

GWUC, RAIN WATER HARVESTING SYSTEM

MANSE TANK SYSTEM

MT1 Manse Tank

Team Poly, 8,000 litre tank.

Diam 2,350mm, Overall height 1,920, wall height 2,220, inlet height 2,200

2 x 50mm outlets,

1 x 500mm inlet strainer, with manhole cover,

1 x centre pole with cone,

1 x 90mm outlet,

1 x Pacific, float level gauge.

For TEAM POLY Brochure see Part 3-1 Page 2.



Fig 3.25 - Manse Tank

GWUC, RAIN WATER HARVESTING SYSTEM

MT1 Purchase Receipt



Azalea Engineering Pty Ltd
 489 Warrigal Rd
 Moorabbin, VIC 3189
 Ph: 03 9559 3900
 Fax: 03 9559 3999
 ABN: 71 091 206 441
 Email: sales@kingstonwatertanks.com.au

Trading As :

Work Order / Tax Invoice

Work Order / Invoice #: 9127
 Account #: 95609798
 Entered By: Steve
 Page: 1 of 1
 Date: 11/12/2008

Kingston Water Tanks

Bill To: Lyn McDonald GLEN WAVERLEY UNITING CHURCH 30 Panoramic Grove GLEN WAVERLEY, VIC 3150 03 9560 9798	Ship To: Pls del Team Poly Tank Thursday morn at 8am GLEN WAVERLEY UNITING CHURCH KINGSWAY (Just before Bogong Ave) GLEN WAVERLEY, VIC 3150
---	--

Reference #	Comment:	Shipping Carrier	Tracking Number:
		To Be Delivered	cust will post cheque for depo

Shipping Notes:

Del 8000lt Sat 13/12 \$50

Item Code	Description	Ordered	Issued	RTD	Price	GST	Extended
TPR22000TallBei	Team P 22000L Tall Beige In stock 8/12	1	0	1	\$2,790.00	Y	\$0.00
Extrafitt	Extra Fitting	1	0	1	\$0.00	Y	\$0.00
PGWatGa	Pacific Gauge Water Gauge	3	0	3	\$34.00	Y	\$0.00
PGFlaPl	Pacific Gauge Flange Plate	3	0	3	\$0.00	Y	\$0.00
TPR8000CorRnBei	Team P 8000L Corr Rd Beige SPOKE TO CUSTOMER CALLING FRIDAY TO ORGANISE PAYMENT AND DEL EMMA 8/12	1	0	0	\$1,590.00	Y	\$0.00



Due to limited storage facilities all tanks purchased from stock must be PICKED UP or DELIVERED within 10 days of purchase. All tanks on order must be PICKED UP or DELIVERED within 14 days of the tank(s) arriving into stock. Failure to do so will result in your tank(s) being offered to another customer. A 20% non - refundable deposit is required.

Methods of Payment: VISA, MASTERCARD, EFTPOS, DIRECT DEPOSIT, CASH
 Full payment must be made prior to delivery/pick up of goods. Please allow 48 hours for processing direct deposit payment before booking your delivery/pick up.
 Direct Deposit details: Bank: ANZ Banking Group
 BSB: 013 267 Acc No: 492746617. Please provide invoice number with payment details and e-mail (kristy@kingstonwatertanks.com.au) or fax it to us.

Order Sub Total:	\$4,074.54
Order GST Total:	\$407.46
Order Deposit Total:	\$1,680.00
Order Shipping Total:	\$90.00
Order Total (Inc.GST):	\$4,572.00
Issued Sub Total:	\$0.00
Issued GST Total:	\$0.00
Deposit Made:	\$1,590.00
Previous Deposit:	\$90.00
Issued Total (Inc.GST):	\$0.00
Balance Due:	\$0.00
Payment Method:	EFTPOS

MT2 Tank Level Gauge

- "Pacific" Float level Gauge, with float on "string", 100mm dial, (as for West Tank - see WT2 Part 3_1, Page 3)
- 45mm Screwed fitting with poly nut inside tank.
- Purchase receipt as for MT1, above.

GWUC, RAIN WATER HARVESTING SYSTEM

MT3 Manse Pump

AL-KO pressure pump system HW 802 comprising:

- AL_KO 802 pump,
- Pressure switch,
- AL-KO accumulator, and
- interconnection piping.

AL_KO User Manual

Introduction

Please read the operating instructions carefully before you use the garden pump to prevent accidents and ensure the trouble-free operation of the pump.

Make sure you keep the instructions at hand for quick reference. If you resell your pump or give it to another user, please include these instructions in the sale or the gift.

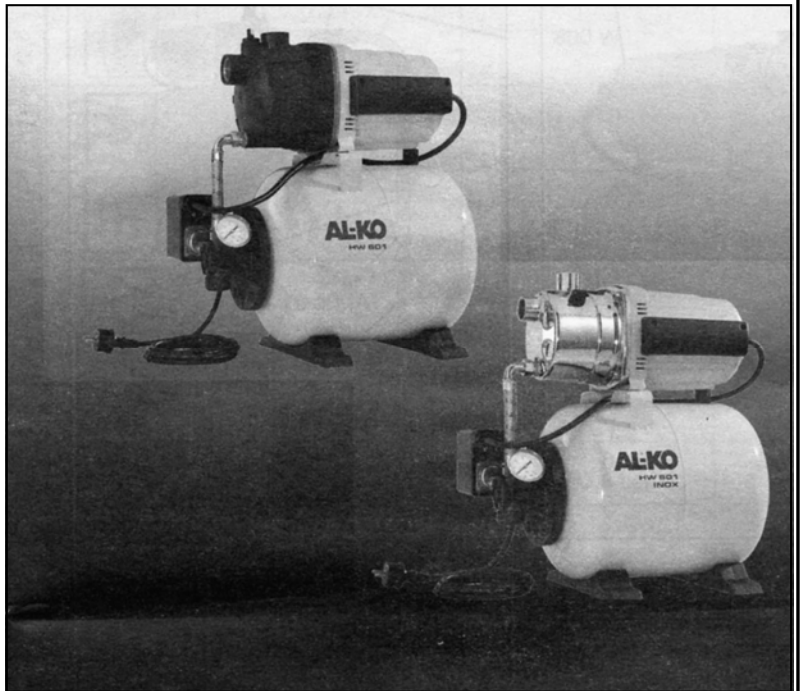
The following symbols are used in the instructions:

! DANGER

This symbol draws your attention to work processes or operating procedures that have to be carefully observed in order to prevent serious injury to the user or another person.

C CAUTION

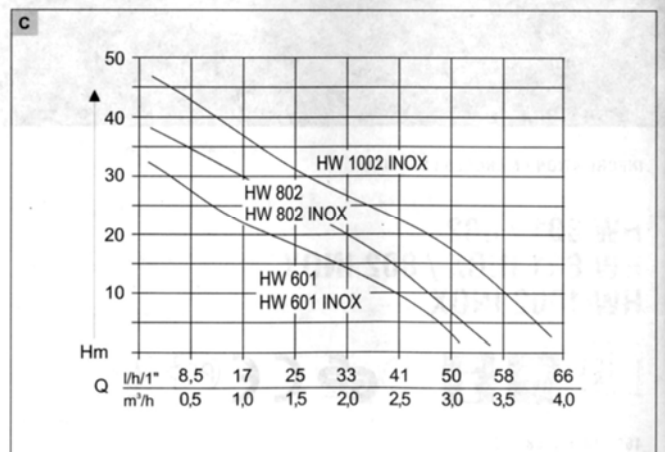
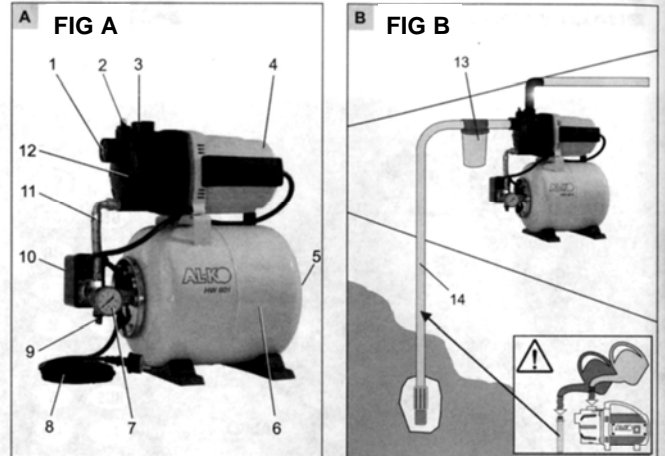
This symbol draws your attention to information you need to ensure that your system is not damaged due to improper or careless use.



AL-KO

AL-KO

i	HW 601	HW 601 INOX	HW 802	HW 802 INOX	HW 1002 INOX
	Art. Nr. 112 372	Art. Nr. 112 371	Art. Nr. 112 449	Art. Nr. 112 459	Art. Nr. 112 458
	600 W		800 W		1000 W
	230 V AC, 50 Hz		230 V AC, 50 Hz		230 V AC, 50 Hz
	X4		X4		X4
	76 dB (A)		77 dB (A)		86 dB (A)
	9 m		9 m		9 m
	35 m/3,5 bar		38 m/3,8 bar		48 m/4,8 bar
	3100 l/h		3400 l/h		3800 l/h
	35 °C		35 °C		35 °C
	1,5/2,8 bar		2,0/3,0 bar		2,0/3,5 bar
	1		1		1
	1"		1"		1"
	20 l		20 l		20 l
	11,3 kg netto	11,2 kg netto	11,3 kg netto	11,2 kg netto	16,0 kg netto



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I PLEASE NOTE

The information symbol draws your attention to essential technical requirements.

For your safety

- ! The garden pump may only be connected to an electrical device which is compliant with DIN/VDE 0100, Parts 737, 738 and 702 (swimming pools). Make sure that fuse protection in the form of a 10 A automatic cut-out and a fault current guard circuit with a nominal fault current of 10/30 mA is installed.
- ! The supply voltage and current specified on the type plate must be identical with the voltage and current of your electrical system.
- ! If you need to connect your domestic water system to an extension cord, make sure that the cable is 3 x 1.5 mm², that it corresponds to type H07RN-F and is compliant with DIN 57282/57245. The connector must be splash-proof. Cable drums must be completely unwound.
- ! Please make sure that the system is not operated by anyone who has not read or does not fully understand the operating instructions or is under the age of 16. The domestic water system may not be used for any other than its designated use. Before putting the system into operation, make sure that the pump, reservoir, the electric cable and the plug are not worn or damaged.
- ! Do not operate the system if it is damaged. Necessary repairs must be carried out in a qualified AL-KO service centre. Never use the electric cable to lift, carry or attach the system to another object. Do not pull on the cable when unplugging the system.
- ! Make sure that the system is unplugged before beginning any maintenance, repair or cleaning work. In the event of a malfunction, immediately unplug the system. Make sure that the plug does not get wet.
- ! Do not attempt to make any changes or modifications to the device by yourself. You may endanger your life or invalidate the warranty.

Risk of injury due to hot water

The water in the pump can heat up significantly, during longer periods of operation (>10 min) against closed outlet side.

This hazard can occur due to:

- side under compression closed
- lack of water in the suction pipe
- improper installation
- faulty pressure switch

In this case:

- isolate the pump from the mains
- allow the pump and water to cool down
- check water level on inlet side
- check pipes for water-tightness
- check installation
- check pressure switch
- only restart pump after rectifying the cause of the fault

Use

Designated use

The domestic water system is designed for home use in your house or garden. Please observe the technical data given in the instructions before putting the system into operation. Your domestic water system has been designed for use in the following applications:

- irrigation and watering, e.g. of your lawn or flower and vegetable gardens,
- domestic water supply
- increasing pressure in the domestic water supply.

Please observe the regulations issued by your local water works. If necessary, ask a plumber.

The system is designed to pump only the following liquids:

- clear water
- rain water

Prohibited use

Your domestic water system is not intended for permanent operation. The system may not be used to pump the following liquids:

- Saltwater,
- beverages or liquid foods
- corrosives or chemicals

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- acids or combustible, explosive or gas-forming liquids
- liquids with a temperature above 35°C
- sandy water or water containing abrasives.

Description of the system

Domestic water system/accessories (Figs. A, B see page 40)

- 1 Pump inlet/suction hose connector
- 2 Filler screw
- 3 Pump outlet/pressure hose connector
- 4 Motor housing
- 5 Valve
- 6 Reservoir
- 7 Pressure gauge
- 8 Electric cable
- 9 Draining screw
- 10 Pressure switch
- 11 Compensating hose
- 12 Pump chamber
- 13 Filter (accessories)
- 14 AL-KO suction kit (accessories)

Scope of supply

Your domestic water system comes equipped with a pressure switch, a pressure gauge and an electric cable with an earthing-contact type plug.

Function

The domestic water system works automatically. The pump automatically switches on or off depending on the pressure set (see technical data). The system sucks the liquid to be pumped through the suction hose (1) and lets it out into the reservoir (6). Upon reaching the set cut-out pressure (reservoir is full), the system automatically switches off. As soon as the pressure falls to below 2,0 bar (water is drained from the reservoir), the system automatically switches back on and continues pumping the liquid until either the reservoir is full or any draining process running has been completed and the reservoir is full.

Thermal protection

Your domestic water system is equipped with a thermal protection switch, which switches the pump off if it overheats. The pump will remain off until it has cooled down. After about 15 - 20 minutes, the pump will automatically switch on.

Setting up and operating the system

- ! Before putting your domestic water system into operation, check the inlet pressure at the diaphragm which can be read out from the valve (5) on the reservoir. Make sure that the pressure is approx. 1.5 bar and correct if required (see Checking the Inlet Pressure).
- Place the device onto a hard, flat surface so that it cannot tip over and so that it will not be near the flow of water.
- Make sure that the device is protected from rain and any direct exposure to water.
- C When attaching the suction and pressure hoses, make sure that they do not exert a tension on the device. We recommend the use of flexible hoses at the pump inlet (1) and outlet (3). If you have any questions, ask your retailer.
- C When operating the system (automatic operation), take appropriate measures to ensure that damage due to flooding can-not occur if the system should malfunction.

Attaching the Suction Hose

- C Choose a hose which is long enough so that the device will not suck in air and run dry. The hose should be at least 30cm under the surface of the liquid to be pumped while the pump is in operation. Mount a non-return valve in the suction hose to prevent the liquid from running back out of the pump.
- Attach the suction hose. Make sure to screw it in tightly, but take care not to damage the threads.
- I If the liquid to be pumped is deeper than 4 $\frac{1}{2}$ m, you should use a suction hose which is larger than 1" in diameter for the best performance. We recommend our AL-KO suction set (14), which consists of a suction hose, strainer and non-return valve. The suction set is available at your local retailer's.
- C Before pumping sandy water, you must insert a filter (13) between the suction hose and the pump inlet or you will damage your domestic water system. The filter is available at your local retailer's.
- • When laying the suction hose, make sure that it is lower than the system.
- I If the suction hose is laid so that it is higher than the device, bubbles will become trapped in the line and the pump will suck air.

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Attaching the pressure hose

- Attach the pressure hose. Make sure to screw it in tightly, but take care not to damage the threads.

Filling the pump

- C Before putting your domestic water system into operation, you must fill the pump chamber with water until it overflows to achieve full suction power. Do not operate the pump while it is dry because this will cause serious damage to the pump.
- Remove the filler screw (2).
 - Pour water into the opening until the chamber of the pump (12) is full.
 - Replace the filler screw (2) and tighten it.

Switching on the system

- Open the pressure line (open valve, sprayer, tap, etc.). Plug the electric cable into the socket. The pump will automatically begin to run.
- As soon as the flow of water is cleared of air bubbles trapped in the line, close the pressure line. When the pressure has fallen and the reservoir is full, the pump will automatically switch off. Your domestic water system is now ready for operation.

Switching off the system

- Switch the system off by unplugging the electric cable from the socket.

Maintenance and Cleaning

- C Before beginning any maintenance or cleaning work, make sure that the device has been unplugged and take precautions to ensure that it cannot be switched on during work!

Cleaning the system

If you have used your domestic water system to pump chlorine water (swimming pool water) or liquids which leave a residue, flush your pump out with clear water after use.

Clearing blockages

If your domestic water system should become blocked so that it does not suction or pump out liquid, remove the obstruction as follows:

- Remove the suction hose from the pump inlet (1).
- Attach the pressure hose to the water tap and spray water into the pump chamber until the blockage is flushed out.
- Check to see that the obstruction has been cleared entirely by switching on the pump for a short time. Do not let the pump suck air.
- If the pump runs trouble-free, put it into operation as described in the instructions.

Frost protection

Your domestic water system is susceptible to low temperatures. Make sure to empty the device of residual liquid (hoses, pump and reservoir) and store it so that it is protected from frost.

- Empty the suction and pressure hoses.
- Remove the draining screw (9) and drain all water from the pump chamber. The water contained in the reservoir will be pressed out by the air bellows.
- Replace the draining screw and store the device so that it is protected from frost.

Setting the pressure switch

The cut-in and cut-out pressures at which the system starts and stops operating have been set in the factory (see technical data). However, if desired, you can adjust the setting as desired at the pressure switch (10), also see Figure C.

- Unplug the electric cable from the socket.
- Remove the protective cover from the pressure switch.
- Use a screwdriver to set the desired pressure:

A= Cut-in pressure

B= Cut-out pressure

Increase pressure = +

Decrease pressure = -

- Close the pressure switch by replacing the cover.
- Put the system into operation and check the changed pressures.

I Please observe the max. permissible pumping height and pressure; see technical data.

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Checking the inlet pressure

- Unplug the electric cable from the socket.
- Open the pressure line and drain the water off until the pump is completely empty.
- Check the inlet pressure at the diaphragm (5). The pressure should be approx 1.5 bar. Correct the pressure if needed.
- Put the domestic water system into operation as set out in the instructions.

Disposal



Do not dispose of worn-out units through the household garbage!

The appliance, its packaging and accessories are all produced from recyclable materials and must be disposed of accordingly

Malfunctions

C Before you attempt to remedy any malfunction of your domestic water system, pull the plug **f1** to prevent injury or death due to electrocution!

What is wrong?	What is the possible reason?	What to do:
Motor does not run.	Impeller is blocked. Thermal switch has switched off. No power.	Clean the pump. Wait until the thermal switch has automatically switched the pump on again. Check the temperature of the liquid. Have the pump checked. Have a qualified electrician check the power supply
System runs but does not pump liquid out.	Suction hose is not immersed in the liquid to be pumped Suction hose is blocked. Pressure line is blocked. Suction height is too great. Air is trapped in the suction hose. Pump is dry.	Make sure that the suction hose is at least 30cm beneath the surface. DANGER! Risk of injury due to hot water! Clear blockages in suction hose. DANGER! Risk of injury due to hot water! Clear blockages in pressure line. Lower suction height. Check for leaks in the suction hose. Fill the pump with water.
System is only pumping out liquid very slowly or weakly	Suction hose is blocked. Suction height is too great. Pressure hose diameter is too small. Pumping height is too great.	Clear the blockage. Lower suction height. Attach a pressure hose with larger diameter. Lower pumping height.
Pump does not run reliably.	Air pressure in reservoir is too low.	Check the air pressure in the reservoir at the valve (5) and correct to about 1.5bar if necessary.
Pump fails to switch off automatically	Water shortage in let side. Pump sucks in air	Unplug the pump, allow to cool down if necessary.

GWUC, RAIN WATER HARVESTING SYSTEM

MT3 Pump Purchase Receipt

Evergreen Water Tanks

A.B.N. 91 275 424 177

Factory 10 / 7 Vesper Dr
Narre Warren Vic 3805

Phone: 9704 0011
Mbl: 0400 380 021
Fax: 03 5941 9951

Tax Invoice

Invoice #: **00003361**
Date: 5/03/2009

'Cash Sale

Invoice Details:
'Cash Sale
Glen Waverley Uniting Church

Description	Amount
2 x Alko HW802	\$560.00
3 x inline filter	\$150.00
2 x non return	\$30.00
Thank you! <div style="float: right; text-align: right;"> GST: \$67.27 Total Inc GST: \$740.00 Amount Applied: \$740.00 Balance Due: \$0.00 </div>	

Direct Deposit: Bank ANZ 013-757, Account 4966 02936 Ref Invoice number

MT4 Manse Pump Inlet Filter

Similar details as for West Pump Inlet Filter, see Part 3_1 Page 18.

MT5 Manse Pump Cover

The Pump cover is a beige coloured, polycarbonate, lift-off cover.

A locking system added on site, comprises a hinged bar and tab on the cover allows the cover to be padlocked in place.

MT5 Purchase Receipt

RMv10.0
13/03/2009

Tax Invoice

G Store Pty Ltd

A.B.N.:45 785 489 848
1095 Dandenong Rd
Malvern East VIC 3145
Ph: 03-9571-0552 Fax: 03-9571-0558

Served By Tim

Docket No.	Date	Time
5297	13/03/2009	14:03

Sold To (1)
Customer Cash

Description	Ext.
* Pump cover waterstore 79.00 x 1	\$79.00
<hr/>	
Subtotal	\$79.00
Tax	\$7.18
Total inc. GST	\$79.00
No. of Items (1)	
* Indicates taxable item	

Payment Details:

Visa	\$79.00
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Fig 3.26 - Manse Pump Cover

GWUC, RAIN WATER HARVESTING SYSTEM

MT6 Float Valve

25mm float valve with float is attached to the Manse Tank at about two-thirds of the tank height, with the incoming pipe line from the West Tank.



Fig 3.27 - Manse Tank float Valve

MT6 Purchase Receipt

VICTORIAN IRRIGATION SUPPLIES

Factory 11, 170 Forster Road, Mount Waverley, Victoria, 3149, Australia
 Telephone: (03) 9543 3711 Fax: (03) 9543 5668 ABN: 15 452 089 971
 www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81311

Date: 30/01/09

MT7 Rubber Couplings (Rubber Sleeve Joiner)

90mm couplings used on the Wet Leg piping underneath the downpipe filters on the Hall Extension east and west walls, and at the inlet to the Manse Tank.

Invoice to:

Glen Waverley Uniting Church
 cnr Bogong Ave & Kingsway
 GLEN WAVERLEY 3150

Deliver to:

Lyn McDonald
 9560 9798

For Purchase receipt see
 Part 3_1, Page 39

Account Number	Customer Reference	VIS Order No.							
2000	Glen Wav UC	15141							
Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Tax Nett	Tax Amount	Total Amount
TPPSW090	PIPING, PVC 90mm Stormwater	10	0	10	19.09	0	190.90	19.09	209.99
TPPE25/12X	PIPE, MDPE 25mm PN12.5 x 50m	1	0	1	64.00	0	64.00	6.40	70.40
TTPE25	TEE, POLY 25mm	1	0	1	8.50	0	8.50	0.85	9.35
TECPSW090	END CAP PVC Stormwater 90mm Push on	4	0	4	1.90	0	7.60	0.76	8.36
TEPSW090X4	ELBOW PVC Stormwater 90mm x 45 Deg.	4	0	4	1.55	0	6.20	0.62	6.82
TEPSW090X9	ELBOW PVC Stormwater 90mm x 90 Deg.	12	0	12	1.60	0	19.20	1.92	21.12
TTPSW090X4	TEE PVC Stormwater 90mm x 45 Deg.	1	0	1	3.70	0	3.70	0.37	4.07
TTPSW090X9	TEE PVC Stormwater 90mm x 90 Deg.	3	0	3	2.40	0	7.20	0.72	7.92
TCPS90	90mm STORMWATER COUPLING	1	0	1	1.48	0	1.48	0.15	1.63
TEPE25	ELBOW, POLY 25mm	2	0	2	6.39	0	12.78	1.28	14.06
FFF	FREIGHT & HANDLING	1	0	1	8.18	0	8.18	0.82	9.00
TO FOLLOW									
	APEX 25mm FLOAT VALVE WITH 6" FLOAT	1	0	1	30.00	0	30.00	3.00	33.00

PAID

Please note new banking details:

Banking Details - BSB: 013-701 Account Number: 478918013
 Please notify us if using direct credit option: accounts@vicirrigation.com.au
 Credit card payments will attract a surcharge of 2.5% for any amount over \$3000

Terms: PAYABLE ON INVOICE

Subtotal	359.74
Total GST	35.98
Total	395.72

GWUC, RAIN WATER HARVESTING SYSTEM

FERNERY TANK SYSTEM

FT1 West Tank

Bushmans, 15,064 litre tank.

Diam 3050mm, Overall height 2,440, wall height 2,220, inlet height 2,200

2 x 50mm outlets,

1 x 500mm inlet strainer, with manhole cover,

1 x centre pole with cone,

1 x 90mm outlet,

1 x Pacific, float level gauge.



Fig 3.28 - Fernery Tank

GWUC, RAIN WATER HARVESTING SYSTEM

FT1 Fernery Tank, Purchase Receipt

BUSHMANS GROUP PTY. LTD. Tax Invoice

P.O. BOX 98, COBDEN ROAD
 TERANG VIC 3264
 PH 03-5557 8002 FAX 03-55922118
 ABN: 90090744022

Invoice Number 39909
 Date 23/04/09

Invoice to:
 GLENWAVERLY UNITING CHURCH
 C/ 30 PANORAMIC GROVE
 GLEN WAVERLY 3150

Deliver to:
 CRN BOGONG AVE & KINGSWAY
 GLEN WAVERLY

Customer Code	Customer Reference	Customer A.B.N.	Our Order No.
GLENW	OFFICE		46136

Locatior	Item Code	Item Description	Invoice Quantity	Per	Price	Disc	GST	Amount
V01	T15064BGE	15064 L (T3300) WATER TANK BEIGE	1	15064	1964.54	0.00	196.45	2,160.99
V04	OUT1/3/4	1 to 3/4 INCH OUT LET SFOMF25L	1		0.00	0.00	0.00	0.00
V04	GV1	1 INCH GATE VALVE	1		0.00	0.00	0.00	0.00
V04	OFK	OVERFLOW KIT	1		0.00	0.00	0.00	0.00
V04	FLEXHOSE1	25 ML FLEX HOSE KIT	1		0.00	0.00	0.00	0.00
V04	STRCVLGE	STRAINER COVER LARGE	1		13.63	0.00	1.36	14.99
V04	GV1	1 INCH GATE VALVE	1		22.72	0.00	2.27	24.99
V04	OUT1/3/4	1 to 3/4 INCH OUT LET SFOMF25L	1		17.27	0.00	1.73	19.00

MORNING DELIVERY: BETWEEN 9AM - 10 AM
 0407 040 939
 CARPARK OFF KINGSWAY.
 PAID IN FULL
 03 9560 9798

MAP ATTACHED

BUSHMANS

ABN: 90 090 744 022

PAID IN FULL

Signed:

Name: *Cedric Y*

Date: *23/4/09*

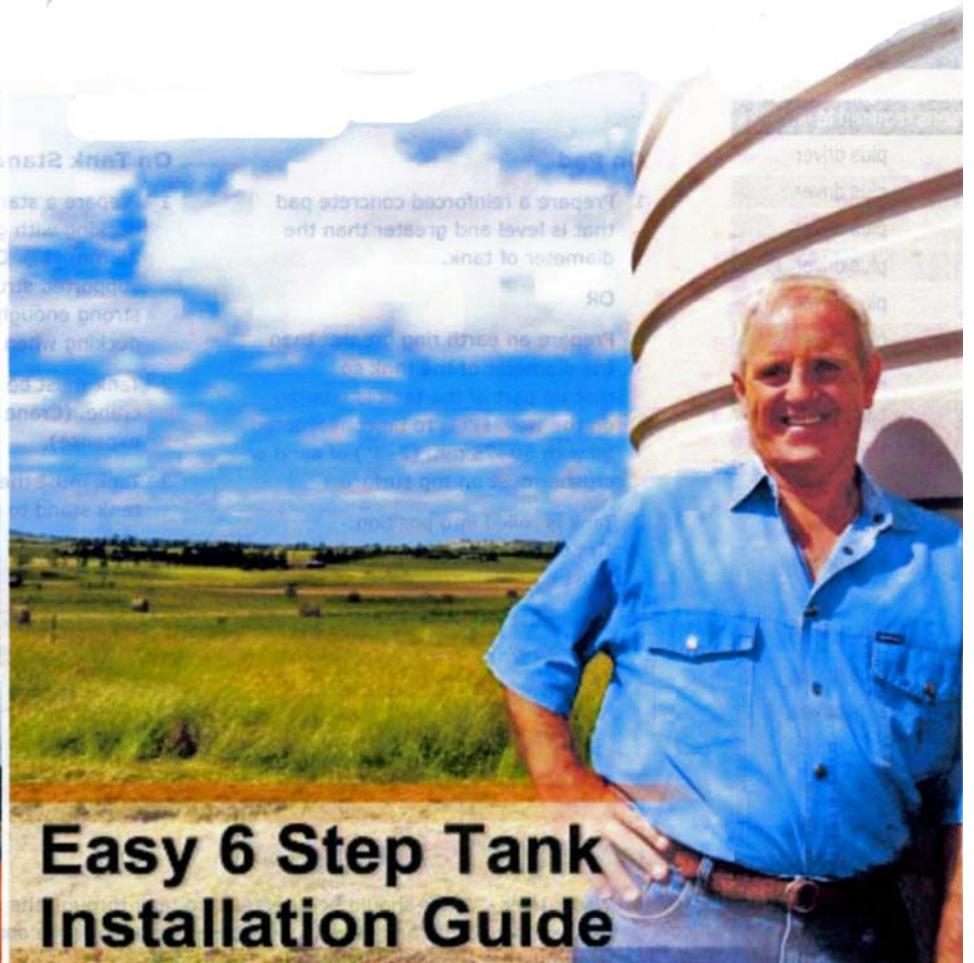
Terms: C.O.D.	Total Includes GST of 201.81	Total 2,219.95
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GWUC, RAIN WATER HARVESTING SYSTEM

Bushmans Installation Guide



BUSHMANS



Easy 6 Step Tank Installation Guide

Congratulations on your choice of a BUSHMANS tank.

In the world's driest continent every drop of water is precious and every Australian needs to do their bit to save Australia's water. Your purchase of a BUSHMANS tank demonstrates your commitment to water conservation.

BUSHMANS have designed and manufactured your tank to give you long, trouble-free service. In the unlikely event that a manufacturing fault emerges, it will be fixed or replaced at no cost to you. (See our written guarantee on the back page.)

The important information in this Installation Guide will help you prepare for the arrival of your

BUSHMANS tank. There are two types of delivery depending on your readiness.

If your site is fully prepared then you can have your tank placed onto your prepared site. This is called an *ON-SITE DELIVERY* and it includes *TANK PLUMBING* by our driver. If you are not ready to install your tank and require drop off only, you should be ready for a *ROLL-OFF DELIVERY*. (See check lists over.)

Remember, your tank must be installed correctly to ensure long life - and so you do not void your guarantee.

If you have any concerns, please call BUSHMANS on **1800 00 88 88**

w w w . b u s h m a n t a n k s . c o m

Easy 6 Step Tank Installation Guide

ON-SITE DELIVERY

Check that you are prepared for our driver to position tank, drill outlets and fit taps and seals. (TANK PLUMBING)

- There MUST BE suitable and safe access as per Preparing for Delivery in this document.
- Site MUST BE prepared as per instructions.
- There MUST BE enough people present to assist with tank positioning, see table opposite.
- I am organised to instruct driver about outlet positions. (See diagram below)
- Water is immediately available to put 25 mm in tank to prevent blow-away.

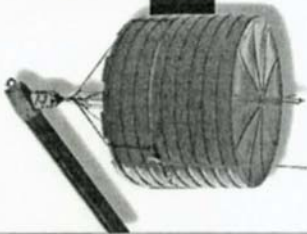
ROLL-OFF DELIVERY

Check that

- There MUST BE suitable and safe access as per Preparing for Delivery in this document.
- There MUST BE enough people present to assist with tank positioning, see table opposite.
- Water is immediately available to put 25 mm in tank to prevent blow-away.
- I note instructions for TANK PLUMBING for ROLL-OFF Delivery on page opposite.

OUTLET POSITION

Centre of outlet should be at a height of 115mm to ensure proper sealing.



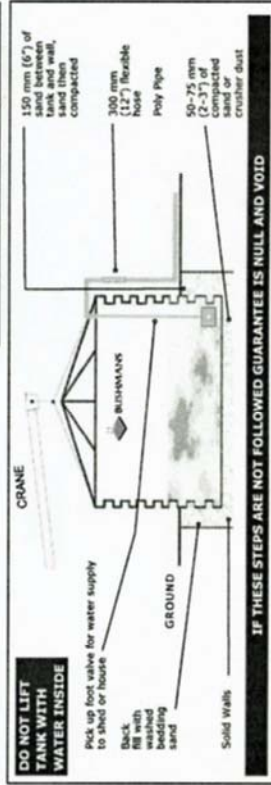
IN GROUND SITING

Correct method

- 1** Before commencing, check for underground pipes and ensure excavation work does not infringe on the weight bearing capacity of adjacent structures.
Excavate the hole in depth to allow for 50-75 mm of bedding material and a maximum depth of 1/3 of the tank wall height. Excavate the hole in diameter to allow for a 150-200 mm gap between the tank wall and the surrounding soil.
The site is not suitable if there is water seepage or if the floor of the hole is unstable. Spread washed river sand into the hole and compact it with a plate compactor, to provide a firm level base. Check that no rocks, roots or sharp objects penetrate the sand base.
- 2** Tank must be lowered into the hole squarely by crane. (Crane hire at purchaser's expense.)
- 3** Prior to starting to backfill, the tank must be filled with water to a level marginally above ground height. The soil taken from the hole must not be used as the backfill under any circumstances.
Spread a 200 - 300 mm layer of sand around the base of the tank. Manually compact the sand ensuring that all the voids are filled. Continue adding the sand in 200 - 300 mm layers, ensuring each time that it is well compacted into all areas until it comes to within 150 mm of the surface. Restore the remaining 150 mm with fresh soil.
CONTINUE ON RIGHT UNDER ABOVE GROUND SITTING STEP 4.

Tank model	Persons required to fill tank
T110	1 plus driver
T160	1 plus driver
T170	1 plus driver
T230	1 plus driver
T260	1 plus driver
T350	1 plus driver
T440	3 plus driver
T500	3 plus driver
T1560	1 plus driver
T5540	1 plus driver
T660	3 plus driver
T1650	1 plus driver
TS910	1 plus driver
T11100	1 plus driver
TS2200	2 plus driver
TT2300	2 plus driver
T3300	2 plus driver
TT5070	3 plus driver
TS5000	3 plus driver
TT5300	3 plus driver
TS5500	3 plus driver
T6500	4 plus driver
T8000	5 plus driver
T8400	5 plus driver
T10500	6 plus driver

TANK CANNOT BE UNLOADED WITHOUT REQUIRED ASSISTANCE.

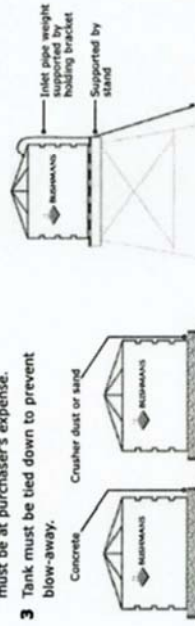


IF THESE STEPS ARE NOT FOLLOWED GUARANTEE IS NULL AND VOID

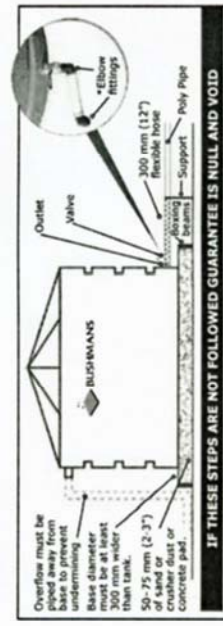
ABOVE GROUND SITING

Correct method

- On Pad**
- 1** Prepare a reinforced concrete pad that is level and at least 300 mm wider than the diameter of tank.
OR
Prepare an earth ring at least 300 mm wider than the diameter of the tank so that no part of the tank is bearing on the wall. Fill is to be consolidated fill with 50-75 mm (2-3") of sand or crusher dust on top surface.
 - 2** Tank is rolled into position. (If positioning requires a crane this must be at purchaser's expense.)
 - 3** Tank must be tied down to prevent blow-away.
- On Tank Stand**
- 1** Prepare a stand that has hardwood decking with gaps no greater than 25 mm (1"). Decking should be supported structurally by bearers strong enough to prevent sagging of decking when tank is full.
 - 2** Tank must be lifted into place by crane. (Crane hire at purchaser's expense.)
 - 3** Tank must then be tied down to the tank stand to prevent being blown away.



- 4** Water Inlet - Water should be directed into tank through the strainer. Fixed inlets must be supported and have flexible hose fitted (similar to outlet instructions). Inlet pipe must be supported by stand.
- 5** Water Outlet - Connect your outlet with flexible hose 300 mm (12") in length. The hose must be placed between the valve and all other plumbing or rigid pipe work. Elbow fittings must be used as shown below. (Also see photo on front of this guide.)
Important: Water capacity of the inlet must equal water capacity of the overflow eg 2 x 100 mm (4") inlets = same capacity overflow.
- 6** Water Outlet - Overflow - Connect overflow. Water must be piped away from the tank. Distance to side-walls, tank headroom, or overflow piping to be 100 mm from tank.



IF THESE STEPS ARE NOT FOLLOWED GUARANTEE IS NULL AND VOID



GWUC, RAIN WATER HARVESTING SYSTEM

FT2 Tank Level Gauge

"Pacific" Float level Gauge, with float on "string", 100mm dial, 45mm?? Screwed fitting with poly nut inside tank.
Purchase receipt as for WT1. See Part 3_1, Page 3.



Fig 3.29 - Level Gauge, Fernery Tank

FT3 Fernery Pump

Pumpset supplied by Aerocycle, comprising,

- Aerocycle enclosure with removable lid,
- AL-KO Jet Pump 601,
- AL-KO Hydrocontrol pressure control system,
- Check Valve (on mains water)
- Pressure reducing valve (on mains water),
- Isolation Valve (on mains water),

For Purchase Receipt, see West Pump Part 3_1, Page 17.

An AL-KO Pre filter was fitted on site.
A locking bar was added to the enclosure so that the lid can be padlocked closed.



Fig 3.31 - Pump set with cover



Fig 3.30 - Pump set with cover removed

Jet Pump Catalogue

Refer details for Jet 601 Pump for West Pumps Part 3_1, page 10 and page 15 for the Hydrocontrol.

FT4 Fernery Pump Inlet Filter

Similar details as for West Pump Inlet Filter, see Part 3_1 Page 18.

FT5 Down Pipe Filters

The Filters are constructed of Colorbond, fabricated by AWF Sheetmetal Nunawading.

Initial design included two filter screens of stainless steel mesh, course 6.1mm square hole, 1.2mm dia wire, fine 0.81 square hole, 0.45 diam wire. However this design suffered from "surface tension of water across filter material resulting in water running down outside of filter enclosure.

The enclosure was originally modified so that both the course and fine filters were inside the top section of the enclosure and with the downpipe lower end about 30-40mm above the course filter.

Subsequently the course filter was completely removed and the fine filter supported nearly horizontal. The downpipe is sits just below the front edge of the filter enclosure to prevent splashing of the falling rain water outside the enclosure.



Fig 3.32 - Downpipe Filter, (final arrangement)

GWUC, RAIN WATER HARVESTING SYSTEM

FT4 Purchase Receipt for Filter fabrication

 *** TAX INVOICE ***

 ABN : 56 755 990 314

ORDER NO : 444873

LSS
 DATE 16/04/09
 PAGE 1

AW&F SHEETMETAL
 42-44 NORCAL ROAD
 NUNAWADING
 VIC 3131

PHONE : 03 9894 1799
 FAX : 03 9894 0299
 ACN 005 068 986

LSS

100001 CASH SALES - NUNAWADING
 LYN MCDONALD 9560 9798

PICK UP

 CUST ORDER NO. LYN MCDONALD SALES TAX NO. P S/M NO. 01 DATE WANTED 22/04/09

PROD CODE	DESCRIPTION	QTY	UM	PRICE	DISC	EXT AMT	GST AMT	TOT AMT
1SC	ST SHEETMETAL FABRICATION-C/BOND	2.0	EAC	63.10	0.00%	126.20	12.62	138.82

	EXT AMT	GST AMT	INC GST
PRODUCT	126.20	12.62	138.82
DELIVERY	0.00	0.00	0.00
TOTAL	126.20	12.62	138.82

JOB NO : 444873

PLEASE PAY THIS AMOUNT

\$138.82

LYN MCDONALD 9560 9798

REMIT PAYMENT TO : P O BOX 283, NUNAWADING, 3131

Messages :

GWUC, RAIN WATER HARVESTING SYSTEM

Purchase Receipt for stainless steel filter mesh for FT4

TAX INVOICE

Inv No: 470875

Sold To:
CASH SALE - VIC (99000)

Delivered To:
CASH SALE - VIC (99000)
LYN McDONALD
30 PANORAMIC GROVE
GLEN WAVERLY
VIC 3150

S E F A R

METAL MESH
a division of
Sefar Filter Specialists Pty Ltd

ABN 51 094 432 667
HEAD OFFICE
19-21 Huntingwood Drive
Huntingwood, NSW, 2148
www.sefarfiltration.com.au

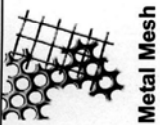
ACCOUNT CASV990-M	DATE 31/03/2009	Internal Order No. VW2340309	Cust Order No. 3150
Carrier CUSTOMER PICK UP		Con Note No.	PAGE

Code	Description	Shipped	BIO	Price	Per	Disc	Gst	Amount
W003.5-18-155	SS MESH T304 X 1550MM	0.50		132.0000	LMTR		6.60	72.60
W020-26-124	SST304 MESH 6.1MM AP X 1.2MM WIRE DIA X 1550MM WIDE	0.50		64.0000	LMTR		3.20	35.20
	SST304 MESH 0.81MM AP X 0.45MM WIRE DIA X 1245MM WIDE							

PAID

EFT Payments to: Sefar Filter Specialists Pty Ltd BSB Number: 062 000 Account Number: 1159 2802	Cheque Payments to: Sefar Filter Specialists Pty Ltd 14-16 Crawford Street Braeside Vic 3195
TERMS: NETT 30 DAYS	TOTAL EXCLUDING GST 98.00
	TOTAL GST 9.80
	TOTAL INCLUDING GST 107.80

MELBOURNE OFFICE 14-16 Crawford Street Braeside, VIC, Australia 3195 Telephone: 61 (03) 9588 1990 Facsimile: 61 (03) 9588 1992 Email: vic@metalmesh.com.au	BRISBANE OFFICE Telephone: 61 (07) 3826 0600 Facsimile: 61 (07) 3200 2368 Email: qld@metalmesh.com.au	PERTH OFFICE Telephone: 61 (08) 9259 8600 Facsimile: 61 (08) 9259 8666 Email: wa@metalmesh.com.au	NEW ZEALAND OFFICE Telephone: 64 (09) 622 3330 Facsimile: 64 (09) 622 3332 Email: salesnz@metalmesh.com.au
SYDNEY OFFICE Telephone: 61 (02) 9486 3900 Facsimile: 61 (02) 9486 3911 Email: nsw@metalmesh.com.au	ADELAIDE OFFICE Telephone: 1800 671 715 Facsimile: 61 (03) 9588 1992 Email: sa@metalmesh.com.au		



GWUC, RAIN WATER HARVESTING SYSTEM

FT6 Piping

This includes piping from;

- the mains water connection near the Church doors from the carpark, and
- from the pump to Garden Watering system connection.

Both lengths of pipe were of 25mm Black, Medium Density Polyethylene (MDPE) water pipe PN12.5 (= max pressure rating 1250kPa).

Purchase Receipt for Piping

VICTORIAN IRRIGATION SUPPLIES

Factory 11, 170 Forster Road, Mount Waverley, Victoria, 3149, Australia

Telephone: (03) 9543 3711 Fax: (03) 9543 5668 ABN: 15 452 089 971

www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81311

Date: 30/01/09

Invoice to:

Glen Waverley Uniting Church
 cnr Bogong Ave & Kingsway
 GLEN WAVERLEY 3150

Deliver to:

Lyn McDonald
 9560 9798

Account Number	Customer Reference	VIS Order No.							
2000	Glen Wav UC	15141							
Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Nett	Tax Amount	Total Amount
TPPSW090	PIPING, PVC 90mm Stormwater	10	0	10	19.09	0	190.90	19.09	209.99
TPPE25/12X	PIPE, MDPE 25mm PN12.5 x 50m	1	0	1	64.00	0	64.00	6.40	70.40
TTPE25	TEE, POLY 25mm	1	0	1	8.50	0	8.50	0.85	9.35
TECPSW090	END CAP PVC Stormwater 90mm Push on	4	0	4	1.90	0	7.60	0.76	8.36
TEPSW090X4	ELBOW PVC Stormwater 90mm x 45 Deg.	4	0	4	1.55	0	6.20	0.62	6.82
TEPSW090X9	ELBOW PVC Stormwater 90mm x 90 Deg.	12	0	12	1.60	0	19.20	1.92	21.12
TTPSW090X4	TEE PVC Stormwater 90mm x 45 Deg.	1	0	1	3.70	0	3.70	0.37	4.07
TTPSW090X9	TEE PVC Stormwater 90mm x 90 Deg.	3	0	3	2.40	0	7.20	0.72	7.92
TCPS90	90mm STORMWATER COUPLING	1	0	1	1.48	0	1.48	0.15	1.63
TEPE25	ELBOW, POLY 25mm	2	0	2	6.39	0	12.78	1.28	14.06
FFF	FREIGHT & HANDLING	1	0	1	8.18	0	8.18	0.82	9.00
	TO FOLLOW								
	APEX 25mm FLOAT VALVE WITH 6" FLOAT	1	0	1	30.00	0	30.00	3.00	33.00

PAID

Please note new banking details:

Banking Details - BSB: 013-701 Account Number: 478918013

Please notify us if using direct credit option: accounts@vicirrigation.com.au

Credit card payments will attract a surcharge of 2.5% for any amount over \$3000

Terms: PAYABLE ON INVOICE

Subtotal	359.74
Total GST	35.98
Total	395.72

GWUC, RAIN WATER HARVESTING SYSTEM

FT7 Barrel Unions

See WT7 in Section 3_1 page 8

FT8 First Flush Filters

150mm diameter first flush filters are provided under the downpipe filters on the Vestry Wall and the Roof Column, both adjacent to the Fernery Tank..

FT8 Purchase Receipt

RMV10.0 Tax Invoice 11/03/2009

G Store Pty Ltd

A.B.N.:45 785 489 848
 1095 Dandenong Rd
 Malvern East VIC 3145
 Ph: 03-9571-0552 Fax: 03-9571-0558
 Ser. By Dion
 Sold To: (McDonald_L)
 Lyn McDonald
 30 Panoramic Grove
 GLEN WAVERLEY VIC 3150

Docket No.	Date	Time
5258	11/03/2009	11:33

- * Rain Harvesting First Flush Div 150mm 154.00 x 2 \$308.00
- * Rain Harvesting Mozzie Stoppa 17.00 x 2 \$34.00

Subtotal \$342.00
 Tax \$31.09
 Total inc. GST \$342.00
 No. of Items (4)



Fig 3.33 - First Flush Filter in place



Fig 3.34 - Filter removed for cleaning

VICTORIAN IRRIGATION SUPPLIES

Factory 11, 170 Forster Road, Mount Waverley, Victoria, 3149, Australia
 Telephone: (03) 9543 3711 Fax: (03) 9543 5668 ABN: 15 452 089 971
 www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81747
 Date: 12/05/09

Invoice to:
 GLEN WAVERLEY UNITING CHURCH

Deliver to:
 CASH SALES c/o VIS
 11/170 Forster Road
 MOUNT WAVERLEY VIC

FT9 & FT10 Rubber Couplings

90mm couplings used at the 1st Flush Filters and Wet Legs and 100mm couplings used on the Tank overflow pipe.

FT9 & FT10 Purchase Receipt

See adjacent Purchase Receipt

Account Number	Customer Reference	VIS Order No.
2000	GWUC	15308

Item Code	Item Description	Order Qty	Bi/Ord Qty	Invoice Qty	Price	Disc %	Nett	Tax Amount	Total Amount
TRC90SW	RUBBER COUPLING FOR 90mm STORMWATE	5	0	5	12.00	0	60.00	6.00	66.00
TRC100DWV	100mm DWV RUBBER COUPLING	2	0	2	16.50	0	33.00	3.30	36.30
DNPY25	NIPPLE, Poly, 25mm	1	0	1	1.85	0	1.85	0.19	2.04
DNTPY25X25	NUT & TAIL, 25mm F x 25mm B	1	0	1	2.20	0	2.20	0.22	2.42
TEPSW090X9	ELBOW PVC Stormwater 90mm x 90 Deg.	4	0	4	1.50	0	6.00	0.60	6.60
	20mm POLY BARRELL UNION	1	0	1	9.50	0	9.50	0.95	10.45
	25mm POLY BARRELL UNION	1	0	1	12.30	0	12.30	1.23	13.53
DNRPY20X15	NIPPLE REDUCING, Poly, 20x15mm	1	0	1	1.38	0	1.38	0.14	1.52
TAFPE25X20	ADAPTOR FEMALE, POLY 25mm x 20mm F	1	0	1	4.52	0	4.52	0.45	4.97
DNB15	NIPPLE, BRASS 15mm	1	0	1	1.87	0	1.87	0.19	2.06
DUB15F	UNION, BRASS 15mm FLX Compression	1	0	1	3.00	0	3.00	0.30	3.30

PAID

Subtotal	135.62
Total GST	13.57
Total	149.19

Please note new banking details:
 Banking Details - BSB: 013-701 Account Number: 478918013
 Please notify us if using direct credit option: accounts@vicirrigation.com.au
 Credit card payments will attract a surcharge of 2.5% for any amount over \$3000

Terms: PAYABLE ON INVOICE

GWUC, RAIN WATER HARVESTING SYSTEM

SPARES

The following Spares are contained within the Water System Cupboard in the Storeroom of the Hall Extension;

S1 Transfer Pump (A)

AL-KO Motor Pump set as for West Tank Pump WT9 and Fernery Tank Pump FT3.

See Part 3_1 Page 17 for Purchase Receipt.

S2 Pump Pressure Controller (B)

AL-KO Hydrocontrol Pump Pressure Controller for West Tank Pump WT9 and Fernery Tank Pump FT3.

See Part 3_1 Page 17 for Purchase Receipt.

S3 Caleffi Valve (C)

Pressure reducing valves, Caleffi S5335 15mm, used at

Valve Trains,

- on wall outside Church building toilets,
- On wall of ramp entry to Hall Extension,
- Within Fernery Pump Enclosure,
- On west facing wall of 15 Southdown, and
- On north facing wall of 17 Southdown.

See Part 3_1 Page 17.

S4 Sump Pump (D)

Lowara submersible pump (as used in the Pump Pit), complete with 10m of cable and float switch.

In order to removed the Pump, the 240V plug top, currently plugged into the power outlet behind the brick Church sign, has to be removed in order to pull the cable out of the conduit.

A spare (green) "draw wire" is already available in the conduit to pull the new pump cable through the conduit.

When changing over this Pump for the one currently being used in the Pump Pit the **low level suction screen** has to be removed (by taking out some screws) and then fitted to the spare pump.

The 3 pin 240V plug top has to be cut off the cable to allow it to be threaded into the underground conduit, then a plug (from the existing unit) refitted.

As this Pump had to be ordered on the Supplier (Victorian Irrigation) it has its own purchase receipt.

S5 Barrel Union

Black poly, 25mm. These are used in piping joints at the Pumps in order to simply and easily disconnect Pumps without having to break or cut the piping.

See Part 3_1, Page 8 for purchase receipt.



Fig 3.38 - Barrel Union



Fig 3.35 - Bottom Shelf of Cupboard



Fig 3.36 - Caleffi Valve



Fig 3.37 - Inside Water Tanks Cupboard

VICTORIAN IRRIGATION SUPPLIES

Factory 11, 170 Forster Road, Mount Waverley, Victoria, 3149, Australia
Telephone: (03) 9543 3711 Fax: (03) 9543 5668 ABN: 15 452 089 971
www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81896
Date: 24/06/09

Invoice to:

GLEN WAVERLEY UNITING CHURCH
LYN McDONALD
9560 9798

Deliver to:

CASH SALES c/o VIS
11/170 Forster Road
MOUNT WAVERLEY VIC

Account Number	Customer Reference	VIS Order No.	
2000	GWUC	15377	

Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Tax Nett	Total Amount
DSPDOC7/10	SUBMERSIBLE PUMP DOC 7/10 10m LEAD	1	0	1	405.45	0	405.45	40.55
								446.00

PAID

Please note new banking details:

Banking Details - BSB: 013-701 Account Number: 478918013
Please notify us if using direct credit option: accounts@vicirrigation.com.au
Credit card payments will attract a surcharge of 2.5% for any amount over \$3000

Terms: PAYABLE ON INVOICE

Subtotal	405.45
Total GST	40.55
Total	446.00

GWUC, RAIN WATER HARVESTING SYSTEM

S6 Check Valve

Dual check valves, Black Poly 25mm. These are used in the piping to prevent back flow of water, eg to stop Tank water back flowing into mains water.



Fig 3.29 - Check Valve

VICTORIAN IRRIGATION SUPPLIES

Factory 11, 170 Forster Road, Mount Waverley, Victoria, 3149, Australia
 Telephone: (03) 9543 3711 Fax: (03) 9543 5668 ABN: 15 452 089 971
 www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81747
Date: 12/05/09

Invoice to:
 GLEN WAVERLEY UNITING CHURCH

Deliver to:
 CASH SALES c/o VIS
 11/170 Forster Road
 MOUNT WAVERLEY VIC

Black Poly 32mm Pressure

Pipe, 090211

Account Number	Customer Reference	VIS Order No.							
2000	GWUC	15308							
Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Nett	Tax Amount	Total Amount
TRC90SW	RUBBER COUPLING FOR 90mm STORMWATE	5	0	5	12.00	0	60.00	6.00	66.00
TRC100DWV	100mm DWV RUBBER COUPLING	2	0	2	16.50	0	33.00	3.30	36.30
DNPY25	NIPPLE, Poly, 25mm	1	0	1	1.85	0	1.85	0.19	2.04
DNTPY25X25	NUT & TAIL, 25mm F x 25mm B	1	0	1	2.20	0	2.20	0.22	2.42
TEPSW090X9	ELBOW PVC Stormwater 90mm x 90 Deg.	4	0	4	1.50	0	6.00	0.60	6.60
	20mm POLY BARRELL UNION	1	0	1	9.50	0	9.50	0.95	10.45
	25mm POLY BARRELL UNION	1	0	1	12.30	0	12.30	1.23	13.53
DNRPY20X15	NIPPLE REDUCING, Poly, 20x15mm	1	0	1	1.38	0	1.38	0.14	1.52
TAFPE25X20	ADAPTOR FEMALE, POLY 25mm x 20mm F	1	0	1	4.52	0	4.52	0.45	4.97
DNB15	NIPPLE, BRASS 15mm	1	0	1	1.87	0	1.87	0.19	2.06
DUB15F	UNION, BRASS 15mm FLX Compression	1	0	1	3.00	0	3.00	0.30	3.30
PAID								Subtotal	135.62
Please note new banking details:								Total GST	13.57
Banking Details - BSB: 013-701 Account Number: 478918013 Please notify us if using direct credit option: accounts@vicirrigation.com.au Credit card payments will attract a surcharge of 2.5% for any amount over \$3000								Total	149.19
Terms: PAYABLE ON INVOICE									

VICTORIAN IRRIGATION SUPPLIES

Factory 11, 170 Forster Road, Mount Waverley, Victoria, 3149, Australia
 Telephone: (03) 9543 3711 Fax: (03) 9543 5668 ABN: 15 452 089 971
 www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 82001
Date: 28/07/09

Invoice to:
 Glen Waverley Uniting
 MOUNT WAVERLEY VIC 3149

Deliver to:
 CASH SALES c/o VIS
 11/170 Forster Road
 MOUNT WAVERLEY VIC

Account Number	Customer Reference	VIS Order No.							
2000	GWUC	0							
Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Nett	Tax Amount	Total Amount
	25mm Philmac Check Valve	2	0	2	19.09	0	38.18	3.82	42.00
PAID								Subtotal	38.18
Please note new banking details:								Total GST	3.82
Banking Details - BSB: 013-701 Account Number: 478918013 Please notify us if using direct credit option: accounts@vicirrigation.com.au Credit card payments will attract a surcharge of 2.5% for any amount over \$3000								Total	42.00
Terms: PAYABLE ON INVOICE									

GWUC, RAIN WATER HARVESTING SYSTEM

S7 Security Screws

Stainless steel, special hexagon key head metal thread screws for locking down the lids of back the Filter Pit and Pump Pit.



Fig 3.30 - Security Screws

Thomas Warburton Pty. Ltd A.B.N. 43 105 050 824

Head Office: P.O. Box 566, Mulgrave, Victoria 3170
16-18 Dunlop Road, Mulgrave, Victoria 3170
Bulwer: 204 Levenmouth Street Altonhea, Victoria 3150
Campbellfield: 12-14 National Boulevard, Campbellfield, Victoria 3061
Dandenong: 308 South Gippsland Highway, Dandenong, Victoria 3175
Kilgirth: Unit 4/116-118 Canterbury Road, Kilgirth, Victoria 3137
Mildura: 48 Seventh Street, East Mildura, Victoria 3500
Shepparton: 33-35 Florence Street Shepparton Vic. 3630
Sunshine: 618 Somerville Road, Sunshine, Victoria 3020
Warrnambool: 21 Rooneys Rd, Warrnambool, Victoria 3280

email: salesmulgrave@warburtons.com.au
Ph: (03) 9574 3434 Fax: (03) 9574 3456
Ph: (03) 5335 1777 Fax: (03) 5335 1799
Ph: (03) 8359 8000 Fax: (03) 8359 6099
Ph: (03) 9554 8888 Fax: (03) 9554 8899
Ph: (03) 9639 7700 Fax: (03) 9639 7799
Ph: (03) 5051 3000 Fax: (03) 5051 3001
Ph: (03) 5820 0800 Fax: (03) 5820 0888
Ph: (03) 9300 9600 Fax: (03) 9300 9699
Ph: (03) 5564 5444 Fax: (03) 5564 5400

Tax Invoice
774001
PICKSLIP 121544

Quality Endorsed Company
800 681 2800
GIC 548

CHARGE TO
CASH SALES (MULGRAVE)
P O BOX 566
MULGRAVE

Ph: _____ Fax: _____

Prices net after discount

DELIVER TO
CASH SALES (MULGRAVE)
P O BOX 566
MULGRAVE

Abrasives, Cutting Tools,
Fasteners, Industrial Supplies,
Safety Equipment, Tools &
Welding Equipment.

CUSTOMER ORDER No.	CUSTOMER ABN	SLIP No.	ACCOUNT No.	ORIGIN	CONTACT NAME	PACKED	IRWG	SLIP No.	Tax Invoice	Page	DATE
220009		121544	78	PRR /P		NB	IRWG	121544	774001	1 of 1	22-Jun-09

TW CODE	DESCRIPTION/CUSTOMER PART NO.	SIZE/MPG/PART NO.	QUANTITIES SUPPLIED	BCK ORD	PRICE Exc GST	UNIT	DISCOUNT %	GST	AMOUNT Exc GST
13506	SCREW BUTTON SOCK/PIN-SECURITY STAIN MM Your Part No: M8X70-CBM	8X70	6		350.00	100		2.10	21.00
10700	WASHER FLAT STAINLESS 304 Your Part No: 8X17X1.2	MM 3629	12		4.76	100		0.06	0.57
28841	NUT HEX-STAIN 304 STAND Your Part No: 3520	MM 8	6		14.79	100		0.09	0.89

The Leading Industrial Distributor

CARRIER: 109 22-Jun-09 04:14 PM
CARTNOTE: _____ TW Mulgrave
WEIGHT: _____

PACKAGES DESPATCHED: _____ TOTAL GST: 2.25

Total INCLUDING GST: **\$24.71**

The goods referred to in this invoice are supplied on our standard terms and conditions accepted by you as part of the Credit Account Application, and updated as notified to you on 1/7/2009. To view these terms and conditions visit our website www.warburtons.com.au

Items S8 – S11 are fittings for the pipe line from the Pump Pit to the West Tank
(See Fig next page)

VICTORIAN IRRIGATION SUPPLIES

Factory 11, 170 Forster Road, Mount Waverley, Victoria, 3149, Australia
Telephone: (03) 9543 3711 Fax: (03) 9543 5668 ABN: 15 452 089 971
www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81869

Date: 17/06/09

Invoice to:

GLEN WAVERLEY UNITING CHURCH
LYN

Deliver to:

CASH SALES c/o VIS
11/170 Forster Road
MOUNT WAVERLEY VIC

S8 40mm Barrel Unions

See Fig 3.31 (A)

White PVC 40mm barrel unions, used on the piping from the Pump Pit to the West Task, providing for the possibly to disconnect sections of this piping, for flushing, repairing etc.

Account Number	Customer Reference	VIS Order No.	
2000	GWUC	15389	

Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Tax Nett	Total Amount
DBUP040	BARREL UNION, PVC 40mm	2	0	2	9.00	0	18.00	1.80
TTT	TEFLON TAPE	4	0	4	0.70	0	2.80	0.28
DEP040X45	ELBOW PVC. 40mm x 45 Deg..	2	0	2	3.20	0	6.40	0.64

Please note new banking details:		Subtotal	27.20
Banking Details - BSB: 013-701 Account Number: 478918013		Total GST	2.72
Please notify us if using direct credit option: accounts@vicirrigation.com.au		Total	29.92
Credit card payments will attract a surcharge of 2.5% for any amount over \$3000			
Terms: PAYABLE ON INVOICE			

GWUC, RAIN WATER HARVESTING SYSTEM

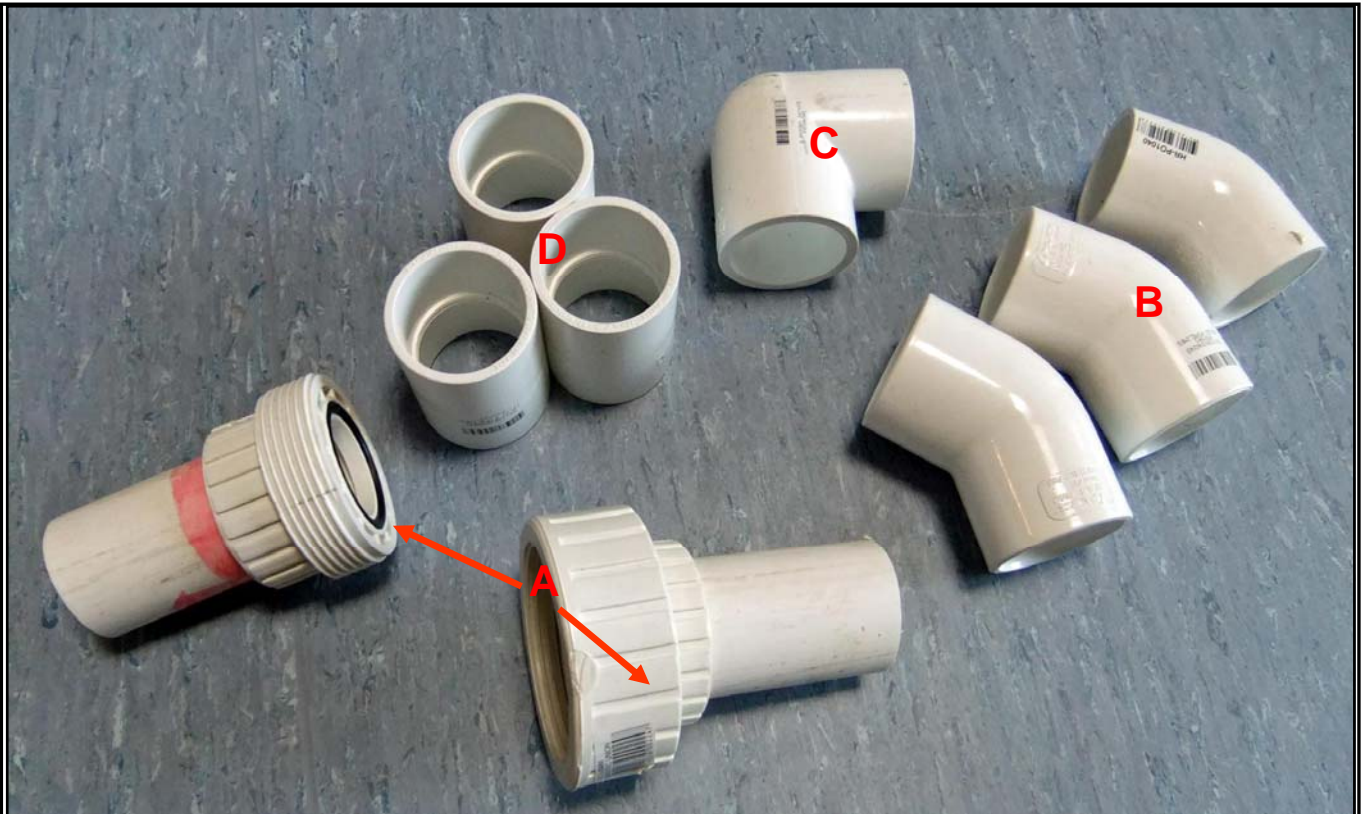


Fig 3.31 - 40mm White PVC Pressure Pipe Fittings

S9 40mm Elbow, 45°

White PVC Elbow, (B)

S10 40mm Elbow 90°

White PVC 40mm Elbow, (C)

S11 40mm Coupling

ie joiners, in White PVC, (D)

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www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81856

Date: 10/06/09

Invoice to:

GLEN WAVERLEY UNITING CHURCH
LYN 9560 9798

Deliver to:

CASH SALES c/o VIS
11/170 Forster Road
MOUNT WAVERLEY VIC

Account Number	Customer Reference	VIS Order No.							
2000	GWUC	15376							
Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Tax Nett	Amount	Total Amount
DPP040/12	PIPE, PVC 40mm CL.12 SCJ	16	0	16	21.60	0	345.60	34.56	380.16
DCV040SP	CHECK VALVE BRASS SPRING, 40mm	1	0	1	42.00	0	42.00	4.20	46.20
DCF250	CLEANING FLUID, 250 M.L. Red	2	0	2	5.50	0	11.00	1.10	12.10
DSC250	SOLVENT CEMENT, 250 M.L. GREEN	2	0	2	8.50	0	17.00	1.70	18.70
DEP040X90	ELBOW PVC. 40mm x 90 Deg.	18	0	18	2.60	0	46.80	4.68	51.48
DEP040X45	ELBOW PVC. 40mm x 45 Deg.	3	0	3	3.20	0	9.60	0.96	10.56
DCP040	COUPLING, PVC 40mm	3	0	3	1.60	0	4.80	0.48	5.28
DEPL40MF	40mm M & F POLY ELBOW	1	0	1	5.40	0	5.40	0.54	5.94
DVTOA040X0	VALVE T.O.A. PVC 40 X 40mm	1	0	1	4.00	0	4.00	0.40	4.40
DBUP040	BARREL UNION, PVC 40mm	4	0	4	9.00	0	36.00	3.60	39.60
DTOP40	40mm POLY TANK OUTLET	2	0	2	11.80	0	23.60	2.36	25.96
DVSP040	VALVE SOCKET, PVC 40mm	1	0	1	2.10	0	2.10	0.21	2.31
	40MM POLY THREADED BARRELL UNION	1	0	1	8.10	0	8.10	0.81	8.91
FFF	FREIGHT & HANDLING	1	0	1	8.00	0	8.00	0.80	8.80

PAID

Please note new banking details:

Banking Details - BSB: 013-410 Account Number: 296111585

Please notify us if using direct credit option: accounts@vicirrigation.com.au

Credit card payments will attract a surcharge of 2.5% for any amount over \$3000

Terms: PAYABLE ON INVOICE

Subtotal 564.00

Total GST 56.40

Total 620.40

GWUC, RAIN WATER HARVESTING SYSTEM

Items S12 - S17 are fittings to repair the existing garden watering system.
 This invoice below is typical for some but not all of the specific fittings.



Fig 3.32 - 25mm White PVC Pressure Pipe Fittings

S12 25mm Coupling

ie joiners in White PVC, (A)

S13 25mm Elbow

White PVC, 90°, (B)

S14 25mm End Stop

White PVC, (C)

These fittings are for the Garden Watering system.

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 www.vicirrigation.com.au email: enquiries@vicirrigation.com.au

Tax Invoice

Invoice Number: 81780

Date: 18/05/09

Invoice to:

GLEN WAVERLEY UNITING CHURCH

Deliver to:

CASH SALES c/o VIS
 11/170 Forster Road
 MOUNT WAVERLEY VIC

Account Number	Customer Reference	VIS Order No.							
2000	gwuc	0							
Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Tax Nett	Amount	Total Amount
DEP025X90	ELBOW PVC, 25mm x 90 Deg.	2	0	2	1.30	0	2.60	0.26	2.86
DNPY25	NIPPLE, Poly, 25mm	2	0	2	1.85	0	3.70	0.37	4.07
DNTPY25X13	NUT & TAIL, 25mm F x 13mm B	2	0	2	1.30	0	2.60	0.26	2.86
DCP025	COUPLING, PVC 25mm	7	0	7	1.10	0	7.70	0.77	8.47

PAID

Please note new banking details:

Banking Details - BSB: 013-701 Account Number: 478918013
 Please notify us if using direct credit option: accounts@vicirrigation.com.au
 Credit card payments will attract a surcharge of 2.5% for any amount over \$3000

Subtotal	16.60
Total GST	1.66
Total	18.26

Terms: PAYABLE ON INVOICE

GWUC, RAIN WATER HARVESTING SYSTEM

S15 20mm Couplings

ie joiners in White PVC.
These fittings are for the Garden Watering system.



Fig 3.33 - 20mm White PVC Pressure Pipe Fittings

These two items are stored in the "Flammables" Shed at the end of Lemke Lane.



Fig 3.34 - 32mm Black Poly Pipe

S16 32mm Poly Piping

Black Poly pressure pipe rating PN 12.5.

S17 25mm Poly Piping

Black Poly pressure pipe rating PN 12.5.



Fig 3.35 - 25mm Black Poly Pipe

Account Number	Customer Reference	VIS Order No.
2000	GWUC	15281

Item Code	Item Description	Order Qty	B/Ord Qty	Invoice Qty	Price	Disc %	Tax Net	Amount	Total Amount
DPPIT	Poly Pump Pit c/w Lid 24/4/09	1	0	1	313.64	0	313.64	31.36	345.00
DTOP32	POLY TANK OUTLET (RX) 32mm	1	0	1	9.09	0	9.09	0.91	10.00
	150mm STORMWATER GRATE 22/4/09	1	0	1	18.00	0	18.00	1.80	19.80
DEPL20	ELBOW, Plastic, F&F 20mm	1	0	1	2.81	0	2.81	0.28	3.09
DEPLA20	ELBOW, Plastic 20mm x 90 M & F	1	0	1	1.80	0	1.80	0.18	1.98
TPPE32/12X	PIPE, MDPE 32mm PN12.5 x 50m	1	0	1	85.00	0	85.00	8.50	93.50
TPPE25/12X	PIPE, MDPE 25mm PN12.5 x 50m	1	0	1	58.00	0	58.00	5.80	63.80
TCPE32	CONNECTOR, POLY 32mm 16/4/09	1	0	1	7.07	0	7.07	0.71	7.78
TTT	TEFLON TAPE	10	0	10	0.60	0	6.00	0.60	6.60
DNPY25	NIPPLE, Poly, 25mm	3	0	3	1.49	0	4.47	0.45	4.92
DSPY25	SOCKET, Poly, 25mm	1	0	1	3.41	0	3.41	0.34	3.75
DNTPY25X25	NUT & TAIL, 25mm F x 25mm B	1	0	1	1.65	0	1.65	0.17	1.82
DPPP25X450	PIPE PIECE, PVC. 25mm x 450mm	1	0	1	3.50	0	3.50	0.35	3.85
DEPLA25	ELBOW, Plastic 25mm x 90 M & F	1	0	1	1.53	0	1.53	0.15	1.68
	100mm DWV COUPLING	2	0	2	2.90	0	5.80	0.58	6.38
	150 X 100 PVC SW REDUCING BUSH 14/4/09	1	0	1	12.00	0	12.00	1.20	13.20
	100mm RUBBER SW COUPLING	1	0	1	16.50	0	16.50	1.65	18.15
DBPY25X15	BUSH, Poly, 25x15mm	3	0	3	1.60	0	4.80	0.48	5.28
DBPY25X20	BUSH, Poly, 25x20mm	1	0	1	1.60	0	1.60	0.16	1.76

Please note new banking details:

Banking Details - BSB: 013-701 Account Number: 478918013
Please notify us if using direct credit option: accounts@vicirrigation.com.au
Credit card payments will attract a surcharge of 2.5% for any amount over \$3000

Other

There are two tins of paint, part full, Colorbond Colours **Woodland Grey** and **Deep Beige** in the Water Tanks Cupboard.



Fig 3.36 - Paint

GWUC, RAIN WATER HARVESTING SYSTEM

TOOLS

The following Tools are contained within the Water System Cupboard in the Storeroom of the Hall Extension;

T1 Screw Driver, Square Drive

The majority of the screws used on the project as Stainless Steel, Square Drive, provided by Sachy's (Bill Norquay - free of charge).

This screw driver fits these screws.



Fig 3.37 - Screw Driver

T2 & T3 Pipe Wrenches (small and large)

These are the so-called "boa constrictor" strap type pipe wrenches which are very effective on black Poly pipe fittings and for releasing the white PVC 90mm and 150mm caps on the bottom of the 1st Flush Filters.



Fig 3.38 - Pipe Wrenches

T4 Security Allen Key

These is a special Allen Key to fit the security screws on the Filter Pit and Pump Pit lids.

Two versions are provided, one as a "drive bit" to fit a battery drill", the other the standard type hand tool .



Fig 3.39 - Allen Keys

T5 Handle for Anti Vandal Tap

Four anti vandal taps for Tank water have been provided.

One **(A)** is amongst the shrubs on the east wall of the Church building to allow Fernery Tank water to be used for garden watering by hand.



Fig 3.41 Tap, east wall Church

One **(B)** is within the Manse Tank enclosure, to allow for testing and any water needs (washing down etc) in the vicinity.



Fig 3.40 - Handle

One each **(C)** & **(D)** provided adjacent to the valve trains in both the 15 & 17 Southdown Manses, for testing and Garden Watering.



Fig 3.42 - Tap in Manse Tank enclosure

The anti vandal handle means that the tap cannot be operated without this removable handle. The handle simply slips over the flats of the vertical shaft of the tap.



Fig 3.43 - Tap 15, Southdown

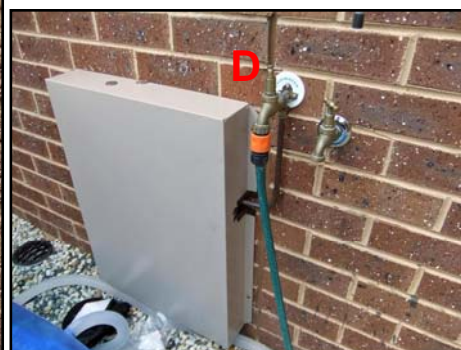


Fig 3.45 - Tap, 17 Southdown

GWUC, RAIN WATER HARVESTING SYSTEM

T6 Handle for Fernery Tank Isolation Valves

The Fernery Tank Outlet (Isolation) Valves are each below grade and contained/protected within a 150mm diam PVC pit with cover. The handles on the valves are short and so this "extension" handle is provided for ease of operation.



Fig 3.46 - Fernery Tanks isolation valves, Valve pit (A), cover removed (B) & valve at bottom (C)



Fig 3.47 - Extension handle



Fig 3.48 - Valve handle (removed from valve)

T7 Handles for Isolation Ball Valves

There are various 15mm, 20mm and 25mm isolation valves on the mains and tank water.

Where the valves are readily available to the public the handles have been removed, and kept in the Water Tank Cupboard.

The valve stems all have "flats" so the valve can also be operated with a "shifting spanner" if the handles are not readily available.



Fig 3.49 - Range of Valve Handles

T8 Fernery Tank Outlet Isolation Valve Handle

These valves handles are of different design. The handle for the isolation/outlet Valve feeding the Fernery Pump is fitted but the handle for other valve has been removed.



Fig 3.50 - Outlet Valve Handle, Fernery Tank