

Newton Pump Controller

Twin Pump Controller With Alarm

Rev 2 - 9th December 2024

Code: CP9

INTRODUCTION

The Newton Pump Controller is designed to be used with matched pairs of manual versions of [Newton Pumps](#) of 250 watts to 750 watts, and provides a sophisticated yet simple to install, twin-pump control system.

The major feature of the control system is the self-diagnostic program, this operates both pumps on a weekly basis to ensure that they are not stood idle for extended periods so as to prevent seizure and premature pump failure. Each pump will operate for 5 seconds, (one after the other) once per week.

The Newton Pump Controller will operate manual pumps to a maximum power of 750W 230V AC. The panel is supplied with two vertical water level float switches and High Water Alarm float switch. The panel is designed to be used with an optional [Newton Victron Battery Backup System](#), sized to suit the pumps and installed with sufficient battery power to ensure continued pumping during power outages.

KEY BENEFITS

- Two independent power supply inputs - One for grid mains and the other for either grid mains or inverter mains a Newton Victron Multiplus Inverter
- Automatic pump duty assist
- As well as the panel's audible alarm, an alarm output is sent to the Newton Cloud* or home BMS for remote monitoring and notification
- Automatic alarm float checking - An alarm checking signal is continually monitored to confirm the alarm float cables have been fitted correctly, not been tampered with or disconnected
- Automatic testing of each pump every 7 days
- Test Button - Both pumps can be started from the panel for testing
- Dual power alarm - The alarm is powered under normal circumstances by 230V mains and by internal 9V battery during power outage
- Alarm sounder mute
- Pump operations counter

*Available December 2024

ASSOCIATED PRODUCTS

- Newton NP, CP and TAS pumps
- Newton [Titan](#), [Titan-Pro](#) and [Trojan-Pro](#) pumping systems
- Newton Victron Battery Backup power systems
- Batteries: Fiamm FIT Range Batteries: 40ah, 60ah, 101ah, 201ah
- Newton Cloud pump notification and monitoring systems

SPECIFICATION

Newton Waterproofing Systems work in partnership with RIBA NBS who publish our products on [NBS Source](#). The platform integrates seamlessly into project workflows, providing all product data from Newton's BIM Objects, NBS Plus Clauses and RIBA Product Selector into one single source of product information.

NBS Source also hosts a large selection of Newton [case studies](#), as well as product [literature and certifications](#).

Our website also has a range of both PDF and DWG drawings available for download in [Technical Drawings](#).

TRAINING & COMPETENCY OF USER

The control panel is designed to control the pumps within Newton CDM System, a professional fit waterproofing system. It is installed by contractors trained by Newton Waterproofing in the correct specification and installation of the product, as part of a coordinated approach to the waterproofing of the structure. In many cases, this will require further waterproofing products in order to achieve the required habitable grade as defined by BS 8102:2022.

Electrical installation should only be undertaken by qualified personal.



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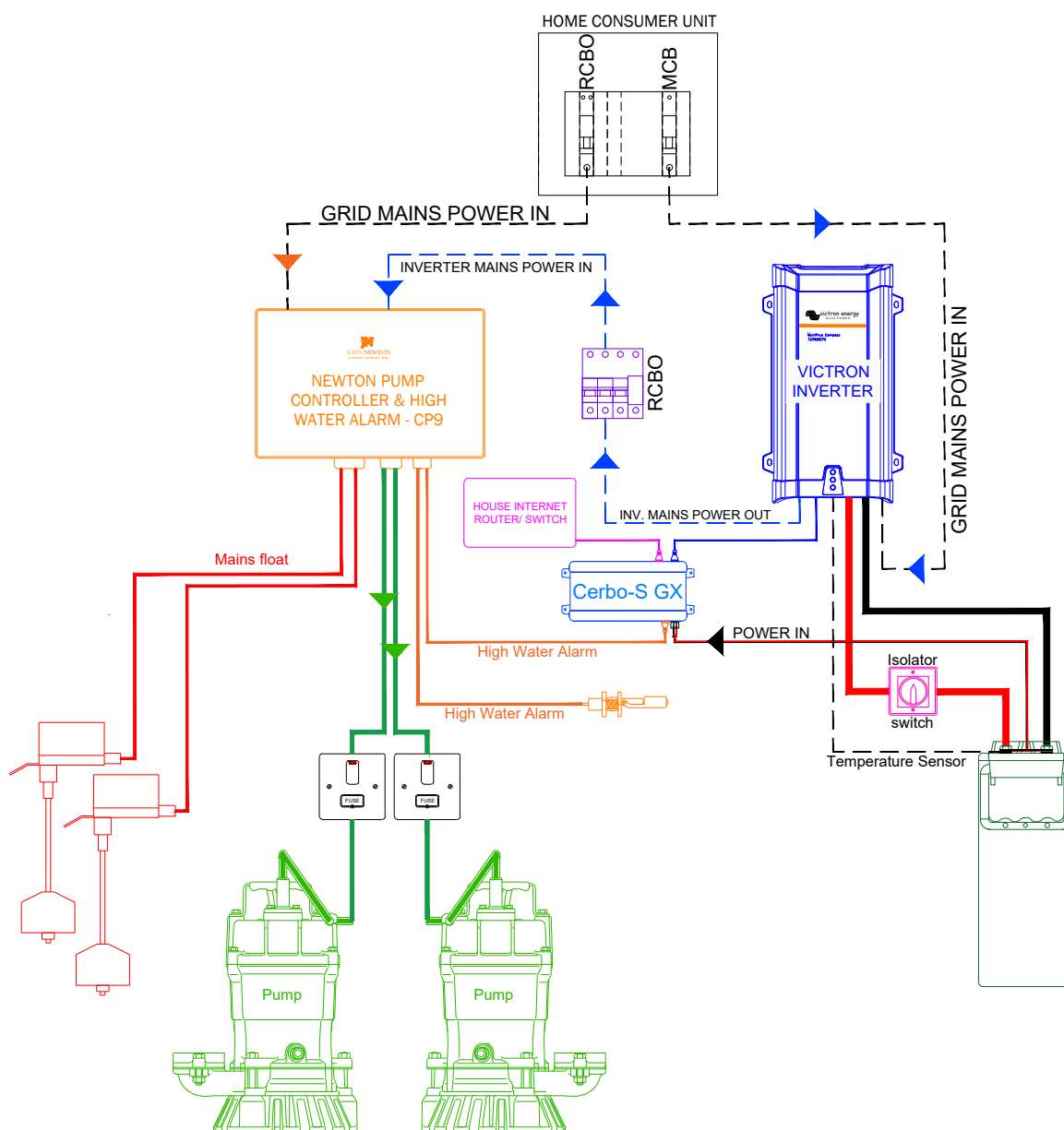
Twin Pump Controller With Alarm

TECHNICAL DATA

Features	Result	Units
Width	300.0	mm
Height	200.0	mm
Depth	80.0	mm
Weight	2.31	kg
Power supply (2 No.)	230	volts
Sounder volume at 1000 mm	90	dB
Switch Type	Vertical (Pumps) & Reed (Alarm)	

TYPICAL DETAIL

Provides full control, monitoring and telemetry capabilities to Newton pumps and Newton pumping systems of up to 750W. The drawing below shows a typical setup where the control panel is connected to two pumps and a Newton Victron Power Inverter for battery backup protection.



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BATTERY BACKUP

The Newton Pump Controller has the ability to receive two power supplies; grid mains and inverter mains from a correctly sized Victron Battery Backup System. The Power Inverter should be sized with matched pairs of manual Newton pumps as follows:

INVERTER SIZING & PUMP MATCHING

Newton Pump	Inverter Model	Recommended battery size Ah
TAS250	MultiPlus 12/500/20	60-300
CP400	MultiPlus 12/800/35	100-400
NP400 <i>eco</i>	MultiPlus 12/800/35	100-400
NP750 <i>eco</i>	MultiPlus 12/1600/70	200-700

Further information on battery sizing can be found on the Victron data sheet.

INVERTER SIZING & NEX-CDM PANEL MATCHING

Newton Pump	Inverter Model	Recommended battery size Ah
2x TAS250	12/2000/80	100-400
2x CP400	12/2000/80	100-600
2x NP400 <i>eco</i>	12/2000/80	100-600
2x NP750 <i>eco</i>	12/3000/120	200-1000

WARRANTY

The Newton Pump Controller is supplied with a one-year back to base warranty which is dated from either the date of purchase or a proven date of installation. If the unit develops a fault during the warranty period, Newton Waterproofing Systems Ltd will repair or replace the unit under warranty. Contact the Newton sales office for a returns form which explains the returns procedure. The warranty will be invalidated if the unit is damaged because of improper handling, storage or installation, and in such cases a repair charge may be applicable.

PACKAGING & HANDLING

The Newton Pump Controller is supplied in a reinforced and protective cardboard box. Please handle with care.

OPERATION MANUAL

Please see the [Operational Manual](#) supplied within packaging (also available in downloadable format from our website).

LIMITATIONS

- Not suitable for use with pumps of over 750W
- Must be housed inside a dry environment

STORAGE

Store in dry conditions at temperatures between +5°C and +35°C. Do not expose to freezing conditions.

HEALTH & SAFETY

Use appropriate PPE. Use products only as stated within this Data Sheet and Operational Manual. Only trained and qualified professionals should undertake electrical installations.

Newton Waterproofing Systems reserve the right to update product literature at any time. Please always refer to our [website](#) for the latest versions.