

Organizational And Products Introduction

JANUARY 2024

The Pulse of Advanced Power Electronics

Who we are

- ▶ Convesys Ltd. specializes in engineering, reverse engineering, and repair of power electronics and boards.
- ▶ Established in 2017 by a group of experienced and ambitious engineers.
- ▶ The company had a yearly turnover of approximately 5 million euros in 2021.
- ▶ Our vision and mission emphasize supporting and assisting our customers at every stage to create reliable and competitive products.

What do we do

- ▶ Design and manufacture cutting-edge IGBT gate drivers for the power electronics industry.
- ▶ Engage in custom project development to meet specific client needs.
- ▶ Scale operations, growing from a small team to a diverse workforce of 50 professionals.
- ▶ Commit to innovation, leveraging our extensive experience to deliver products that align with client expectations.



Our crew

- ▶ The core team is made up of seasoned engineers with international backgrounds and over 15 years of experience in their respective fields.
- ▶ The engineering staff includes:
 - ▶ 5 Senior Engineers
 - ▶ 8 Hardware Engineers
 - ▶ 6 Software Engineers
 - ▶ 3 Mechanical Engineers
- ▶ Additionally, there are 20 engineers and mechanics specialized in testing, repairing, and assembling.
- ▶ Our company also relies on a network of proven and experienced freelancers to assist with more complex projects.

KACO Inverters Repair Services

- ▶ Specialized Repair Solutions
- ▶ Comprehensive Diagnostics & Maintenance
- ▶ OEM-Quality Component Replacement
- ▶ Extended Inverter Lifespan Assurance
- ▶ Rapid Turnaround Time
- ▶ Cost-Effective Service Rates
- ▶ Post-Repair Support and Warranty



Repaired KACO power stack

Power Module Specifications

DC Input

Maximum PV Power 130kW

Maximum permitted range of the DC Voltage 1000V

Maximum permitted range of the DC Current 285.33A

AC Output

Rated Power 120kW

Grid Voltage 3*290V (+/-10%)

Grid Frequency 50Hz / 60Hz

Rated Current 232.33A



Analog (120kW power stack for KACO inverters - Replacement)

The Pulse of Advanced Power Electronics.

PowerCore Series

Solar Inverter 350kW



Analog (KACO 350kW Replacement Inverter)

Specifications

MPP voltage range	450 - 830 V
Open circuit voltage	1000 V
Max. input current	856 A
Nominal output	350000 W
Output voltage	3 x 290 V ($\pm 10\%$) to external transformer
Power factor cos phi	0.8 inductive, 0.8 capacitive
Frequency	50 / 60 Hz
Harmonic distortion	< 3 %
Max. efficiency	98.3 %
Euro efficiency	98.0 %
Ambient temperature	-20 to +50 °C
Heat dissipation	Fan (max. 6420 m ³ /h)
Protection mode	IP21
Circuit type	Digital control, transformerless
Grid monitoring	According to country-specific requirements
Display	TFT LC display touch screen
Casing	Sheet steel
Dimensions (W / H / D)	2110 mm / 2400 mm / 850 mm
Weight	1370 kg
Warranty	3 years
Norms	EN 60950-1:2006, EN 50178:1997, EN 61000-6-1:2007, EN 61000-6-2:2005, EN 61000-6-4:2007, EN 61000-3-11:2000, EN 61000-3-12:2005, DIN VDE 0126-1-1:2006-02



Solar & Wind Monitoring Suite

Remote diagnostics monitoring system for wind and solar with cloud storage, Bluetooth communication and mobile app

- ▶ User Interface for automatic test-stand
- ▶ User interface for wind/solar inverter
- ▶ Simulation models of solar inverter

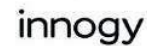


Our individual services

Our design and manufacturing services are tailored to meet a variety of needs:

- ▶ Custom design and manufacturing to suit various needs.
- ▶ Expertise in quick-turnaround prototyping.
- ▶ Small-batch production for tests and specific uses.
- ▶ Partnered large-scale manufacturing for bigger volumes.
- ▶ Proficient in 3D modeling for design and prototyping.
- ▶ Craft and execute test plans ensuring product quality.
- ▶ Specialize in reverse engineering for design enhancement.
- ▶ Provide alternative components to primary supplier offerings.
- ▶ Focus on updating and replacing outdated parts.

Who We Serve



Thank you!

We appreciate your time and attention!



Angel Kanchev Str. 12

BG-1000 Sofia

Mobile: +359 899 409 821

Email: solar.service@convesys.com

Website: www.convesys.com

Post/Service Center address:

ul. Parvi mai 9, 1805 Yana, Bulgaria