# Charge Mate Pro 40



Product code: 83304002



### Current limited electronic charge relay with high efficiency and reverse current

#### protection

A secondary battery on board requires a dedicated charging solution. The Charge Mate Pro makes it possible to distribute the charger or alternator current effectively between two battery banks such as a starter and a service battery. The Charge Mate Pro connects both batteries during charging and keeps them isolated when discharging. This significantly reduces the risk of a flat starter battery for example.

The Charge Mate Pro offers an additional advantage over mechanical charge relays, by limiting the charge current to the second battery. The primary battery, like a starter battery, is therefore charged with priority. The return current is automatically blocked even when the secondary battery has a higher voltage. An emergency start function is possible by connecting an optional bypass switch to the Charge Master Pro.

A marine application example is the connection of a bow thruster battery to a service battery. The Charge Mate Pro ensures that the service battery is always charged with priority. The blocking of the return current from the bow thruster battery guarantees that the bow battery remains charged while the current limiting also prevents power dips of the onboard electrical network.

The Charge Mate Pro series consist of a 40 Amp and a 90 Amp version, both suitable for charger or alternator applications.

Charge Mate Pro: for controlled charging from a single source.

## **Applications**

Leisure and professional marine and mobile applications. An effective solution for high power demand on board and/or the need of prioritised or current limited charging.

#### **Features**

- · Electronic charge coupling with very low voltage drop.
- · Makes effective dual charging possible.
- · Suitable for charging from AGM/GEL starter batteries to AGM/GEL/Lithium service batteries.
- · Charge current secondary battery limited to 40 A.
- · High system reliability by prioritised charging of the main battery.
- · Unidirectional which blocks return current under all circumstances.
- · Prevents power dips of the onboard electrical network.
- · Suitable for all kinds of chargers and alternators.
- · Monitoring with LED status indication.
- · IP65 electronics in a corrosion resistant casing with aluminum heat sinks.
- · Fast and easy installation.



# **Specifications**

### **General specifications**

Monitoring

Output current

Number of battery outlets

Input voltage range

Parallel configuration Battery voltage

Remote switch functions

Dimensions, hxwxd

Weight

Compliance

**Technical specifications** 

Connection possibilities

Power consumption

Battery types

Switch on voltage

Switch on delay Switch off voltage

Switch off delay

Relay

Temperature range (ambient temp.)

Protection degree

LED (warnings and status indication)

limited to 40 A

2 9-32 V

yes

automatic 12/24 V detection

on, off, auto, start assist

157 x 140 x 80 mm

6.2 x 5.5 x 3.1 inch

0.88 kg

1.9 lb CE

3 x fast-on connectors (switch, ground and status) o switch: for an optional single pole ON-OFF-ON switch for remote operation o status:

for an optional LED indicator

switch open: < 1 mA at 12/24 V DC

Suitable for charging from AGM/GEL starter batteries to all types of batteries (for lithium starter battery applications, please use 83304004)

13.5 V (12 V) / 27 V (24 V)

5 sec

12.75 V (12 V) / 25.5 V (24 V)

2.5 sec

electronically (mosfets with low voltage drop of max 0.2 V)

-40 °C to 60 °C

-40 to 140 °F

IP65

