

INSTRUCTIONS (GB)

ZE 3200W



ZE Charger

User Instruction

- Read this instruction before the charger is taken into use.
- Keep this manual within easy reach for the user of this battery charger
- Hydrogen gas will be produced when charging lead-acid batteries and hydrogen gas is explosive.
- Open flames and sparks should be kept away from batteries they may produce explosions.
- The charger should be switched off before the charger/battery plug is disconnected.
- It is related with real danger to touch any parts inside the charger. Do not do any repair work with the main switch ON and to be real sure disconnect the mains connector.

General

The ZE Charger is suitable both for Freely Ventilated- (Wet) and Valve Regulated- (Dry) lead/acid batteries. The charger is small and is very light (8 kg.) and can therefore easily be fitted close to the battery. (The charger can be delivered with program compensating for the equipment base load.)

The charger operates in high frequency and should be connected to a standard 230V mains connection with ground. The built in micro controller controls the charging process according to the chosen charging algorithm. .

During charging the charging progress is displayed with a status indicator LED on the front panel. The micro-controller is also controlling the charging progress with regards to temperature in the charger and time. If a fault occurs in some cells or the temperature rises the charging current will be limited. If you have a special requirement of charging algorithm or application, please contact ZEPIA Energy ApS

Installation

The ZE Charger is mainly suited for indoor use.

It can be used positioned horizontally on a table or a shelf, hang on a wall using the free supplied bracket or as a built-in charger in the vehicle or machinery. When it is built in it has to be shock absorbed.

The charger can be with fixed connection to the battery or with conventional connectors.

Position the charger in such a way that the air supply will not be obstructed.

When the charger is fitted on a wall or mounted in a vehicle it should be horizontal to limit dust and moisture to enter it.

Function

Check that battery type and size correspond to the setting of the charger. Also check that the polarity between the charger and the battery is right. Positive + to positive + and negative – to negative -.

Connect the battery to the charger and switch on the charger.

The charging starts after a few seconds and the status indicator, **Orange LED**, is lit up.

Orange LED remains on until the battery is fully charged. If the charger is connected to a fully charged battery the charger will be charging for 1 hour. This is the minimum charging time.

Green LED, is lit up when the battery is ready to be used.

Maintenance charging will continue as long as the battery is connected.

The charging time depends on the size of battery and the depth of discharge.

A freely ventilated battery (Wet) can be discharged to max. 80% and a valve regulated (Dry) with max 70%.

OBS: Switch off the charger before the battery is disconnected. If the battery is disconnected without switching of the charger, sparks may be produced.

Trouble shooting and service

RED flashing LED

may mean that the battery is not properly connected.
Check cables, connection terminals, plugs and other connections to the battery.
Rectify if possible.
Measure the voltage at the battery and at the charger.
If the connecting points and the voltage is correct, contact **ZEPIA Energy** for consultation.

Technical data

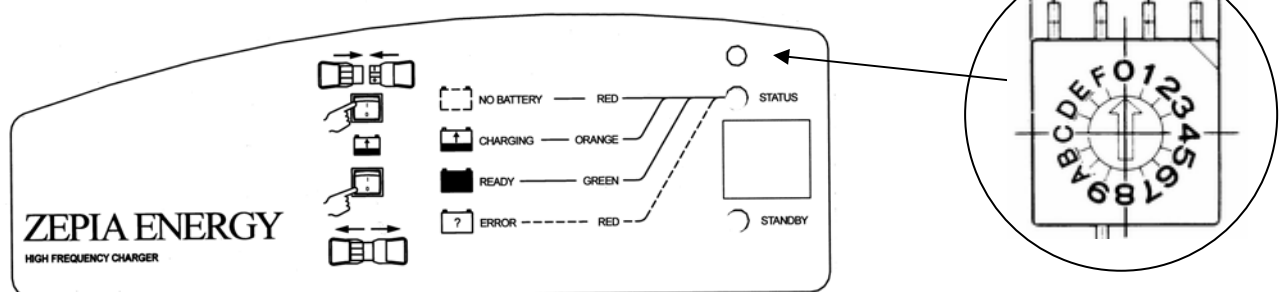
Size: L 415 x B250 x H 85 i mm
Weight 8Kg
Ambient Temperature: -25 °C - +40 °C
Mains Voltage: 90 Volt - 255 Volt AC, 45 Hz - 400 Hz (<200V will mean limited effect)
Power Factor: ~1
Rated Voltage: 12 Volt, 24 Volt, 36 Volt 48 Volt DC
Rated Current: 12V/200A, **24V/125A**, 36V/80A 48V/64A 72V/40A 144V/18A

Protection: 1, IP 21 (when fitted horizontally) Available in IP44.
General: Temperature controlled cooling fan.
Protected against wrong polarity and short circuit
This charger can be used as a voltage supply. (Special program)
CE-certified in accordance with valid EN-standards.

Charging algorithms

The ZE Charger is designed for freely ventilated and valve regulated batteries. All chargers are equipped with app. 15 different charging curves. Chargingalgorithm enclosed.

Adjustment switch



Every charging algorithm covers a specific battery capacity, which means that faulty adjustment will have an impact on the battery lifetime.

When ZEPIA Energy ApS is informed of battery capacity and type the charger will be delivered with the correct setting.

If you change to another type or size of battery, please contact ZEPIA Energy ApS for change of charging algorithm.

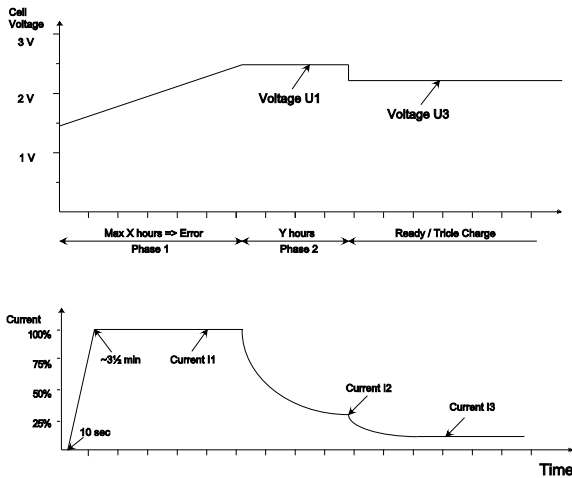
If the wrong algorithm is chosen the warranty will be void.

Modular connectors

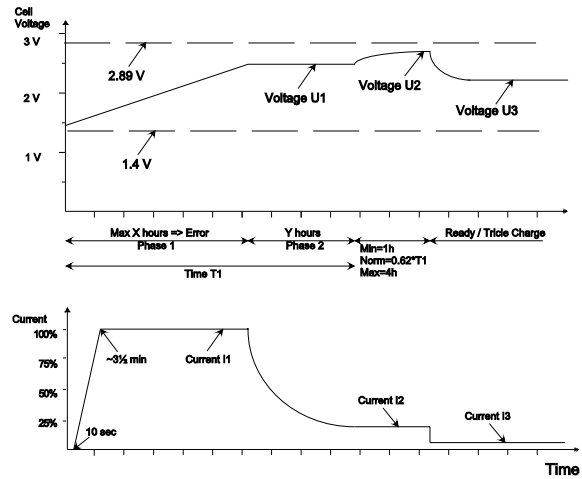


Modular connectors for the Temp and voltage sense are located beneath the DC cables. Terminal 4 Temp/Voltage sense (Terminal 1 & 2 don't used)

Standard, IUoU



Traction, IUIU



Charging characteristics according to chosen software version and switch position.

Accessoires for ZE Chargers

Temp / Voltage sensor, Remote display, Distribution relay-EDR

CE and Euronorms:

EN 60 335-2-29(1991) +A2(1993) EN 55022 Class B, EN 61000-3-2, EN 61 000-3-3
 EN 61 000-4-2, EN 61 000-4-4, EN 61 000-4-11, ENV 50 140, ENV 50 204

NOTE: Chargers that are ordered with setting "0" will only function when the correct setting according to battery capacity and type is done.

Achtung: Ladegeräte, die mit Einstellung „0“ bestellt werden, funktionieren erst nach Einstellung der richtigen Batterieleistung.

Attention ! Les chargeurs commandés avec le réglage « 0 » ne fonctionnent qu’après le réglage correct de la capacité de la batterie.

ATENCIÓN: Los cargadores que fueron solicitados con la configuración “0” funcionan recién después de ajustar la capacidad correcta de la batería.