
- COVER SLAB
 (WITH ADDITIONAL METRE)**
 APPROX. 7.9 TONNES
 APPROX. 3.3m³ OF CONC.



CONCRETE NOTES:

1. All concrete work shall comply with AS 3600.
2. All concrete shall be vibrated with a mechanical vibrator.
3. All concrete shall be properly cured.

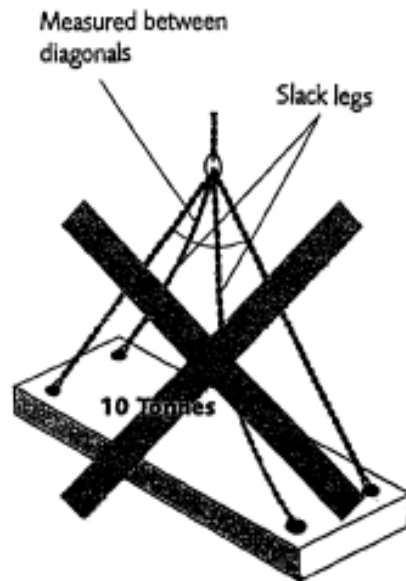
GENERAL NOTES:

1. This drawing must not be used in determining precise details with respect to boundaries.
2. This drawing is to be read with the Engineer's Report and Architectural documents.
3. Refer to Architect's drawings for all setting out and dimensions.
4. All levels and dimensions to be confirmed on site prior to construction. Any discrepancies shall be referred to the Engineer for decision before proceeding with the work.
5. The Engineer's drawing shall not be scaled.
6. Bench mark to be established prior to construction.
7. Contractor shall ensure that the structure is built on a stable condition for maintaining the structure in a stable condition.
8. Additions and substitutions shall only be made with the Engineer's prior knowledge and approval.
9. Refer to sheets SD1 & SD2 for standard details.
10. IF IN DOUBT ASK!

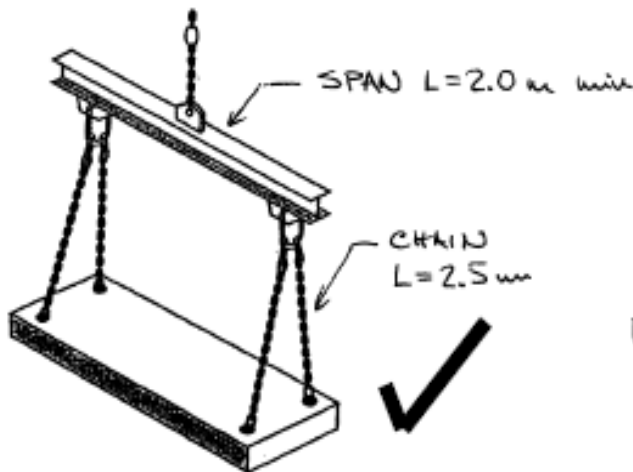
3.2 Effective Rigging

The effect of uneven slings from a central lifting point

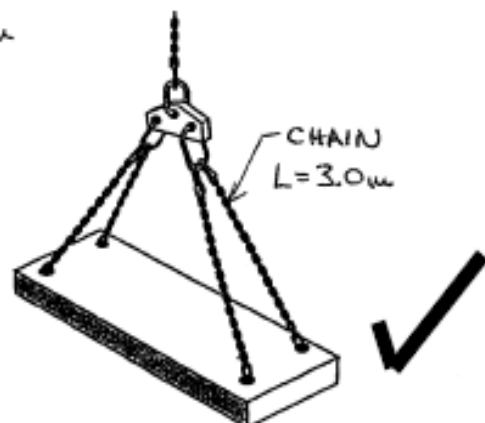
When lifting with 4 slings any slight variation in sling lengths will cause the load to be shared between 2 slings **Not** 4 slings causing individual anchor and sling loads to double. This lifting arrangement is not recommended, unless all the load can be taken on either pair of diagonal anchors.



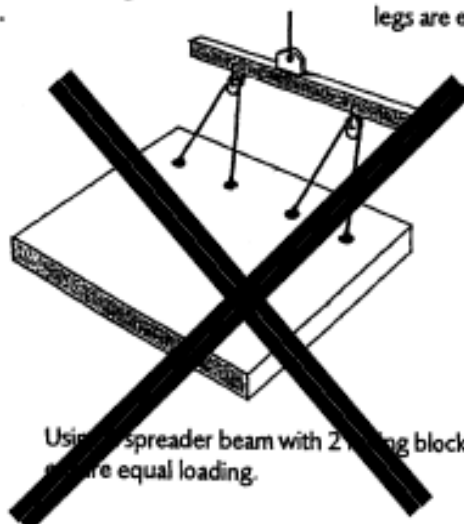
Recommended methods or Good Practice



Using a spreader beam with two sets of chains will ensure the legs are equally loaded.



Using a triangular spreader beam with shackles and two sets of chains will ensure legs are equally loaded.



Using spreader beam with 2 lifting blocks to ensure equal loading.

BASE CASTING
13/12/06
UP

ELECTRICAL INSTALLATION

ELECTRICAL WORK MUST ONLY BE CARRIED OUT BY QUALIFIED AND COMPETENT PERSONNEL.

ELECTRICAL CONNECTION AND ALL WIRING SHOULD BE CARRIED OUT IN ACCORDANCE WITH LOCAL REGULATIONS AND AS/NZS 3000.

READ ALL WIRING DIAGRAMS AND INSTRUCTION SHEETS SUPPLIED BEFORE ATTEMPTING ELECTRICAL CONNECTION. IF IN DOUBT, CONTACT ALLIED PUMPS SALES AND SERVICE FOR ADVICE AND COPIES OF WIRING DIAGRAMS OR INSTRUCTIONS SHEETS.

POWER SUPPLY

Ensure available power supply complies with electrical data on pump and control panel nameplates.

Power should be supplied via a main isolating switch.

A clearly marked dedicated circuit of an adequate capacity must be used. Pay careful attention to voltage drop regulations.

CONTROL PANELS

Connection to control panels must be made as per instruction sheets and wiring diagrams supplied. All unused wires are to be terminated in insulated connectors.

Allow at least 1m x 1m clear-standing space in front of the control panel and position well away from possible damage by vehicles/machinery etc.

Thermal overloads fitted should be adjusted to full load amps noted on pump nameplate.

Keep clear of unprotected impeller.

CONDUITS

All wiring from control panel to external points must be in approved heavy duty conduit or trunking.

Conduits from tank to control panel must be adequately sized with a minimum amount of bends to allow easy insertion/withdrawal of wires.

All conduits entering control panel must be sealed internally with silicone or similar to prevent ingress of moisture or fumes from the pit

CABLES

Do Not Allow Cable Ends To Be Submersed.

Joints in cables must be made by an approved submersible splice. Only extend cables with cable of equal or greater submersion rating and current carrying capacity. Leave enough slack cable in pit to allow easy and complete removal of equipment from tanks. Ensure that this loose cable is secured at the access manhole to prevent float switch tank.

Float switches are fitted with 20 metres of cable. Whenever possible, cables should be run directly to the controller.

Junction boxes must not be installed inside the tank. Any connection, other than those made in pump control panel must have protection rated to IP68 using approved waterproof heat shrink or epoxy resin joints.

Failure to comply will void warranty and could cause serious damage to pumps and other equipment.

COMPLETION CHECKLIST

(BEFORE COMMISSIONING)

1. Distribution main completed and tested.
2. Permanent power completed.
3. Test water available in supply tank.
4. Mains connection to control panel.
5. All cabling installed.

Please be advised that if the above list is incomplete, extra charges may be incurred for extra work or lost time

ROUTINE MAINTENANCE

When a lint filter system is initially commissioned it should be visited daily for the first week to check that all the systems are working correctly. Particular care should be taken with a new installation that foreign matter such as concrete, silt, gravel, timber or tools do not foul the filter.

The system should be visited on a monthly basis to check the operation.

A high degree of cleanliness of the equipment and surrounding area should be maintained as this will assist in the detection of minor defects, which, if no action was taken, could lead to more serious problems.

Depending on operation and environmental conditions with a comparison of previous inspections, the frequency of inspections can be altered to maintain satisfactory operation of the plant to suit established operation routines. The checks and inspections carried out during the running-in period will often establish the frequency of future inspections.

WARNING

Lint Filter system must not be left unattended, or operating, without filter cartridge installed.

Failure to comply with the above may be subject to a Water Corporation non-compliance notice being issued.

For further information please contact Allied Pumps on (08) 9350 1000

MAINTENANCE

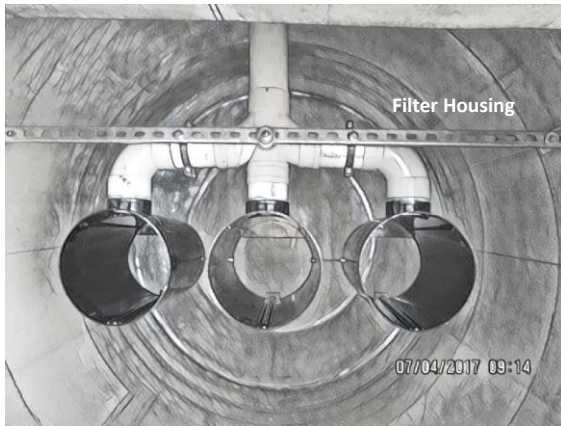
The Allied Lint Filter should be maintained in accordance with a strict and regular maintenance schedule. This schedule will ensure a trouble free operation of system and continued compliance with discharge requirements. The system must be cleaned by a licensed liquid waste contractor. We recommend that clients carry a spare cartridge on site so that while one is being cleaned another can be put in place immediately.

CLEANING PROCEDURES

The cleaning procedure for the Allied Lint Filter should be carried out as follows:

1. Place vacuum hose into the unit outside of the Biofilter casing and begin evacuating the liquid.
2. Remove the Biofilter from its case and lay sideways on case for support. Wash filter with hose until all heavy solids are washed back into tank. Replace filter in its case.
3. Continue to evacuate the liquid taking care to remove all floating material.
4. Hose down the inside of the vessel while the vacuum line is still connected and ensure that vessel is clean and any silt / rubbish that has accumulated on the vessel walls and any sludge off the bottom is removed.
5. Replace lid, ensuring that mating surfaces are clean and free from any dirt or grit that will affect sealing.

Lint Filter Housing



Triple Filter Housing System Shown



Lint filter cartridge (with handle) to insert into Housing

MAINTENANCE FREQUENCY

The maintenance frequency will depend on the amount of use and the quality of housekeeping, however the first filter clean out should be 8 weeks after use.

The filter should be cleaned when the build-up on the plates reaches 50mm above the bottom of the outlet pipe. The pump out frequency may be extended if the build-up does not reach this height in the nominal 8 weeks.

Model	Chamber Size	No of Filters	Max Peak Flow	Max Daily Flow	Materials of Construction
APLF-FD1600/2200-1L	1.0m ϕ x 1.6m-2.2m (D)	1	28L/min	13,000L	Fibreglass
APLF-FS1500/3000-1L	1.2m ϕ x 1.5m-3.0m (D)	1	28L/min	13,000L	Fibreglass
APLF-FD1500/3000-2L	1.2m ϕ x 1.5m-3.0m (D)	2	56L/min	26,000L	Fibreglass
APLF-FM2000/6000-2L	1.8m ϕ x 2.0m-6.0m (D)	2	56L/min	26,000L	Fibreglass
APLF-FD2000/6000-3L	1.8m ϕ x 2.0m-6.0m (D)	3	84L/min	39,000L	Fibreglass
APLF-FI2000/6000-3L	2.2m ϕ x 2.0m-6.0m (D)	3	84L/min	39,000L	Fibreglass
APLF-FI2000/6000-4L	2.2m ϕ x 2.0m-6.0m (D)	4	112L/min	52,000L	Fibreglass
APLF-FG2000/6000-4L	3.0m ϕ x 2.0m-6.0m (D)	4	112L/min	52,000L	Fibreglass
APLF-FM2000/10000-2L	1.8m ϕ x 2.0m-10.0m (D)	2	56L/min	26,000L	Concrete
APLF-FM2000/10000-3L	1.8m ϕ x 2.0m-10.0m (D)	3	84L/min	39,000L	Concrete
APLF-FI2000/10000-4L	2.2m ϕ x 2.0m-10.0m (D)	4	112L/min	52,000L	Concrete
APLF-FG2000/10000-4L	3.2m ϕ x 2.0m-10.0m (D)	4	112L/min	52,000L	Concrete

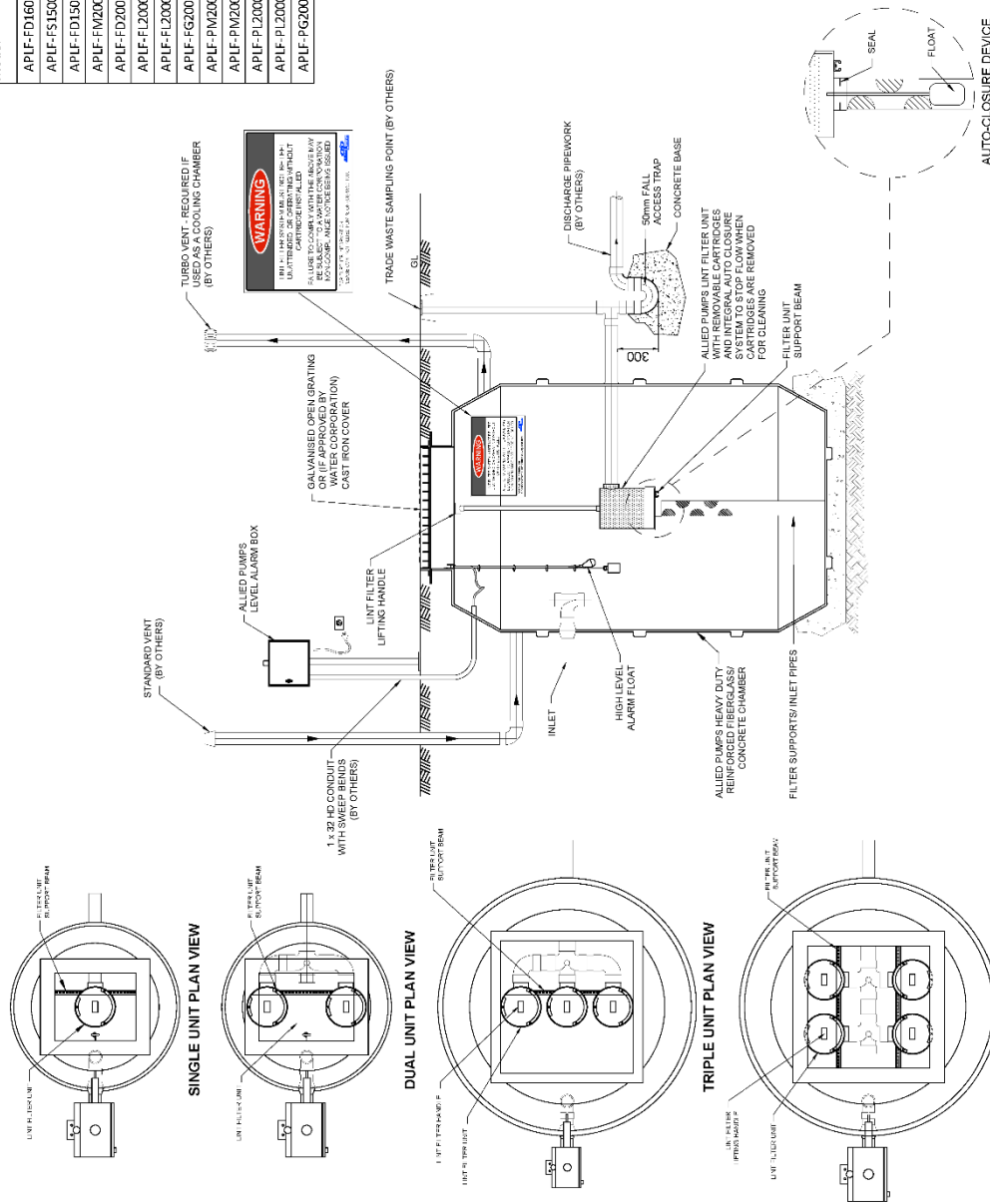
A	mm	STATION ϕ	mm
B	mm	INLET PIPE SIZE	mm
C	mm	OUTLET PIPE SIZE	mm
LID SIZE	x	PIPE TYPE	HDPE / PVC
LID TYPE		LEVEL ALARM	YES / NO
LID CLASS			

NOTES:

- CHAMBER REQUIRES VENTING.
- CONCRETE BALLAST REQUIRED FOR HIGH WATER TABLE AREAS.
- 240VAC, 10A POWER SUPPLY TO ALARM BOX.
- ALL ASSOCIATED PLUMBING WORK IS TO COMPLY WITH WATER SERVICES LICENSING AND LATEST VERSION OF AS/NZS 3500.1 AND AS/NZS 3500.2.

COOLING CHAMBER NOTES:

- THE FOLLOWING APPLIES TO PITS USED AS A COOLING CHAMBER ONLY
- CHAMBER REQUIRES VENTING, STANDARD VENT AND TURBO VENT REQUIRED IF CHAMBER IS FITTED WITH A SEALED COVER (WATER CORP APPROVAL REQUIRED FOR USE OF SEALED COVER)
 - THE TEMPERATURE FOR PRE-TREATED WASTEWATER MUST NOT EXCEED 38°C AT THE POINT OF DISCHARGE INTO THE TRADE WASTE SAMPLE POINT (TWS/P) IF THERE IS A RISK THAT THIS COULD OCCUR THEN A GRATED COVER MUST BE FITTED TO THE TOP OF THE COOLING CHAMBER.
 - TO ENSURE GOOD VENTILATION CROSS-FLOW THE PENETRATION OF STANDARD VENT LINE INTO PIT MUST BE ON THE OPPOSITE SIDE OF THE CHAMBER TO THE TURBO VENT.
 - FINISHED FLOOR MUST BE GRADED AWAY (SEALED AREAS) FROM THE ACCESS COVER IF SYSTEM IS LOCATED IN UN-SEALED AREA THEN THESE ACCESS COVERS MUST BE RAISED ABOVE THE SURROUNDING GROUND LEVEL TO PREVENT INGRESS OF PONDED LIQUIDS AND DEBRIS.



<p>Specialists in Package Pumping Solutions</p> <p>2 Meadi Court (Cor. Bala Rd) Canning Vale, WA 6155 +61 (08) 9350 1000 www.alliedpumps.com.au</p>		<p>PROJECT: PACKAGED LINT FILTER COOLING SYSTEM</p> <p>TYPICAL LINT FILTER UNIT</p> <p>GENERAL ARRANGEMENT</p>
<p>SCALE: A1</p> <p>SCALE: 1:Scale</p>	<p>INTERNAL CONTROL: KG500000</p> <p>PROJECT No: 0</p>	<p>DATE: 18 JUN 2021</p> <p>PROJECT: 18 JUN 2021</p>
<p>REV: A</p> <p>DESCRIPTION: ISSUED FOR REVISION 20 JUN 2021</p>	<p>BY: [Signature]</p> <p>DATE: 18 JUN 2021</p>	<p>DATE: 18 JUN 2021</p>

A

APENDIX A **Warranty and Service Information**

WARRANTY

Warranty is limited to replacement or repair, at Manufacturer's discretion, of any parts or equipment without removal and reinstallation cost for a period of twelve months from date of invoice, provided such part of equipment that is deemed by the respective manufacturer to be faulty. Any work done on site to inspect or remedy faults that are subsequently not accepted as being under warranty by the manufacturer, or are caused by misuse, fair wear or operating procedures, will be charged at parts and labour and travelling time rates applicable at the time.

If buyer requires our services in respect of site inspection or service outside of what is covered by Manufacturers' warranties, then Buyer should enter into a separate agreement with ALLIED PUMPS in respect to the same. In the event of no such separate agreement, all operation, calibrating, cleaning and maintenance of plant is the responsibility of the buyer.

ALLIED PUMPS have not acted as a consultant nor charged design fees on this project, and are in no way responsible for, nor guarantee any particular level or performance of the treatment plant supplied or effluent quality unless such guarantee is specially given in writing.

Under no circumstances is ALLIED PUMPS liable for any direct or consequential loss or damage to persons or properties of any nature due to any cause whatsoever.

Application of warranties is conditional on ALLIED PUMPS having received in cash the total contact price. Furthermore, ALLIED PUMPS reserves the right to withdraw any code compliance, Australian Standard compliance or selection compliance, should the contract not be paid in full.

