PHOTOVOLTAIC ENERGY L.L.C.
www.ecosolaris.ae · contact@ecosolaris.ae
Tel / WhatsApp: +971 58 511 8662 · Toll-free: 800 00813
Canal Heights 4001, P.O. Box 25314, Dubai, UAE

DATASHEET · THREE-PHASE GRID-TIE INVERTER · FRONIUS VERTO

Fronius Verto 20.0 Grid-Tie Inverter

EcoSolaris code: ECO-FV20.0 · Fronius article no.: 4,210,424 · Manufacturer: Fronius International GmbH, Austria



The Fronius Verto 20.0 is the solution for commercial consumers that use energy during the day: cold stores, laundries, workshops. It delivers 20 kW three-phase and accepts up to 30 kWp of panels, so you can oversize the generator for winter mornings and evenings.

Genuine Fronius product | Manufacturer warranty | Delivery across the UAE

EcoSolaris technical support

Technical specifications

Fronius product code	4,210,424
Nominal AC power	20 kW
Maximum apparent power	20 kVA
Maximum photovoltaic power	30 kWp
Number of MPPT trackers	3
MPP voltage range	275 – 870 V
Maximum input current	28 A / string (75 A total)
Permitted short-circuit current	50 A / string (100 A total)
Maximum output current / phase	38.5 A
Nominal output current / phase	30.3 / 29.0 / 26.2 / 24.1 A
Maximum efficiency	98.56%
European efficiency	98.33%
Night-time consumption	12 W
Noise level	56.5 dB(A)
Dimensions (H x W x D)	730 x 540 x 278 mm
Weight	35.2 kg
Maximum DC input voltage	1,000 V
Start-up voltage	150 V
Maximum current per string	28 A
Maximum power per MPPT	20 kWp
Nominal frequency	50 / 60 Hz
Grid voltage range	176 – 528 V
Power factor (cos φ)	0 – 1 ind./cap.
Total harmonic distortion	under 3%
Protection rating	IP 66
Protection class	1
Permitted ambient temperature	-40 °C … +60 °C
Relative humidity	0 – 100%
Topology	transformerless
DC disconnect	integrated
Arc fault detection AFCI (AFPE)	integrated
Cooling	regulated forced ventilation
Communication	WLAN, 2x Ethernet LAN, Modbus TCP/RTU SunSpec, Fronius Solar API
Monitoring	Fronius Solar.web (included)

Key features

- **20 kW three-phase in a 35 kg enclosure** — high power density, wall mounting without an additional structure.
- **Up to 30 kWp of connected panels** — cover summer consumption peaks and keep useful production in winter.
- **Maximum efficiency 98.56%** — DC-AC conversion takes place with almost no losses.
- **Wide MPP range, 275 – 870 V** — you can use long strings and smaller DC cable cross-sections.
- **Remote diagnostics** — Solar.web shows production per MPPT and sends alerts by e-mail.
- **Firmware updates over WLAN** — the inverter stays compliant with grid connection requirements without a site visit.

Recommended applications

Industrial halls **Farms** **Commercial buildings** **Self-consumption** **On-grid systems**

> **Important:** improper installation may damage the product, the electrical installation and the surroundings. Mounting, connection and commissioning must be carried out only by qualified, licensed personnel, in accordance with the manufacturer's installation manual and the requirements of the local grid operator. Unauthorised work voids the warranty.