



**SICHARGE D – DYNAMIC CHARGING FOR FUTURE EMOBILITY**

# Technical Data Sheet

**Version: 2.0**

**Date: 17.12.2021**

**Reference: 8EM5907-0AA00-2AA7.04**

Overview	
Charger type	DC fast Charger incl. optional AC charging function
Product family	Siemens SICHARGE D
Total installed DC power	160 kW up to 300 kW

Environment and Operating Conditions	
Application area	Indoor or outdoor
Operating temperature	-25°C up to +55°C (derating might be applicable)
Storage temperature	-40°C up to +60°C
Humidity	< 95 % relative humidity - non condensing
Operating altitude	≤ 2000 m
Pollution degree	3
Protection rating	IP54, IK10
Corrosion class	C4-M/C5-L acc. ISO 12944
Coating	Anti-Graffiti in RAL 9006
Operating noise level full load	< 65 dB <sub>A</sub>
Operating noise level silent mode <sup>1)</sup>	< 50 dB <sub>A</sub> (configurable)

Installation	
Mounting	Stationary, on foundation or floor
Dimensions (HxWxD)	2300 x 845 x 820 mm
Footprint (WxD)	680 x 620 mm
Weight	540 up to 820 kg

Grid Connection	
Grid type	TN-C, TN-S or TT (permanently connected)
Grid connection	TN-S: up to 2x(5x185 mm <sup>2</sup> ) or 1x(5x300 mm <sup>2</sup> ), TN-C/TT: up to 2x(4x185 mm <sup>2</sup> ) or 1x(4x300 mm <sup>2</sup> )
AC input voltage	400 V AC +/-10 %
AC input power	170 up to 340 kVA
Rated frequency	50/60 Hz
THDi	< 3 %
Power factor	> 0.99
Efficiency	> 95 % (rated), > 96 % (peak)
Standby power consumption	260 W
Incoming metering	Yes

1) Derating possible due to ambient conditions

DC Outlets	
Number of outlets at Charger	2x DC cable
Cable length	3.1 m or 5.0 m
Outlet configuration	CCS2/ CCS2 or CCS2/ CHAdeMO 1.2
Max. charging power	300 kW DC <sup>2)</sup>
Output currents - CCS2	250 A, 400 A (peak), 500 A (liquid cooled cable) <sup>2)</sup>
Output currents - CHAdeMO	125 A, 200 A
Output voltage range	150 ... 1000 V DC, (LV Mode: 150 – 500 V, HV Mode: 400 – 1000 V)
Output current	Up to 500 A (Trickle Charging)
Number of external Dispenser ports	Up to 2
Max. output current per Dispenser	500 A
Power upgradable	Up to 300 kW (20 kW increments)
Dynamic power allocation (DPA)	Between DC Outlets while charging
DC metering	Standard DC meter per outlet Accuracy class B (acc. to EN 50470-3: 2006 and EN 50470-1: 2006)

AC Socket (optional)	
Number of outlets at Charger	1x AC
Socket	Type 2 (Mode 3 with shutter)
Maximum output power	22 kW
Maximum output current	32 A
AC metering	Yes

User Interface	
Display	24" Full-HD (1920x1080) color touch screen up to 1000 cd/m <sup>2</sup> and adaptive brightness control viewing angle 178° contrast 5000:1
RFID	ISO 18092: MIFARE ISO/IEC14443 A/B, FeliCa JIS X6319-4; ISO/IEC15693, Legic Prime, Legic Advant
Authorization/Payment	RFID/PIN/QR-Code with Smartphone/Credit Card
Credit card payment provider	CCV KNB, VR Payment
Status LED	Yes, per DC outlet
Emergency stop button	Yes
External emergency stop interface	Yes
External load management system	Yes – via Ethernet, Modbus TCP
Customized foliation	On request

Software System and Communication	
Operating system	SICHARGE D OS, EcoG OS
Remote management	Yes via OCPP and SICHARGE Configuration Backend
Backend connectivity	OCPP 1.6J+
Network connection	Ethernet 10/100 Base; 2G/3G/4G (LTE)
Over-the-Air updates	Yes

2) Limitations due to ambient conditions and/or usage time possible

Norms and Standards	
Safety & charging standard	IEC 61851-1, IEC 62477-1, IEC 62311
RoHS	EN IEC 63000
Surge & overvoltage protection	DIN EN 60664- 1, overvoltage category III
EMC immunity	Class A (EN 61000-6-2, industrial)
EMC emission	Class B (EN 61000-6-3, residential)
Communication to EV	ISO 15118, DIN SPEC 70121, CHAdeMO 1.2
AC charging Type 2	IEC 61851-1, IEC 62196-2, Mode 3
DC charging CCS 2	IEC 61851-23, IEC 62196-3, Combo 2, Mode 4
DC charging CHAdeMO	CHAdeMO 1.2, JEVS G105, Mode 4
Barrier-free	Yes (with 24" screen), DIN EN 301549
Protection against electrical shock	Class I; IEC 61140

Certification and Market Approvals	
Europe	CE
Singapore	TR25
Australia and New Zealand	RCM