

# EHB Series

## Single Phase Hybrid Inverter (HV Battery)



Technical Data	GW5000-EHB	GW6500-EHB	GW8600-EHB	GW0010-EHB
<b>Battery Input Data</b>	Battery Type			
	Li-Ion (BYD HVM&HVS, Pylon H1&H2, LG RESH10-TypeR, GOODWE SECU-S series)			
	Battery Voltage Range (V)* <sup>1</sup>		80~495	
	Max. Charging Current (A)		50	
Max. Discharging Current (A)		50		
Charging Strategy for Li-Ion Battery		Self-adaption to BMS		
<b>PV String Input Data</b>	Max. DC Input Power (W)	7500	9750	12900
	Max. DC Input Voltage (V)* <sup>2</sup>	600		
	MPPT Range (V)* <sup>3</sup>	80~550		
	Start-up Voltage (V)	95		
	MPPT Range for Full Load (V)	200~500	200~500	255~500
	Nominal DC Input Voltage (V)	380		
	Max. Input Current (A)	13/13/13	13/13/13/13	
	Max. Short Current (A)	16.3/16.3/16.3	16.3/16.3/16.3/16.3	
	No. of MPP Trackers	3	4	
	No. of Strings per MPP Tracker	1/1/1	1/1/1/1	
<b>AC Output Data (On-grid)</b>	Nominal Output Voltage (Vac)			
	230			
	Nominal Output Frequency (Hz)			
	50			
	Max. Apparent Power Output to Grid (VA)* <sup>4</sup>	5000	6500	8600
	Max. Apparent Power from Grid (VA)	6000	7800	10000
	Max. AC Current Output to Grid (A)	23	28.5	39
Max. AC Current From Grid (A)	27	34	45.5	
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)			
Output THDi (@Nominal Output)	<3%			
<b>AC Output Data (Back-up)</b>	Nominal Output Voltage (V)			
	230 (±2%)			
	Nominal Output Frequency (Hz)			
	50 (±0.2%)			
	Automatic Switch Time (ms)			
	<10			
Output THDv (@Linear Load)				
<3%				
Max. Continuous Output Apparent Power (VA)				
5000				
Peak Output Apparent Power (VA)* <sup>5</sup>				
6000, 60sec				
Max. Continuous Output Current (A)				
23				
<b>Efficiency</b>	PV Max. Efficiency			
	97.6%			
	PV CEC Efficiency			
	97.0%			
Battery Charged By PV Max. Efficiency				
98.2%				
Battery Charge/discharge to AC Max. Efficiency				
96.5%				
<b>Protection</b>	PV Arc Fault Detection			
	Optional			
	Rapid Shutdown System (RSS) Transmitter			
	Optional			
	DC&AC Breaker, AC Bypass Switch			
	Integrated			
	AC&DC SPD Type II			
	Integrated			
	Anti-islanding Protection			
	Integrated			
	PV String Input Reverse Polarity Protection			
	Integrated			
Insulation Resistor Detection				
Integrated				
Residual Current Monitoring Unit				
Integrated				
Output Over Current Protection				
Integrated				
Back-up Output Short Protection				
Integrated				
Output Over Voltage Protection				
Integrated				
Battery Input Reverse Polarity Protection				
Integrated				
<b>General Data</b>	Operating Temperature Range (°C)			
	-35~60			
	Relative Humidity			
	0~95%			
	Operating Altitude (m)			
	≤4000			
	Cooling			
	Intelligent Fan			
	Noise (dB)			
	<50			
	User Interface			
	LED & APP (Wi-Fi & Bluetooth)			
	DC&AC Power Connect Port			
	MC4 & ADAPTER WIELAND			
	Communication with BMS			
	RS485; CAN			
	Communication with Meter			
RS485				
Communication with EMS				
RS485 (Insulated)				
Communication with Portal				
Wi-Fi				
Communication with RSD				
SUNSPEC				
Weight (kg)	28.8	32.3		
Dimensions (W*H*D mm)	415*791*175			
Mounting	Wall Bracket			
Protection Degree	IP65			
Standby Self Consumption (W)* <sup>6</sup>	<20			
Topology	Transformerless			

\*<sup>1</sup>: Battery discharge/charge power limited by voltage.

\*<sup>2</sup>: Inverter will not work when PV input voltage ≥585V.

\*<sup>3</sup>: When there is no battery connected, inverter starts feeding in only if string voltage is higher than 200V.

\*<sup>4</sup>: The grid feed in power for VDE-AR-N 4105 and NRS097-2-1 is limited to 4600VA.

\*<sup>5</sup>: Can be reached only if PV and battery power is enough.

\*<sup>6</sup>: No Back-up Output.

\*: Please visit GoodWe website for the latest certificates.