enersense

Next generation high-power DC-charging station

Next generation high-power DC-charging station ECDC 160 kW is stylish, modular, and suitable for both professional and public charging. One ECDC station charges two electric vehicles simultaneously (2 x CCS2). Adaptive voltage range of 200−920 V enables also heavy equipment charging.

Modular power distribution in 40 kW steps. Can also be supplied with 80 kW power output. By pairing multiple charging stations, an intelligent DC minigrid is created. The total available output power is dynamically distributed among the EV's being charged, optimizing the charging time, while also taking into account the EV's charging intake capability. In an intelligent ECDC charging solution, the total power of the site is available from each charging plug (taking into account the performance of the 400 A cable). Additional booster power unit can be used for increasing the total power of the charging site (max. 640 kW per booster).

ECDC charging stations are delivered ready-for-use. Easy installation and commissioning minimises set-up costs. Charging stations can be branded to wished visual outlook.

Output power

160 kW

Charging standards

2 x CCS2

Adaptive voltage range

200-920 V

Key features

- Adaptive voltage range 200–920 V
- Dynamic load balancing and power distribution
- Touch screen
- LED lighting
- Cable management
- MID-certified DC meters
- Bankcard/RFID/NFC reader
- Concrete foundations

Applications

- Service stations, highway rest stops, travel plazas, and high turnover parking areas
- Retail & grocery outlets, and shopping malls
- Sport, culture, and recreational sites
- Business and industrial parks
- Offices, hospitals, and various communal sites
- Logistics terminals and fleet charging depots

24/7 portal

- Charging station management tool (2024)
  - Usage data
  - User identification
  - Activation/deactivation/rebooting
  - Setting opening hours, setting prices
  - Other functionalities
- Different "dashboard" views and functionalities for different user groups

Back-end integration

- Flexible integration to the selected back-end via API/OCPP (1.6/2.0)

Remote support

- Technical help-desk for the CPO/station owner and Service Partner
- Software updates

Technical information

General specification

Environment	Indoor / outdoor
Operating temperature	-35 ℃ to +40 ℃
Input AC power connection	3P (250 A) + N + PE
Input voltage range	400 V +/-10%, 50 Hz
Efficiency	Maximum 96,5%
Data connection	4G modem / Ethernet
Protocol	API/OCPP (1.6/2.0)
Protection	IP54 / IK10
Dimensions (D x W x H)	700 mm x 600 mm x 2030 mm
Weight	320 kg
Charging standards	2 x CCS Combo2
Maximum output power	160 kW
Maximum output current	500 A
Output voltage range	200–920 V
Cable length	5 m (optionally up to 10 m)

MADE IN FINLAND