# Mass Combi 12/1600-60 Remote (230 V)



Product code: 36011601





A Mastervolt Mass Combi offers best price/quality ratio. The exceptionally reliable Mass Combi series offers a lot of power at a highly competitive price. In addition, the four models are also available in two customer-friendly variations with remote control or MasterBus.

The powerful 3-step+ battery charger guarantees maximum battery life and can simultaneously charge two battery banks. The inverter with high peak power starts even the heaviest loads, with the Mass Combi 12/1600 being easily sufficient for your espresso machine. A built-in distribution system switches between grid and inverter power, while two separate AC outputs allow users to connect critical loads to a preferred group.

### Grid connected solar power system with energy storage

The Mass Combi enables the expansion of a grid connected solar power system with energy storage in batteries. This way the majority of the generated energy is used, and users are less dependent on the electricity grid. In this setup, the Mass Combi is part of a MasterBus controlled system.

#### **Benefits of the Mass Combi:**

- · Compact, lightweight and no hum thanks to HF technology.
- · High yield and more power from your batteries.
- · Intelligent 3-step+ battery charger with low DC ripple current for fast charging times and long battery life.
- · Charges two individual battery banks simultaneously.
- · Quiet, powerful inverter with 200 % peak power.
- · Power Assist: extra power assistance from the batteries in case of limited grid or generator power (prevents blown fuses).
- · Pure sine wave energy prevents failures and damage to sensitive equipment such as adapters.
- · Dual AC outputs to separate critical equipment from heavy loads.
- · Higher yields possible via parallel switching (only for 2200 and 2600 W models).
- · Professional connections ensure fast installation and operational security.
- · CE approved and E-marking for mobile applications.

#### Maximise your convenience with a Mass Combi package deal

Combi deal with MasterBus (MB version)

To integrate the Mass Combi into a MasterBus system in a simple manner, Mastervolt can deliver all Mass Combi models in a MasterBus version. The relevant product code includes the Mass Combi model of your choice, complemented by a MasterBus Combi interface MasterBus Combi interface.

Combi deal with remote control (Remote version)In addition, Mastervolt can provide all Mass Combi models in a Remote version so that the AC and DC power status can be monitored remotely. The relevant product code includes the Mass Combi model of your choice, plus an ICCICC and an APCAPC remote control panel.



# Specifications

#### **Specifications sine wave inverter**

Nominal DC voltage 12 V (10-15 V)

Output voltage 230 V (± 5 %), adjustable 180-250 V Output frequency 50/60 Hz (± 0.05 %), configurable

true sine, Thd < 2.5 % under standard conditions Output waveform

Continuous power at 25 °C / 77 °F, cos phi 1 1600 W 3000 W Max. peak load Max. efficiency >= 90 % Max. ripple on DC (battery at full load) < 5 %

No-load power consumption on DC (ON/inverter OFF/OFF/energy 9 W / 0.1 W / 0 W / 0.5 W

Parallel configuration no 3-Phase configuration no Synchronise with mains/generator yes

#### **Specifications battery charger**

Input voltage range 180-265 V Max. input current 4.5 A

Max. charge current at 25 °C / 77 °F 60 A at 14.25 V, adjustable

12 V Secondary charger output voltage 5 A Secondary charger output current < 15 W No-load power consumption on AC Battery temperature sensor ves, included

Battery voltage sense automatic compensation

## **Specifications transfer system**

AC input 1 50 A (25 A switched, to short break output)

AC output 1 25 A (short break output) AC output 2 50 A (power output) AC input fuse yes, resettable

Transfer speed half seamless (25 ms max., 10 ms typical)

Transfer voltage range 180-265 V Transfer frequency range 45-65 Hz

#### **General specifications**

Display/read-out LED display

Dimensions, hxwxd 371 x 318 x 143 mm 14.6 x 12.5 x 5.6 inch

Weight

Delivered with ICC remote panel and APC remote panel

Approvals CE, ABYC, E4

#### **Technical specifications**

3-step+ (IUoUo, fully automatic), Equalize Charge characteristic Battery types AGM/gel/MLI/flooded/spiral/traction

Recommended battery capacity ~ 120-360 Ah (based on gel batteries, may differ for other types)

Ground relay

yes, configurable -25 °C to 60 °C, derating > 25 °C

Temperature range (ambient temp.) -13 to 140 °F

Protection degree IP23 (vertical mounting) Safety class IEC protection class I

conformal coating, max. 95 % relative humidity, non condensing **Humidity protection** Protections over temperature, overload, short circuit, high/low battery voltage

maintenance-free vario fans

yes



Cooling

Power Assist

yes, in combination with a MasterBus Combi Interface

MasterBus compatible

