

Care and Maintenance of the Petticrow Electric Pump system

Problems with Petticrow electric pump systems are usually easily diagnosed and fixed.

Following the simple instructions below can help maintain and keep your electric pump in good working order.

All pumps and batteries are tested prior to fitting in the workshop.

The most common causes of failure are:

- 1.FLAT BATTERY
- 2.CORRODED PLUG TERMINALS
- 3.BLOCKED IMPELLER or/PIPE
- 4.AIRLOCK IN PUMP

RECTIFYING PROBLEMS

Red and green lights

1. Flat Battery

Pump making no noise, and not functioning.

Check charge on battery.

The charger plug that connects the battery to the mains electricity supply has red and green indicator lights.

When connected to the mains power

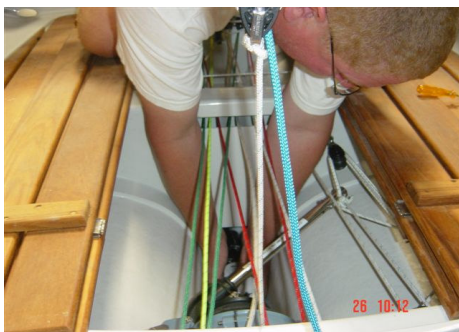
RED LIGHT—Indicates battery flat and charging required

RED and GREEN lights together—Indicate battery 95% charged

GREEN LIGHT—Indicates battery fully charged.

Charging can take up to 24 hours if battery is fully flat.

Overnight charging will normally give 95% charge.



Removing the electric pump from under the floorboards

2. Corroded Plug terminals

Pump has reduced power, or no power

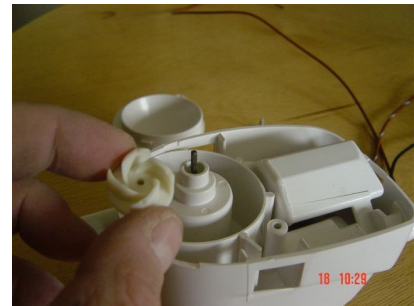
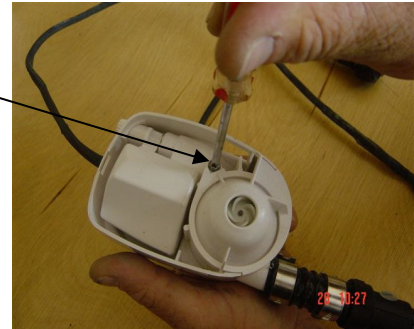
Corroded plug terminals initially create a reduction in voltage reducing the power to the pump.

Badly corroded terminals can completely prevent power from reaching the pump



To prevent terminal corrosion.
 When possible disconnect plugs, wash with freshwater and dry when not in use.
 A small squirt of moisture repellent spray on the terminals
 Eg. WD 40 will help to prevent corrosion.

Unscrewing the impeller housing



3. Blocked Impeller.

You can hear the pump working but little or no water coming from outlet.

The Impeller is partially or completely blocked.

Cause. Food wrappers, water bottle label, fluff that comes off ropes etc.

Prevention of blockages

Make sure bilge is kept clean and free of debris. After using the boat, when washing out, disconnect electric pump. Wash boat, and pump bilge dry using the main manual pump. The main pump has the capacity to pump out debris which would block the electric pump.

To clear the impeller you will need to remove the electric pump, unscrew the impeller housing, remove blockage. It is possible to remove the impeller by pulling on the shaft. Re-screw housing, ensuring the location tab is correctly aligned.



Undo hose clamp and flush through water in the direction of flow.

Blocked pipe

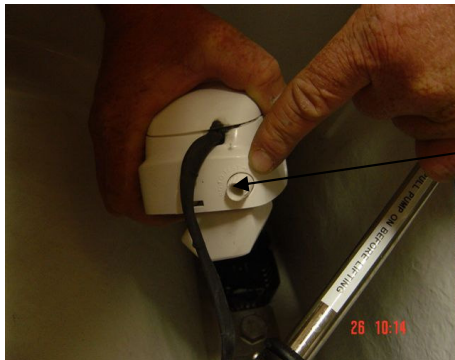
If you think the pipe is blocked under the hose clip and flush the pipe with water in the normal direction of flow.

Do not force water through the pipe from the water outlet. This will cause damage to the one way valve within the pump

4. AIR LOCK IN SYSTEM

If there is water in the bilge, the pump is making a noise but no water is coming through, and you have checked for an impeller blockage It indicates there is an airlock in the system.

This is most common when the boat has been standing for some time.



Serrated knob on side of pump

The system can be primed by turning the serrated knob on the side of the pump several times. There should be a change in noise from the pump and it should start working.

If this does not solve the problem the pump can be unclipped from the housing and shaken to disperse the airlock.