

# PLASMATRONICS REGULATOR INSTRUCTIONS

For installation of a solar panel and battery with the RotaLoo composting toilet

The PR1210 is a simple two stage regulator for charging lead acid batteries from photovoltaic panels. The full available charge current is allowed to flow into the battery until the battery voltage rises to the boost maximum. The battery now being fully charged, the unit switches to the float mode. The current is switched off and the battery voltage slowly falls. When it drops below the float cut in, the current is switched on again. It stays on until the voltage rises to the float maximum and is then turned off. The battery voltage will

slowly oscillate between the float maximum and cut in.

When the battery has been discharged enough for it to fall below the boost cut in, the unit will switch back into the boost mode. The PR1210 uses a rugged power mosfet and switches on the negative side.

Solar positive connects either direct to the battery positive terminal or to the bat+ on the regulator. The unit does not contain a reverse blocking diode.

