

Product Certificate Number	20581-4-CER
Applicant	KACO New Energy GmbH Werner-von-Siemens-Alle 1 74172. Nerkarsulm, Germany
Series	KACO blueplanet
Models/	blueplanet gs 92.0 TL3-S B1 WM OD IIGM blueplanet gs 92.0 TL3-S B1 WM OD IIGL blueplanet gs 92.0 TL3-S B1 WM OD IIGX
Type of generating unit	Grid-tied battery inverter
Technical Data	See page 2
Software version	V3.10
Checksum	F2E3AA693A5E24D835F58DD74C22DDC6
Software environment	Matlab / Simulink (R2019b)
Network connection code	VDE-AR-N 4110: 2018-11. Technical requirements for the connection and operation of customer installations to the medium voltage network (TCR medium voltage). VDE-AR-N 4120: 2018-11. Technical requirements for the connection and operation of customer installations to the high voltage network (TCR high voltage).

Having assessed the report number:

- Test report: 20278-4-TR-E1 and 20581-4-TR performed by CERE (Accredited Laboratory Nº 5314.01) based on the requirements of the EN ISO/IEC 17025: 2017.
- Simulation report 20581-4-S performed by CERE (Accredited Laboratory Nº 5314.01) based on the requirements of the EN ISO/IEC 17025: 2017.
- Certificate annex with unit certificate requirements 20581-4-CER ANNEX 1 performed by CERE (EA Accredited Entity Nº 147/C-PR335) based on the requirements of the EN ISO/IEC 17065: 2012
- Certificate annex with plausibility test 20581-4-CER ANNEX 2 performed by CERE (EA Accredited Entity Nº 147/C-PR335) based on the requirements of the EN ISO/IEC 17065: 2012.

The above-mentioned generating unit complies with the requirements of the:

VDE-AR-N 4110:2018-11. Technical requirements for the connection and operation of customer installations to the medium voltage network (TCR medium voltage),

VDE-AR-N 4120:2018-11. "Technical requirements for the connection and operation of customer installations to the high voltage network (TCR high voltage)"

Certification programme:

TG 8 – Certification of the Electrical Characteristics of Power Generating Units, Systems and Storage Systems as well as for their Components to the Grid. **Rev 9**

TG 3 – Determination of the Electrical Characteristics of Power Generating Units and systems, Storage Systems as well for their Components in medium-, high- and extra-high voltage grids. **Rev 25.**

TG 4 – Demands on Modelling and Validating Simulation Models of the Electrical characteristics of Power Generating Units and Systems, Storage Systems as well as for their Components. **Rev 9.**

The certificates include the following information:

- Technical data of the power generating unit, the auxiliary equipment and the software version used;
- schematic structure of the power generating unit;
- summarized information on the properties of the power generating unit.

This certification is according the CERE internal process PET-CERE-09 Rev 30 based on the requirements of the EN ISO/IEC 17065:2012. For this certification process the conformity assessment activities were based on:

- Testing of production samples selected by CERE.
- Audit of quality system according ISO 9001 with certificate number: 2018-0076483-00 issued by a certification body accredited according EN ISO/IEC 17021.
- Inspection of the manufacturing process.

Madrid, May 06th 2021. This certificate is valid until May 06th 2024.

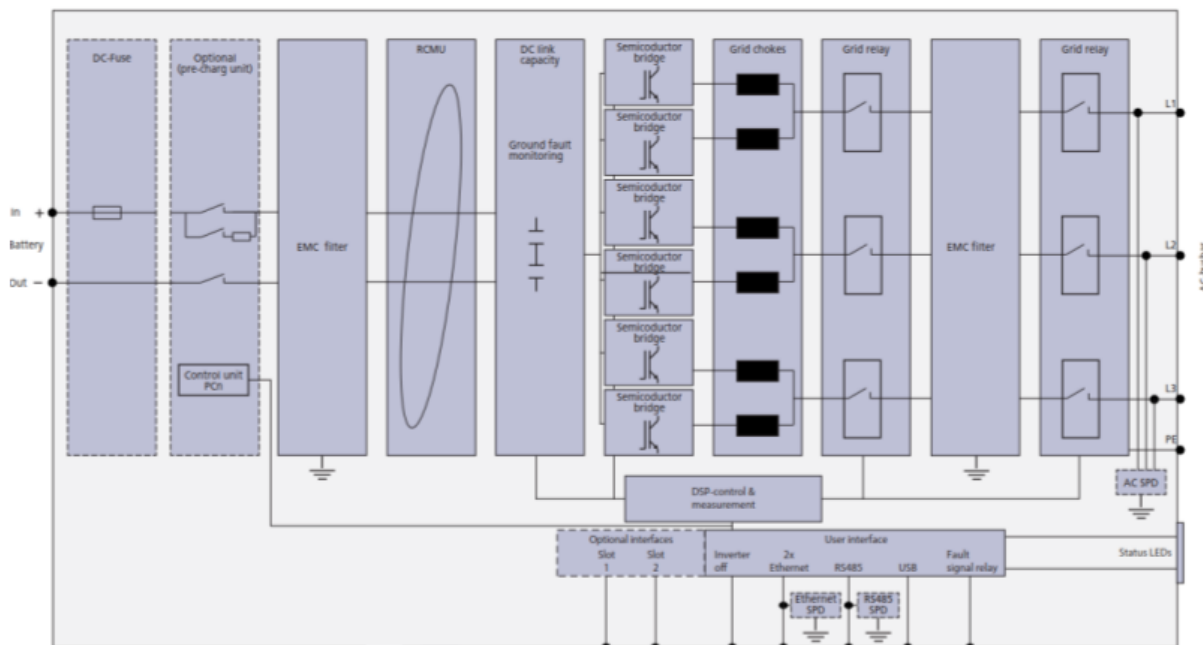


Miguel Martínez Lavin
Certification Manager

Technical data

KACO blueplanet	
	blueplanet gs 92.0 TL3-S B1 WM OD IIGM blueplanet gs 92.0 TL3-S B1 WM OD IIGL blueplanet gs 92.0 TL3-S B1 WM OD IIGX
DC INPUT DATA	
Voltage range	668-1100 V
Max. input current	145 A
Max. short circuit current $I_{sc\ max}$	300 A
Number of DC inputs	1
AC OUTPUT DATA	
Rated output	92 000 VA
Max. power	92 000 VA
Line voltage	400 V
Rated frequency (range)	50 Hz / 60 Hz (45 Hz – 65 Hz)
Rated current	3 x 132,3 A
Max. current	3 x 132,3 A
Reactive power / cos phi	0 – 100 % S_{max} / 0.3 ind. – 0.30 cap
Max. total harmonic distortion (THD)	< 3 %
Number of grid phases	3
GENERAL DATA	
Operation mode	On-grid (charge/discharge)
Standby consumption	<10 W
Circuitry topology	transformerless
MECHANICAL DATA	
Display	LEDs
Control units	webserver
Ambient temperature	-20 °C – +60 °C
Humidity	0 – 100 %

Electrical Diagram of KACO blueplanet series



The sample selected to test was representative of the production. The sample was selected in:

KACO new Energy GmbH
Werner-von-Siemens Alle 1
74172 Neckarsulm, Germany

Sample Report Number:

20581-TM
20278-1-TM

The inspection of manufacturing process was performed in:
On November 20th 2020

KACO new Energy GmbH
Werner-von-Siemens Alle 1
74172 Neckarsulm, Germany

Inspection Report Number:

11515-20-1-IF

RECORD OF CHANGES

Revision	Modification / Changes	Date
0	Initial version	06/05/2021