

# GOODWE

## ET Series

### 5-10kW | Three Phase Hybrid Inverter

The GoodWe ET series is a Three-Phase, high-voltage, energy storage inverter that provides enhanced energy independence and maximises self-consumption for reduced electricity bills, through an export limit feature and time-of-use shifts. Covering a power range of 5 kW to 10 kW, the ET series allows up to 110% overloading to maximize power output and features Uninterruptible Power Supply (UPS) to critical loads, such as air conditioners or refrigerators within 10 milliseconds. With UPS-level switching, the ET can provide savings when connected to the grid, or off-grid independence and security when the grid is down.



98.2% maximum system efficiency



Wide battery voltage from 180 to 600V



100% unbalanced output



<10 ms UPS-level switching

Technical Data	GW5KL-ET	GW6KL-ET	GW8KL-ET	GW10KL-ET
<b>Battery Input Data</b>				
Battery Type	Li-Ion	Li-Ion	Li-Ion	Li-Ion
Battery Voltage Range (V)	180 ~ 600	180 ~ 600	180 ~ 600	180 ~ 600
Max. Continuous Charging Current (A)	25	25	25	25
Max. Continuous Discharging Current (A)	25	25	25	25
<b>PV String Input Data</b>				
Max. Input Power (W)	6650	7980	10640	13300
Max. Input Voltage (V) <sup>1</sup>	1000	1000	1000	1000
MPPT Operating Voltage Range (V) <sup>2</sup>	200 ~ 850	200 ~ 850	200 ~ 850	200 ~ 850
Start-up Voltage (V)	180	180	180	180
Nominal Input Voltage (V) <sup>3</sup>	620	620	620	620
Max. Input Current per MPPT (A)	12.5 / 12.5	12.5 / 12.5	12.5 / 22	12.5 / 22
Max. Short Circuit Current per MPPT (A) <sup>9</sup>	15.2 / 15.2	15.2 / 15.2	15.2 / 27.6	15.2 / 27.6
Number of MPPTs	2	2	2	2
Number of Strings per MPPT	1 / 1	1 / 1	1 / 2	1 / 2
<b>AC Output Data (On-grid)</b>				
Nominal Apparent Power Output to Utility Grid (VA)	5000	6000	8000	10000
Max. Apparent Power Output to Utility Grid (VA) <sup>14B</sup>	5500	6600	8800	11000
Max. Apparent Power from Utility Grid (VA)	10000	12000	15000	15000
Nominal Output Voltage (V)	400 / 380, 3L / N / PE			
Nominal AC Grid Frequency (Hz)	50 / 60	50 / 60	50 / 60	50 / 60
Max. AC Current Output to Utility Grid (A)	8.5	10.5	13.5	16.5
Max. AC Current From Utility Grid (A)	15.2	18.2	22.7	22.7
Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)			
Max. Total Harmonic Distortion	<3%	<3%	<3%	<3%
<b>AC Output Data (Back-up)</b>				
Max. Output Apparent Power (VA) <sup>5</sup>	5000 (10000@60sec)	6000 (12000@60sec)	8000 (16000@60sec)	10000 (16500@60sec)
Max. Output Current (A)	8.5	10.5	13.5	16.5
Nominal Output Voltage (V)	400 / 380	400 / 380	400 / 380	400 / 380
Nominal Output Frequency (Hz)	50 / 60	50 / 60	50 / 60	50 / 60
Output THDv (@Linear Load)	<3%	<3%	<3%	<3%
<b>Efficiency</b>				
Max. Efficiency	97.6%	97.6%	97.6%	97.6%
European Efficiency	96.8%	96.8%	96.8%	96.8%
Max. Battery to AC Efficiency	97.5%	97.5%	97.5%	97.5%
MPPT Efficiency	99.9%	99.9%	99.9%	99.9%
<b>Protection</b>				
PV Insulation Resistance Detection	Integrated	Integrated	Integrated	Integrated
Residual Current Monitoring	Integrated	Integrated	Integrated	Integrated
PV Reverse Polarity Protection	Integrated	Integrated	Integrated	Integrated
Battery Reverse Polarity Protection	Integrated	Integrated	Integrated	Integrated
Anti-islanding Protection	Integrated	Integrated	Integrated	Integrated
AC Overcurrent Protection	Integrated	Integrated	Integrated	Integrated
AC Short Circuit Protection	Integrated	Integrated	Integrated	Integrated
AC Overvoltage Protection	Integrated	Integrated	Integrated	Integrated
<b>General Data</b>				
Operating Temperature Range (°C)	-35 ~ 60	-35 ~ 60	-35 ~ 60	-35 ~ 60
Relative Humidity	0 ~ 95%	0 ~ 95%	0 ~ 95%	0 ~ 95%
Max. Operating Altitude (m)	4000	4000	4000	4000
Cooling Method	Nature Convection	Nature Convection	Nature Convection	Nature Convection
Display	LED & APP	LED & APP	LED & APP	LED & APP
Communication with BMS <sup>6</sup>	RS485; CAN	RS485; CAN	RS485; CAN	RS485; CAN
Communication with Meter	RS485	RS485	RS485	RS485
Communication with Portal	Wi-Fi	Wi-Fi	Wi-Fi	Wi-Fi
Weight (Kg)	24	24	25	25
Dimension (W x H x D mm)	415 x 516 x 180	415 x 516 x 180	415 x 516 x 180	415 x 516 x 180
Noise Emission (dB)	<30	<30	<30	<30
Topology	Transformerless	Transformerless	Transformerless	Transformerless
Self-consumption at Night (W) <sup>7</sup>	<15	<15	<15	<15
Ingress Protection Rating	IP66	IP66	IP66	IP66
Mounting Method	Wall Bracket	Wall Bracket	Wall Bracket	Wall Bracket
Country of Manufacture	China	China	China	China

\*1: For 1000V system, Maximum operating voltage is 950V. For AustraliaL safety, there will be a warning if PV voltage > 600V.  
 \*2: For AustraliaL safety, MPPT range is 200~550V.  
 \*3: For AustraliaL safety, nominal DC input voltage is 450V.  
 \*4: According to the local grid regulation.  
 \*5: Can be reached only if PV and battery power is enough.  
 \*6: CAN communication is configured by default. If 485

communication is used, please replace the corresponding communication line.  
 \*7: No Back-up Output.  
 \*8: For Belgium Max. Output Apparent Power (VA): GW5K-ET is 5000; GW6.5K-ET is 6500; GW8K-ET is 8000; GW10K-ET is 10000.  
 \*9: For AustraliaL Max. Short Circuit Current per MPPT (A) please refer to 'Manufacturer declaration: short circuit current'.  
 \*: When there is no battery connected, inverter starts feeding in only if string voltage is higher than 400V.  
 \*: For AustraliaL safety, MPPT voltage upper limit is 550V.  
 \*: Please visit GoodWe website for the latest certificates.