

BIANCO NXT

controls

Borepump Capacitor Box

- 812035 • BIA NXT IPROTECT 1-22 W/16UF
- 812036 • BIA NXT IPROTECT 1-22 W/20UF
- 812037 • BIA NXT IPROTECT 1-22 W/25UF
- 812038 • BIA NXT IPROTECT 1-22 W/35UF
- 812039 • BIA NXT IPROTECT 1-22 W/40UF
- 812040 • BIA NXT IPROTECT 1-22 W/45UF
- 812041 • BIA NXT IPROTECT 1-22 W/55UF
- 812042 • BIA NXT IPROTECT 1-22 W/60UF



1. Introduction

Thanks for choosing the BIA NXT IPROTECT CAPACITOR as a starter box for your single-phase PSC (Permanent Split Capacitor) bore pump motor.

Unlike previous capacitor / control boxes that used an analogue overload, the IPROTECT digitally monitors pump current and provides exceptional pump protection.






Prewired to accept the correct capacitor for your pump motor, the IPROTECT has a comprehensive user display providing information about the running state of the pump.

2. Contents








1. Introduction	2
2. Contents.....	2
3. Useful icons	3
4. Warnings	3
6. Pump Installation Check list.....	5
7. Controller Shortcuts.....	6 - 7
8. Display.....	8
9. Electrical Connections.....	9
10. Controller Parameters	10
10. Quick guide: Sensorless Time control.....	11
11. Low Yielding bores	12
13. Quick guide: Transfer – source/destination control.....	13
14. Cable Jointing	14
15. Best practice Installer Guide supporting notes.....	15
16. Initial Starting Procedure	16
18. Accessories	18
19. Trouble Shooting Guide.....	19
20. Warranties – Terms and Conditions.....	20



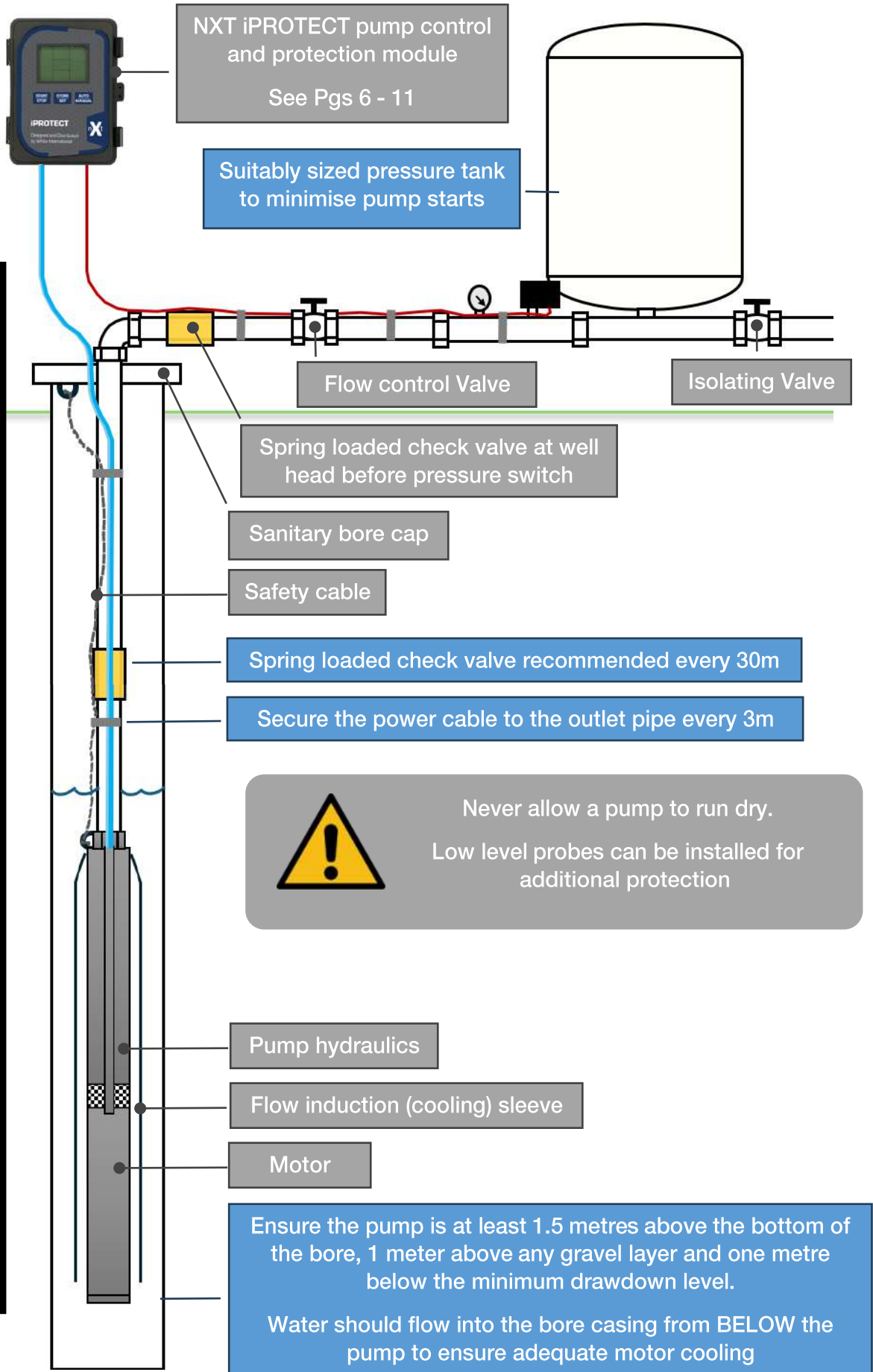
3. Useful icons

	Warning - Electrical safety
	Warning – Potential consequences of use outside of intended application(s). Includes environmental condition warnings.
	Mandatory warning
	Warning to disconnect power
	Read carefully

4. Warnings

	Read the manual carefully before starting.
 	Prior to starting installation or any maintenance the pump must be disconnected from the power supply and pressure relieved from the system including pump and associated pipework.
	Any changes or modification to the wiring must be carried out by suitably qualified personnel.
	A qualified electrician should correctly size and install circuit breakers to protect the power supply. The fitment of additional surge protection is recommended.
	This appliance is not intended for use by persons (including children) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsible for their safety. Children should be supervised to ensure that they do not play with the appliance.
	Ensure that the installation will comply with all applicable local regulations.

'Best Practice' Installation Guide



6. Pump Installation Check list

Inspect the pump, motor and controller for shipping damage

- Ensure that the motor lead assembly is undamaged,
- Check the pump and motor shaft turn freely.
- Verify that pump kW requirement and motor power match.



Electrical checklist

- Isolate the main power before any electrical work.
- All high voltage wiring should only be done by qualified technicians.



Assemble the motor to the hydraulic assembly.

- Before assembly, check that pump and motor mounting faces are free from dirt, debris or contamination.
- Assemble the pump and motor vertically to prevent stress on pump bracket and shaft. Once the mounting faces are in contact tighten assembly nuts evenly.
- Assemble the pump lead guard over the motor ends taking care not to cut or pinch lead wires during installation.

General installation checklist

- Make all underwater and underground splices with waterproof splice connections.
- Support the power cable to the delivery pipe every 3 meters with straps or tape strong enough to prevent sagging.
- Use padding between cable and any metal straps.
- Hold the pump at the discharge head when installing threaded pipe or fittings.
- All plumbing connections must be tight and sealed with thread tape or sealant.
- The delivery pipe pressure rating must be higher than the pump shut off pressure.
- A pressure relief valve is recommended to prevent exceeding pressure switch, pressure gauge or pressure tank ratings.
- Locate the pressure switch within 1 meter of the pressure tank to prevent switch chatter.
- Set the pump 1.5 meters above well bottom to avoid sediment and debris.

Commissioning the pump

- Turn the main circuit main breaker and/or isolator on.
- Restrict the flow with a valve, 1/3 open, before starting pump for the first time.
- Divert the water supply so that dirty water does not enter the tank or water supply.
- Check and note the amps and pump delivery. If normal, continue to run the pump until delivery is clear.
- Verify that starting, running and stopping cause no significant vibration or hydraulic shocks.
- After at least 15 minutes running time, verify that pump output, electrical input, pumping level, and other characteristics are stable and as specified.
- Calibrate the controller

7. Controller Shortcuts

Switching between AUTO and MANUAL:

Hold the **AUTO/MANUAL** button for 5 seconds.

Accumulated Run time:

Controller in manual state.

Press and hold **STORE/SET** and **START/STOP** together

Error log:

- Switch to MANUAL mode
- Ensure no pumps are running.
- **PRESS** and **HOLD** the **AUTO/MANUAL** button, for 5 seconds

Alarm Mute:

At any time press the **START/STOP** button to mute the alarm. It will now beep every 5 minutes



Full NXT iPROTECT Manual

7. Controller Shortcuts cont

Calibrating the controller to the pump

In manual mode, short press **START/STOP**. Allow the pump to run and the current draw to stabilise.

Once you are satisfied the pump is in its 'normal' operating range a short press of the **STORE/SET** button will cause the controller to chirp indicating success.

The controller calibration values can be entered **Parameter #001 - 003**

To clear the calibration

With the pump stopped and the controller in manual mode, **PRESS** and **HOLD** the **START/STOP** button for 30 seconds

Auto calibration will populate Parameters 001 as 70%, 002 as 140%, 003 as 170%.

These may be manually altered in the programming menu

Programming menu

In manual mode, with no pump running, press the **STORE/SET** button for 5 sec.

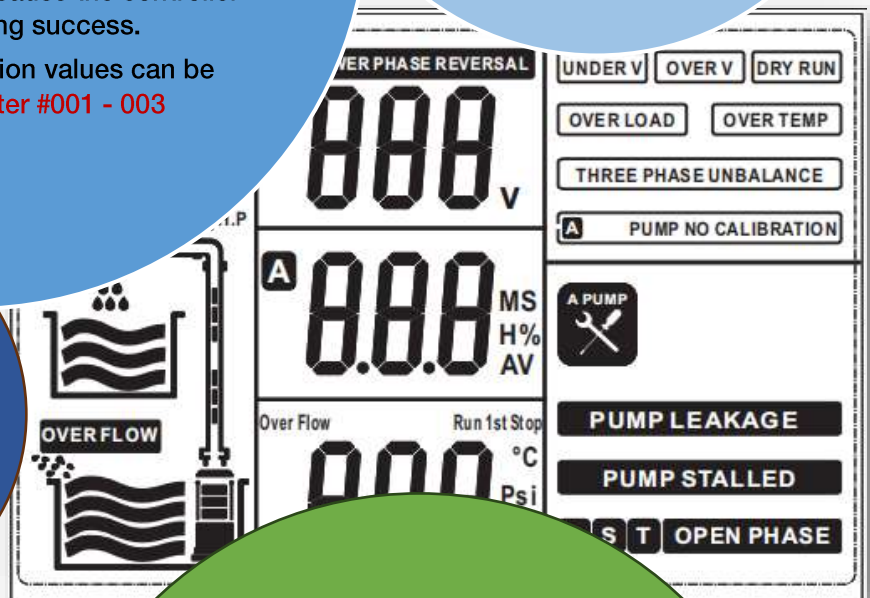
Programming:

START/STOP increases a value

AUTO/MANUAL decreases a value

Press **STORE/SET** to proceed through the parameter menu

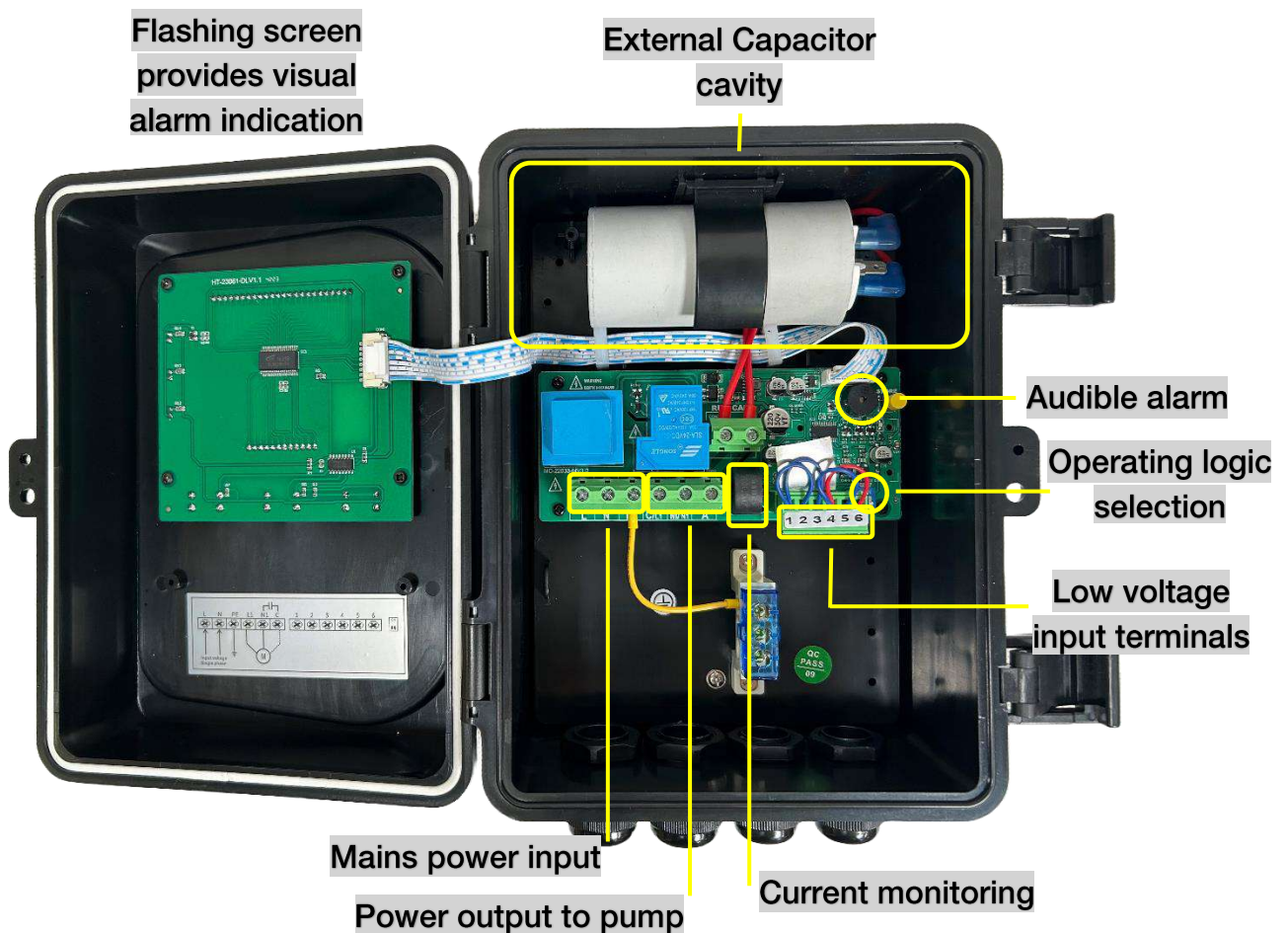
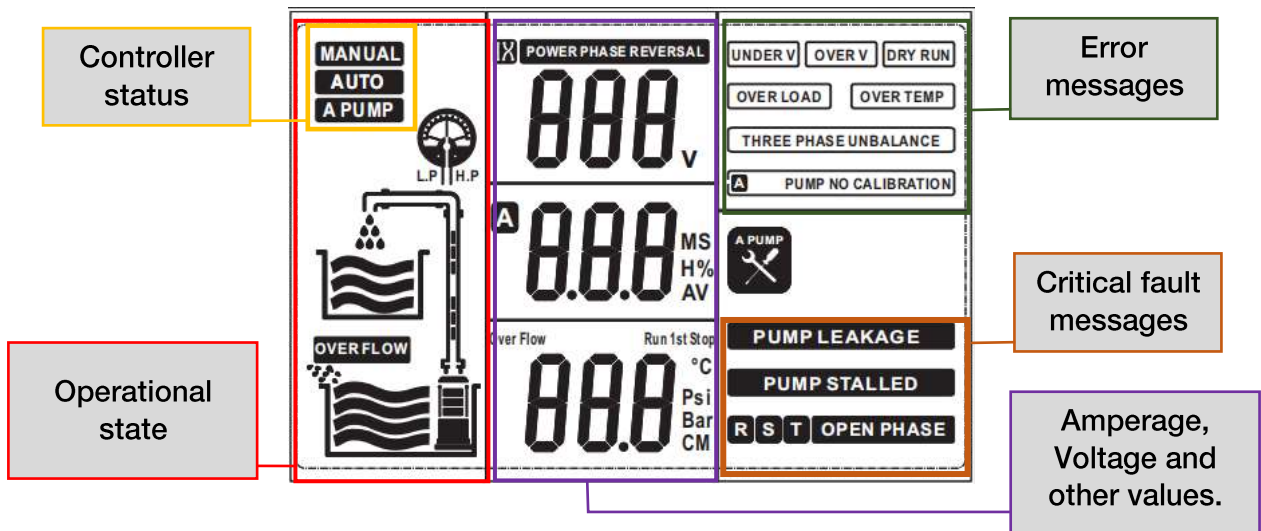
Long press **STORE/SET** to store all changes and exit



8. Display

The NXT iPROTECT display provides a real time indication of the operational mode and the current state of the controller, including real-time voltage/current and any error messages.

Only the icons relevant to the selected operational mode will display.

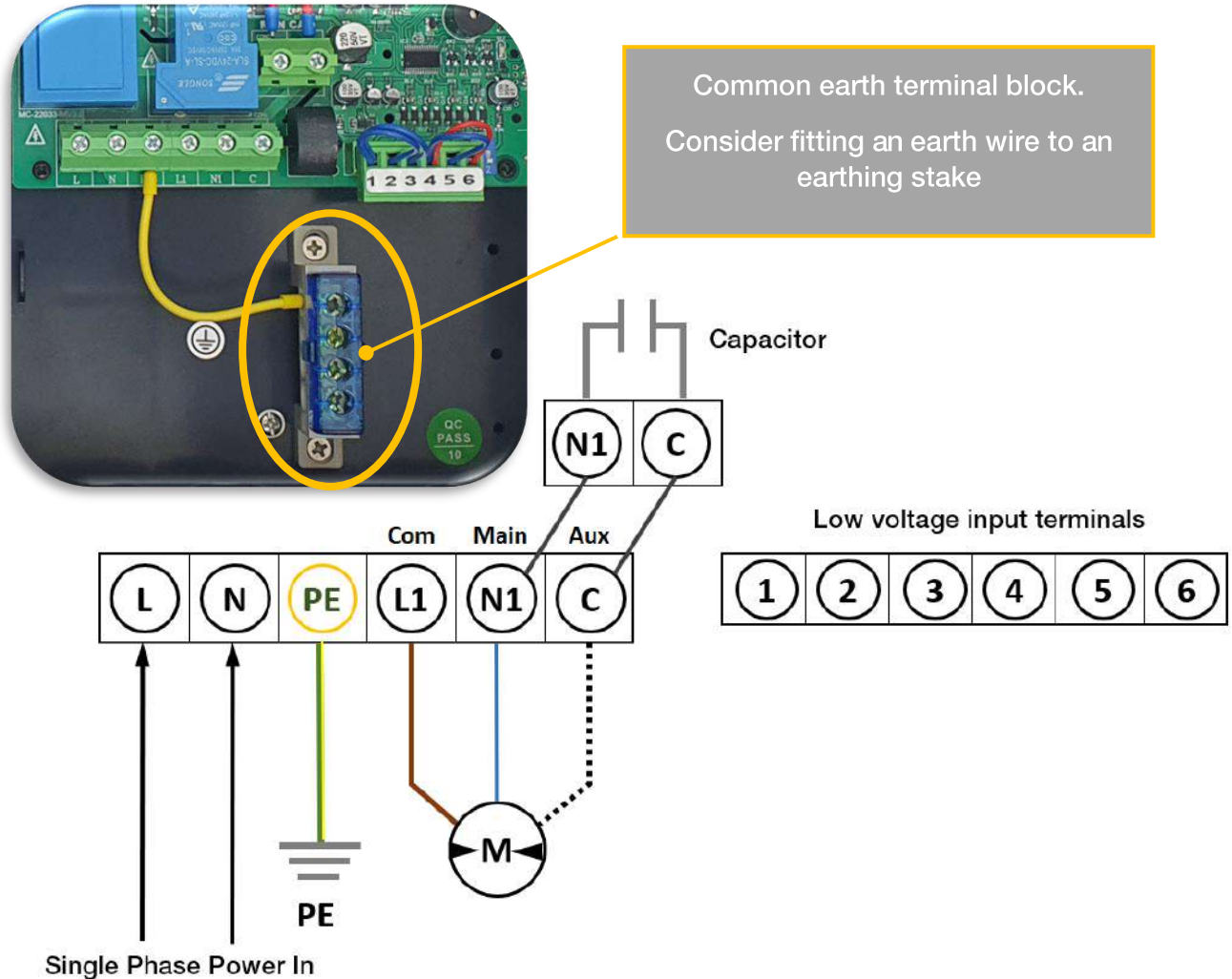


9. Electrical Connections

Always use an electrical outlet that is protected by Residual Current Device (RCD) Safety Switch with a trip current of 30mA or less. A Safety switch is required by Australian/New Zealand Standard AU/NZS 60335.1-2011.



All high voltage wiring must be connected by a suitably qualified technician.



The use of cable smaller than that specified below may cause premature motor failure and will void the warranty. Larger sized cables may be used.

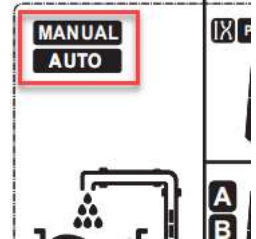
The use of old drop cable or white flat is not recommended. Use water-proof cable only, rated for immersion to 100 m.

		Maximum power cable length					
Motor Power >>>		0.37	0.55	0.75	1.1	1.5	2.2
Cable Cross-section mm ²	1.5mm ²	90	65	45	35	25	20
	2.5mm ²	170	120	90	65	50	35
	4.0mm ²	275	195	145	105	85	55
	6.0mm ²	417	295	215	155	125	85

10. Controller Parameters

Press  to switch between AUTO and MANUAL mode

The controller operating mode will be displayed in the top left corner of the display

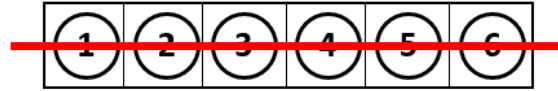


ITEM	DEFAULT	OPERATION
001	0.0 A	Dry run protection trip amperage: Auto config to 70% of calibration value
002	26 A	Over-load protection trip amperage: Auto config to 140% of calibration value
003	33.1 A	Pump stalled trip amperage: Auto config 170% of calibration value
The user may manually tune parameters 001, 002 and 003 to alter the auto configuration values		
004	196V	Under voltage trip voltage
005	265V	Over voltage trip voltage
006	6 sec	Dry run protection trip response time: range 0 – 254 sec
007	30 min	Dry run protection recovery time: range 0 – 254 min
008	00	Timer control (auto mode) – Parameters 009 – 101 00 = inactive 01 = active
009	5 min	Pump run timer: range 0 – 254 min
010	5 min	Pump Stop timer: range 0 – 254 min
011	0 min	Pump stop time (manual mode): range 0 – 254 min
012	5 min	LCD backlight timeout: range 0 – 254 min
013	00 min	Maximum run time alarm in Boosting mode: range 1 – 254 min
014	00	Button Lock – set to 01 to activate Manual/Auto and Store buttons to unlock
015	~	Pump start delay time: range 0 – 254 sec
016	~	Pump stop delay time: range 0 – 254 sec

10. Quick guide: Sensorless Time control



Set the dip switches on the main PCB and cycle the power



In this mode, the controller does not reference any inputs

Set to Auto mode, the controller is in a permanent ON state.

Whenever the controls connected directly to the pump (float or pressure switch) are in their run state, the pump will run and the timer function will operate.

If the controls connected directly to the pump (float or pressure switch) are in their no-run state, the controller will interpret this as an underload (Dry Run) condition.

After the delay period set at **Parameter 06** (default 6 sec) the controller will beep and enter a DRY RUN (underload) protection cycle. Once the delay period set at **Parameter 07** (default 30 min) has elapsed the controller will beep and power will be re-applied.

The controller will operate in a cycle between Run and its Dry-Run (underload) protection state. When the controls connected directly to the pump (float or pressure switch) are in a run state, and the controller has completed its protection cycle the pump will run according to the timer function settings

008	00	Timer control (auto mode) 00 = inactive 01 = active <i>Once activated, parameter 008 becomes invisible</i>
009	5 min	Pump run timer: range 0 – 254 min In Auto mode the pump will run for the time set then stop and consider Parameter 010 value Set to 0, deactivates Auto function
010	5 min	Pump Stop timer: range 0 – 254 min In Auto mode having turned off at Parameter 009 value the pump will remain off for the Parameter 010 value then restart running for Parameter 009 value etc

Application example: A low yielding bore controlled by a pressure switch.

- The pump starts on the pressure switch input but through experience, the customer knows it can only run for 10 mins before it will run dry and then will need 20mins for the water to recover.
- Set 009 to 10 minutes, and 010 to 20 minutes.
- Activated by the pressure switch the pump will run for 10mins, turn off for 20mins then run again for 10mins etc.
- If the destination tank fills closing the ballcock the pressure switch will turn the pump off irrespective of the 009 run-time.
- The process will start again on next run cycle

011	0 min	Pump stop timer (manual mode): range 0 – 254 min In Manual mode, the pump can be set running by pressing START/STOP The pump will switch off after the Parameter 011 time duration has elapsed. Pump protections remain active even in manual mode
-----	-------	--

11. Low Yielding bores

In some situations, the output from the pump is greater than the yield of the well. Should the water level fall to the suction screen, a mixture of air and water will enter the pump causing the pump output flow to cease since the pump cannot generate pressure with insufficient water.



When this occurs, the column of water already in the discharge pipe can hold the check valve closed and an airlock may develop inside the pump.

In this situation, the pump has neither adequate lubrication nor proper cooling for the motor and damage can result if power is not cut off quickly.

1 First, ensure that the pump size is properly sized A smaller pump may avoid over pumping the well.

2 The flow control valve should be set to ensure the pump flow is near the middle of its hydraulic curve

3 The NXT iPROTECT controller has a number of parameters which can protect and control the pump in this situation

- I. First ensure the pump calibration setting is correct.
- II. Tune the start delay time (**Parameter 015**) and the stop delay time (**Parameter 016**)
- III. Activate the timer control **Parameter 008** Set to 1 = On
- IV. **Set Parameter 009** – Run time (pumping) duration
- V. **Set Parameter 010** – Stop time (recharge) duration

Low level protection can be achieved by installing capacitance probes in the well, connected to the controller.

- Terminal 1 = Common
- Terminal 2 = Low level cut out. Install probe 0.5 – 1m above the pump intake
- Terminal 3 = Upper level – permission to run. Install the probe at or near the static water level.

13. Quick guide: Transfer – source/destination control

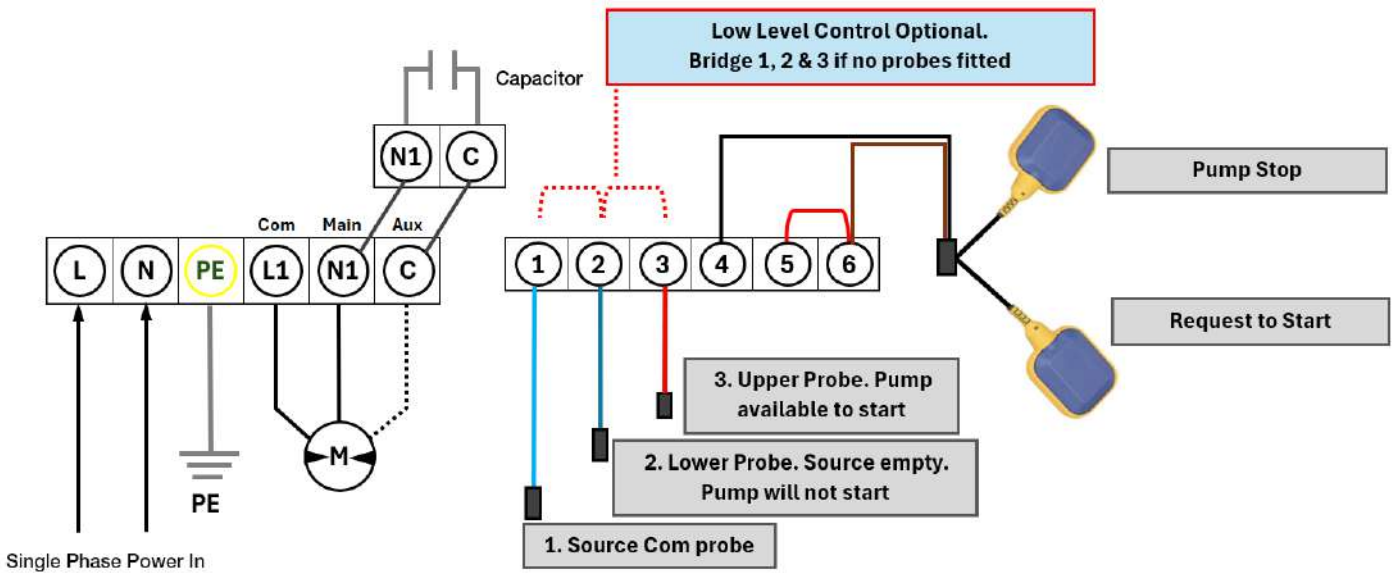


Set the dip switches on the main PCB and cycle the power



The user may wish to utilise additional pump control. In TRANSFER mode the On/Off operation is requested by a normally closed float or probes at the destination or a pressure switch in the delivery line.

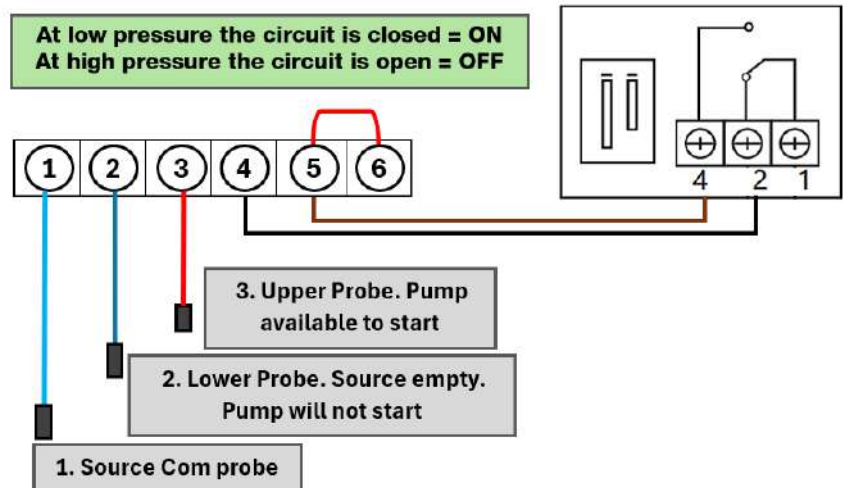
A normally closed float switch at the source controls whether the pump will run or not depending on the liquid level.



In situations where the destination is a significant distance from the source it is possible to control by fitting a normally-open pressure switch to the delivery line

Alternatively, a remote wireless sensor can be used to trigger a switched input.

Connect across #4 and #5
Bridge #5 and #6

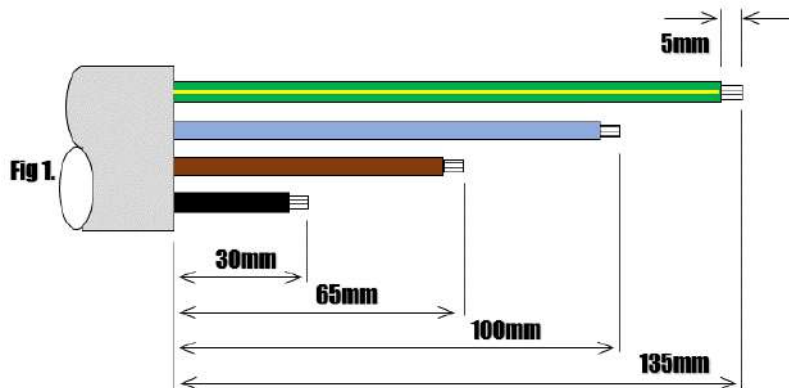


14. Cable Jointing

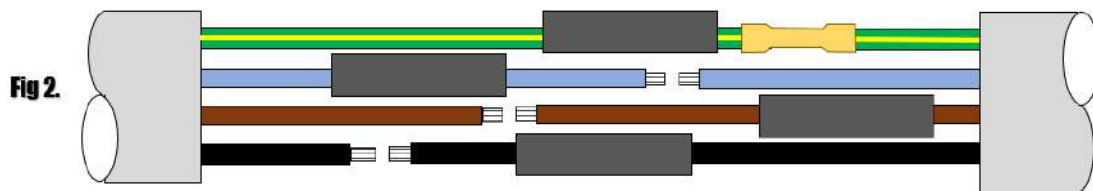
Jointing kit contents:

- 4 x Item Crimp Connectors (BP025)
- 4 x Item 10mm x 60mm HEAT SHRINK TUBE with RESIN
- 1 x Item 25mm x 305mm HEAT SHRINK TUBE with RESIN

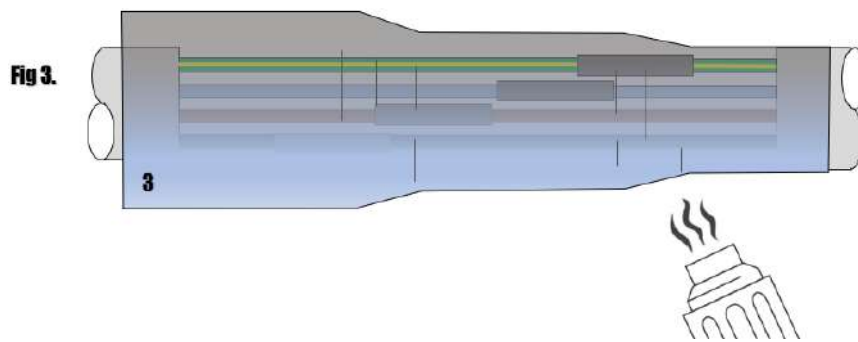
To ensure a properly sealed joint, a Heat Gun capable of $\geq 275^{\circ}\text{C}$ is required to shrink the insulation sleeving (items 2 and 3).



1. Remove 100mm of outer insulation from each cable to be joined, taking care not to damage secondary insulation.
2. Reduce the three wires of each cable to the dimensions shown in Fig.1, ensuring that the wire colours align as Fig.2.



3. Slip item (3) over one end of the cable and item (2) over each of the three wires before using item (1) Crimp Connector to join wires as shown in Fig.2. Complete all crimps and locate item (2) over the completed crimps before commencing to heat shrink the individual connections.



4. Locate item (3) centrally over the three wires and commence to shrink from one end as shown in Fig.3.
When sleeving is shrunk to its maximum, the cable joint is complete.

15. Best practice Installer Guide supporting notes

1. Damage to pump or motor caused by abrasive or corrosive water is not covered under warranty. To guard against installing a pump in aggressive water, it is suggested that an analysis of the bore water be submitted to an accredited laboratory prior to installation to ensure pump suitability.
2. The bore should be clean before installation. The submersible pump must not be used to bail a new bore. Warranty does not cover failure or wear due to abrasives in the water.
3. Be sure voltage and frequency as shown on the nameplate of the motor are the same as the voltage and frequency on the line to which the motor is to be connected.
4. Never allow a pump to run dry, against a closed discharge or full open discharge. Refer to the pump curves which provide minimum and maximum flow conditions.
5. The check valve built into the pump should not be relied on as the only form of non-return protection. Install an additional check valve to reduce water hammer shocks to the pump.
6. Know the total depth of the bore and ensure that the pump does not rest on the bottom or in sand. Ensure 1.5 metres clear below the pump to the bottom of the bore.
7. Know the pumping level of the bore and ensure that the pump remains submerged at all times.
8. A Flow Inducer Sleeve or shroud which ensures that the water is drawn into the pump from below the motor is required when the pump is
 - in open water (i.e. water tank, river or dam),
 - in a rock well,
 - below casing or set in screens,
 - The well diameter is sizeable.
9. Never install borehole submersibles in a crooked bore without gauging first. Lower a gauge which is the same diameter and length as the pump to be used into the bore. If the gauge does not bind, it is safe to install the pump.
10. Never support the weight of the pump by the power cable or by the safety rope.

An un-strained safety rope must be connected to all pumps suspended on polythene or flexible pipe. This line should be fastened to the lifting hook of the pump. The other end should be fastened at the top of the bore casing or bore cap. The safety rope should be affixed at three metre intervals by a suitable underwater tape with the rope having some slackness between each interval to compensate for the expansion of the pipe when under load.

If metal drop pipe is used, it is best installed in three-meter lengths to enable easy handling. All threads should be treated against corrosion.

11. Install a lightning arrestor installed as close to the wellhead in accordance with manufacturers recommendations. A lightning arrestor provides protection against induced voltage surges on secondary power lines; it is not effective against direct hits.
12. Use an ohmmeter to make continuity and insulation checks before installing the pump in the bore.
13. Place the additional motor label with the pump label and place both inside the iPROTECT for future reference.

CHECKING MOTOR ROTATION

Before lowering the pump into the bore check the pump rotation, continuity and insulation. Before operating the pump, first pour clean water into discharge by holding the non-return valve open so that the shaft bearings and the impellers become wet.

The motor shaft rotates anticlockwise viewed from the lead grommet end.

16. Initial Starting Procedure

Before connecting the discharge pipe from the bore, the bend and gate valve should be screwed into the top of the bore cap as a pump valve.

With the gate valve just **slightly** open, start the pump to fill the drop pipe

NEVER START THE PUMP AT FULL FLOW FOR THE FIRST TIME

Immediately the pump has been started, catch some of the discharge water in a large container and allow the solids to settle out. If little or no sand appears, open the gate valve to 1/3 and pump until the water is clean.

For the first 10 to 20 minutes of operation, it is suggested to keep the gate valve only partially open, to maintain a low flow which will prevent turbulence in the well near the pump and possible seizing of the pump due to excessive sand in the water.

If excessive amounts of sand or other solids are being pumped, shut the pump down, and have the bore attended to before restarting the pump.

Pumping of sand or even very fine small quantities will shorten the effective life of any pump.

NEVER OPEN THE GATE VALVE ABRUPTLY as this may raise sand and deposits.

The pump should be run for a period of 30 minutes to check that it does not pump the bore dry. This would be obvious by large fluctuations on the pressure gauge and current draw displayed on the controller as the pump flow surges.

Continuing operation with a pump that is surging could cause serious damage to the pump and motor due to shock pressures as the pump alternately takes up and loses the hydraulic load. This effect is generally referred to as “snoring”.

WELL TEST

Check the pump and well performance before making the final connection to the discharge system.

1. Install a gate valve on the end of the pipe. Partially open the valve.
2. Start the pump.
3. Open valve gradually to give full flow.
4. If the discharge is not clear, let the pump run until water clears. If water does not clear in 30 minutes, stop the pump and take the necessary steps to correct the condition. After the water has appeared clear, check for sand by discharging into a clean bucket or suitable container.
5. Close valve until maximum required system flow rate is obtained (this should correspond to the cut- in pressure of the pressure switch). Ensure that the output of the pump at this setting is not greater than the yield of the well. This can be checked by monitoring the well drawdown level and ensuring that the level is stable at the maximum required system flow rate.

If in doubt about the draw-down level of the bore, the use of level control by capacitance probes is recommended. The probe should be situated to switch the pump off when the bore water level drops within 1 metre of the pump suction.

Relying solely on a high-level probe to automatically turn the pump on is not ideal, as rapid cycling of the pump could occur causing severe damage to the unit.

Using the Run time / Stop time parameters in the NXT IPROTECT controller is an excellent solution.

PRESSURE SYSTEM INSTALLATION




When a submersible pump is to be used as a pressure system, it is critical to include a suitably sized pressure tank to prevent excessive pump starts.

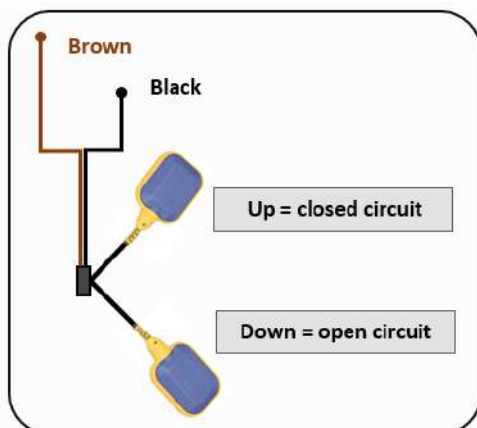
Set the pressure tank pre-charge to 2/3 of maximum system (gauge) pressure

CAUTION: If the available pump pressure at the bore head can exceed the pressure tank's maximum working pressure should there be a pressure switch failure, then a pressure relief valve should be fitted in the delivery line to prevent the tank being over pressurised. Use only nominal 30 litre draw off tanks or larger.

Do not at any time use smaller tanks. If cut out pressures exceed 5 bar (500 kPa, 73 psi) fit a 12 bar switch. Pressure switches operated outside their design working range can fatigue and cause pump and fittings failures and void warranty

18. Accessories

Image	Description	Part #
	Capacitance Probe	805321
	SK12(5M) H05 10 amp SK12(10M) H05 10 amp SK12(20M) H05 10 amp SK12(30M) H05 10 amp FSK1 (5m) H07 10 amp FSK1 (10m) H07 16 amp FSK1-20 (20m) H07 16 amp	700965 700962 700963 700964 809941 700610 700611
	BIA LOW LEVEL FLOAT SWITCH with 30m cable	808728
	Float switch counter-weight	700967
	Pressure switch (NC) 6 bar Pressure switch (NC) 12 bar	701440 701380



3 wire' floats allow for NO or NC wiring.

Connecting to the controller using the black and brown wires the circuit is closed when the float is up, open circuit when the float is down

19. Trouble Shooting Guide

Symptom	Possible causes
Overload protection trips	Hydraulic overload Low voltage supply to motor Excessive motor starts Water logged pressure tank
No water delivered	Broken pump shaft or coupling Check valve installed backwards or check valve stuck closed Inlet screen clogged Water level too low in well Hole in delivery pipe below top of bore
Low water delivery	Fittings preventing check valve opening fully Pump rotation backwards Water level too low in well Discharge pipe clogged, corroded or ruptured Inlet screen partially clogged Worn pump Leak in outlet pipe below top of bore Check valve stuck partially closed
Pump doesn't shut off	Pipe ruptured Defective or improperly adjusted pressure switch Water level too deep for pump. Check selection Pump is air or gas bound Worn pump Pipe obstruction
Pump starts and stops too often (i.e. more than 5 per hour)	Faulty pressure switch, Pressure switch differential adjustment failure Pressure tank is too small or tank has lost pressure
Electric shock from water pipe Note: A motor down to earth or defective cable will not cause a shock.	Defective (grounded) incoming power leads Earth wire connections incorrect
Pressure gauge oscillates, flow surges (snoring)	Water level too low in the well. (Flow through pump greater than flow into well)
Electrolysis on motor and/or pump	Insufficient earthing / earth leakage Broken earth wire

20. Warranties – Terms and Conditions

This warranty is given in addition to the consumer guarantees found within the Australian Competition and Consumer Act 2010 (Cth) for goods purchased in Australia and the Consumer Guarantees Act 1993 NZ for goods purchased in New Zealand:



1) White International Pty Ltd / White International NZ Ltd (White International) warrant that all products distributed are free from defects in workmanship and materials, for their provided warranty period as indicated on the top or opposite side of this document. Subject to the conditions of the warranty, White International will repair any defective products free of charge at the premises of our authorised service agents throughout Australia and New Zealand if a defect in the product appears during the warranty period. If you believe that you have purchased a defective product and wish to make a claim under this warranty, contact us on our Sales Hotline on 1300 783 601, or send your claim to our postal address or fax line below and we will advise you as to how next to proceed. You will be required to supply a copy of your proof of purchase to make a claim under this warranty.

2) This warranty excludes transportation costs to and from White International or its appointed service agents and excludes defects due to non-compliance with installation instructions, neglect or misuse, inadequate protection against the elements, low voltage or use or operation for purposes other than those for which they were designed. For further information regarding the suitability of your intended application contact us on our Sales Hotline on 1300 783 601. If you make an invalid claim under this warranty, the original product will be sent back to you unrepai red.

3) This warranty refers only to products sold after the 1st January 2012, and is not transferable to another product type and only applies to the original owner, purchaser or end user, and is in addition to the consumer guarantees found within the Competition and Consumer Act 2010 (Cth) for goods purchased in Australia and the Consumer Guarantees Act 1993 (NZ) for goods purchased in New Zealand.

4) Our goods come with guarantees that cannot be excluded under the Australian Consumer Law. You are entitled to a replacement or refund for a major failure and for compensation for any other reasonably foreseeable loss or damage. You are also entitled to have the goods repaired or replaced if the goods fail to be of acceptable quality and the failure does not amount to a major failure. 2 YEAR WARRANTY.

5) To the fullest extent permitted by law, White International excludes its liability for all other conditions or warranties which would or might otherwise be implied at law. To the fullest extent permitted by law, White International's liability under this warranty and any other conditions, guarantees or warranties at law that cannot be excluded, including those in the Competition and Consumer Act 2010 (Cth), is expressly limited to: (a) in the case of products, the replacement of the product or the supply of equivalent product, the payment of the cost of replacing the product or of acquiring an equivalent product or the repair of the product or payment of the cost of having the product repaired, is at the discretion of White International or a 3rd party tribunal elected under the Competition and Consumer Act 2010 (Cth) for goods purchased in Australia and the Consumer Guarantees Act 1993 (NZ) for goods purchased in New Zealand; and

6) To the fullest extent permitted by law, this warranty supersedes all other warranties attached to the product or its packaging.

7) In the case of services, supplying the services again or the payment of the cost of having the services supplied again, is at the discretion of White International or a 3rd party tribunal elected under the Competition and Consumer Act 2010 (Cth) for goods purchased in Australia and the Consumer Guarantees Act 1993 (NZ) for goods purchased in New Zealand. 8) Our warranty commences from the date of purchase of the above mentioned pumps. Proof of purchase is required before consideration under warranty is given.

Record your date of purchase in the space below and retain this copy for your records.

Date of Purchase**Model Purchased**



www.whiteint.com.au

www.whiteint.co.nz

Please always refer to our website for further technical information & new product innovations

Disclaimer: Every effort has been made to publish the correct information in this manual.
No responsibility will be taken for errors, omissions or changes in product specifications.

© 2024 Copyright White International Pty Ltd

TM ® - WARNING: Please be aware that various brands & products depicted within this document are subject to trademark, patent or design registrations. Infringement of any intellectual property contained within this document without express written authority by the appropriate intellectual property holder may result in further legal action to be taken. For any queries regarding use of the contained information please feel free to contact White International Pty Ltd.