



Encore 3K

Input (PV)

Max. Power [kW]	4.6
Max. DC Voltage [V]	550
MPPT Voltage Range [V]	125-500
Max. Input Current of Single MPPT [A]	14/14
MPPT Tracker/Strings	2/1

AC Output

Rated Output Power [kVA]	3
Max. Output Current [A]	13
Grid Voltage/Range [V]	230/176-270
Frequency [Hz]	50/60
Displacement Power Factor	0.99lagging-0.99leading
THDi [%]	<2

Battery

Battery Voltage Range [V]	40-58
Max. Charging Voltage [V]	58
Max. Charge/Discharge Current [A]	95/62.2
Battery Type	Lithium/Lead-acid
Communication Interface	CAN/RS485/WiFi/LAN/DRM

EPS Output

Rated Power [kVA]	3
Rated Output Voltage [V]	230
Rated Output Current [A]	13
Rated Frequency [Hz]	50/60
Automatic Switching Time [ms]	<20
THDv [%]	<2

General Data

Battery Charge/Discharge Efficiency [%]	95.0
DC Max. Efficiency [%]	97.6
Europe Efficiency [%]	97.0
MPPT Efficiency [%]	99.9
Ingress Protection	IP65
Noise Level [dB]	<35
Operating Temperature [°C]	-25 to +60°C (derating at 45°C)
Cooling	Natural
Storage/Operation Relative Humidity	0-95% (non-condensing)
Altitude [m]	<2 000
Dimensions - H x W x D [mm]	515x550x200
Crated Dimensions - H x W x D [mm]	TBC
Weight [kg]	25
Crated Weight [kg]	TBC
Night-time Consumption [W]	15-25

Safety Compliance

Safety Standard	IEC/EN 62109-1/-2, IEC/EN 62477-1
EMC	IEC/EN 61000-6-1, IEC/EN 61000-6-3
Certificates	South Africa NRS097-2-1:2017, UK G98, G99, EN 50549-1

DISTRIBUTORS AND RESELLERS

Contact your nearest Accredited Freedom Won Distributor or Accredited EPCs for further sales and technical support.

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