

SSV2D INSTRUCTIONS

INSTALLATION INSTRUCTIONS

CONTROLLER MOUNTING:

Find a suitable location to mount the control box. Ideally, as with all pool equipment it should be installed out of direct weather and no closer than 3m from the waters edge. Lift up the two mounting tabs and use two appropriate screws to mount the control box to the wall, keeping in mind that the power cable is 1.8m long and should be plugged directly into a general power outlet, not into extension leads.

POOL SENSOR:

For stand alone systems with separate suction and return, the pool sensor must be fitted into the suction line of the solar pump preferably in a position out of direct sunlight. It is recommended that a 14.5mm hole be drilled in the PVC pipe; this can be carried out using a 14.5mm drill-bit spinning in a counter clockwise direction to minimise the chance of shattering pipe. The sensor plug is to be fitted to the left hand socket.

ROOF SENSOR:

The roof sensor end must be fitted in a small piece of solar collector or equivalent and attached to the roof. Best locations are within arms length of the gutters edge of the house or shed as long as the sensor end is not shaded and is on a roof of similar aspect of the main collector run, it must not be fitted on top of the solar collector. Keep in mind that it is of the utmost importance to keep the roof sensor as short as possible as this will assist in the longevity of the sensor and controller in the event of electrical storm activity and power surges. Sensor cables must not be run parallel to power cables and run lengths should be less than 50m. Cable ties should be used to fasten the sensor cable to the cold water inlet pipe making sure that the ties are away from PVC fittings. Cable ties should be tightened firm but not too tight to damage the cable.

If the cable is to be run under ground a conduit must be used to protect the wire and there is to be no cable joins within, ends of conduit must be sealed to prevent water ingress. **Any excess cable should be removed and re-fitted ensuring that the wire ends are tinned with solder.** The sensor plug is to be fitted to the right hand socket.

NOTES:

All excess cable must be removed; coils of cable are not permitted under any circumstances. If the cable is to be extended with non genuine cable a size of 14/020 should be used. **Any cable joins must be soldered and this includes where the cable enters the terminal block at the case base.** Heat shrink is to be used over soldered joints to eliminate moisture ingress.

Cable polarity must be observed as incorrect polarity will show an error as stated in 'fault diagnosis'. Once cables have been correctly fitted the unit can be turned on.

OPERATING INSTRUCTIONS

AUTO Summer Mode is normal operating mode used during the pool swimming season. You may set the desired pool limit by pressing the UP or DOWN buttons. The display shows the pool temperature then flashes the limit setting and light; the pump light and pump will be on when solar gain is available.

MANUAL Mode is used to prime, clean or test the pump. To select manual mode press the SELECT button until the PUMP/MAN light is illuminated. The pump will then start, or stop if it has been running. To return to normal run simply press the SELECT button until the AUTO light is illuminated. The SSV2D will automatically return to AUTO run after 30 minutes, with a limit of 30 degrees.

ROOF Mode displays the roof sensor temperature, a hot roof indicates that solar gain (heating) is available, if left unattended in this mode the SSV2D will automatically return to AUTO run after 3 minutes

WINTER Mode should be selected when the pool is not being used for extended periods. The pump will be turned on for 3 minutes every day at the same time Winter Mode was selected. This will assist in the systems off-season maintenance and save energy. To enter this mode press the SELECT button until the WINTER light is illuminated.

TROPICAL Mode is used to assist in cooling over heated pools. If the limit has been reached, which is indicated by the limit light on, and the roof temperature drops below the limit temperature (usually some time late at night) the pump will turn on and pump pool water to the roof to cool it down. The pump will turn off when the pool water is cooled to the limit setting. To set this function press the SELECT button until the TROP light is illuminated. To switch back to Summer Mode press the SELECT button until the AUTO light is illuminated.

OPERATION:

The SSV2D will turn the pump on when the roof temperature is higher than the pool (pipe) temperature by 8°C and off at 4°C. When the pool temperature reaches the limit setting the limit light will flash, it will remain in this state while the roof is hot to prevent over heating the pool. The SSV2D will then wait for night time to pass and the roof to reach 40°C the next day to start the process again, this is to prevent the solar starting too early in the morning. If the roof does not achieve 40°C the following morning the system will break out of its hold mode 12 hours from when the pool first reached limit. These functions are to minimise the pool from overheating, hence reducing water evaporation and consumption of chemicals. An auto flush program is incorporated to ensure accurate pool temperature readings are obtained as the pool sensor is normally located well away from the actual swimming pool and may sit in direct sunlight or in warm enclosures, the last recorded pool temperature will be displayed for 6 hours from when the pump was last running. When auto flush is in wait mode the limit light will be on constant until the pump is turned on for a three minute test, the pump light will flash until this test is over.

FAULT DIAGNOSIS:

In the event of a cable or sensor failure, the display will indicate the type of failure as follows;

ROOF SENSOR

A display of 99 indicates a broken or disconnected sensor cable or open circuit sensor.

A display of 88 indicates wrong polarity connection or short-circuited cable or sensor.

A display of 89 indicates a high sensor reading out of normal operating range.

A display of 00/03 indicates an over extended or coiled sensor cable.

POOL SENSOR

A display of 77 indicates a broken or disconnected sensor cable.

A display of 66 indicates wrong polarity or short-circuited sensor cable.

A display of 67 indicates a sensor reading out of normal operating range.



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WARRANTY - SSV2D

This range of product is covered by a limited 3 year warranty against component failure or faulty workmanship from the date of installation.

A faulty unit should be returned in the first instance to the dealer from which the unit was purchased.

Damage to the unit due to misuse, power surges, lightning strikes or installation that is not in accordance with the manufacturer's instruction may void the warranty.

Warranty does not cover travel costs to or from installation site.

Return to supplier for repair

Customer Record (to be retained by the customer)

Dealer/Installer Name: _____

Model Number: SSV2D _____

Serial Number: _____

Date Installed: _____

For service assistance phone 1300 130 693

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