GOODWE

YOUR SOLAR ENGINE

Smart Photovoltaic Inverter Series

GOODWE POWER SUPPLY TECHNOLOGY CO.,LTD.

GOODWE
COMPANY PROFILE

GoodWe is a leading, strategically-thinking enterprise which focuses on research and manufacturing of PV inverters and energy storage solutions. With an average monthly sales volume of 30,000 pieces in 2017 and 20 GW installed in more than 100 countries, GoodWe solar inverters have been largely used in residential rooftops, commercial systems, and energy storage systems, ranging from 1.0 to 80kW. They offer reliable operation and excellent performance and are highly spoken of by its customers worldwide. GoodWe benchmarks its success on the success achieved by its customers by identifying and integrating the most advanced components and techniques available while offering an unparalleled after-sales service.

Technological innovation is GoodWe's main core competence. With an in-house R&D team of 200 employees, GoodWe can offer a comprehensive portfolio of products and solutions for residential and commercial PV systems, ensuring that performance and quality go hand-in-hand across the entire range.

GoodWe has set up an integrated service system for pre-sale, in-sale and after-sale and has established service centers worldwide. The company has developed a concept of workshops which aim to offer global support to all customers including project consulting, technical training, onsite support and after-sales service.

CORE FEATURES

Commitment to quality excellence

- Each component comes from industry-leading suppliers
- Each product passes ATS test strictly
- Each product has a report with 10 key performance indexes

Smart design and precise workmanship

- Global internet monitoring system
- 30% lighter compared with similar products

World-class product performance

- Conversion efficiency up to 98.8%
- MPPT efficiency up to 99.9%
- DC Oversizing up to 30%
- AC Overloading up to 15%

High safety and reliability

- Up to 13 safety measurements
- IP65 anti-dust and water-proof applied
- IP68 rated cooling fan
- World-wide certificates (VDE0126-1-1, VDE-AR--N 4105, CE, SAA, G83/2, G59/3,EN50438, CGC, CQC, MEA, PEA...)

NS Series (Single-MPPT, Single Phase)

GoodWe NS series is ideally suited for new-build housing projects or small domestic applications, providing you with a range from 1 to 3 kW models for installations as small as 3 PV modules. The NS series compares favorably to other inverters in the 1-3kW power class due to its small footprint and light weight.

In addition, GoodWe NS series boasts both the lowest startup voltage of 80V and the widest voltage range from 80 to 450V. A robust, elegantly designed IP65 rated enclosure ensures the inverter is weatherproof, allowing outdoor installation, while contributing to low maintenance needs and enhanced lifespan.

- Lowest startup voltage at 80V
- Wide range of MPPT voltage
- Small, lightweight and easy to install
- Built-in anti-reverse function
- Fanless and quiet

Technical Data	GW1000-NS	GW1500-NS	GW2000-NS	GW2500-NS	GW3000-NS
PV String Input Data					
Max. DC Input Power (W)	1300	1950	2600	3250	3900
Max. DC Input Voltage (V)	500	500	500	500	500
MPPT Range (V)	80~450	80~450	80~450	80~450	80~450
Start-up Voltage (V)	80	80	80	80	80
MPPT Range for Full Load (V)	120~450	180-450	230-450	180-450	215-450
Nominal DC Input Voltage (V)	360	360	360	360	360
Max. Input Current (A)	10	10	10	18	18
Max. Short Current (A)	12.5	12.5	12.5	22.5	22.5
No. of MPP Trackers	1	1	1	1	1
No. of Input Strings per Tracker	1	1	1	1	1
AC Output Data					
Nominal Output Power (W)	1000	1500	2000	2500	3000
Max. Output Apparent Power (VA)	1000	1500	2000	2500	3000
Nominal Output Voltage (V)	220/230	220/230	220/230	220/230	220/230
Nominal Output Frequency (Hz)	50/60	50/60	50/60	50/60	50/60
Max. Output Current (A)	5	7.5	10	12.5	13.5
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)				
Output THDi (@Nominal Output)	<3%	<3%	<3%	<3%	<3%
Efficiency					
Max. Efficiency	96.5%	97.0%	97.0%	97.5%	97.5%
Europe Efficiency	96.0%	96.0%	96.0%	97.0%	97.0%
MPPT Efficiency	99.9%	99.9%	99.9%	99.9%	99.9%
Protection					
Anti-islanding Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Input Reverse Polarity Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Insulation Resistor Detection	Integrated	Integrated	Integrated	Integrated	Integrated
Residual Current Monitoring Unit	Integrated	Integrated	Integrated	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Output Short Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated	Integrated	Integrated	Integrated
General Data					
Operating Temperature Range (°C)	-25~60	-25~60	-25~60	-25~60	-25~60
Relative Humidity	0~100%	0~100%	0~100%	0~100%	0~100%
Operating Altitude (m)	≤4000	≤4000	≤4000	≤4000	≤4000
Cooling	Natural Convection	Natural Convection	Natural Convection	Natural Convection	Natural Convection
Noise (dB)	<25	<25	<25	<25	<25
User Interface	LCD & LED	LCD & LED	LCD & LED	LCD & LED	LCD & LED
Communication	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi
Weight (kg)	7.5	7.5	7.5	8.5	8.5
Size (Width*Height*Depth mm)	344*274.5*128	344*274.5*128	344*274.5*128	344*274.5*128	344*274.5*128
Protection Degree	IP65	IP65	IP65	IP65	IP65
Night Self Consumption (W)	<1	<1	<1	<1	<1
Topology	Transformerless	Transformerless	Transformerless	Transformerless	Transformerless
Certifications & Standards					
Grid Regulation	VDE0126-1-1, AS4777.2 EN50438(PL), G83 ERDF-NOI-RES_13E, IEC61727, IEC62116	VDE0126-1-1, AS4777.2 EN50438(PL), G83 ERDF-NOI-RES_13E, IEC61727, IEC62116	VDE0126-1-1, AS4777.2 EN50438(PL), G83 ERDF-NOI-RES_13E, IEC61727, IEC62116	VDE0126-1-1, AS4777.2 EN50438(PL), G83 ERDF-NOI-RES_13E, IEC61727, IEC62116	VDE0126-1-1, AS4777.2 EN50438(PL), G83 ERDF-NOI-RES_13E, IEC61727, IEC62116
Safety Regulation	IEC62109-1&2	IEC62109-1&2	IEC62109-1&2	IEC62109-1&2	IEC62109-1&2
EMC	EN 61000-6-1, EN 61000-6-2, EN 61000-6-3, EN 61000-6-4				

Color Options

DNS Series (Dual-MPPT, Single-Phase)

GoodWe DNS series is a perfect match for residential installations thanks to its compact size and light weight. Manufactured for durability and longevity under modern industrial standards, GoodWe DNS series is IP65 rated so it can be mounted either inside or outside your home.

With a low start-up voltage of only 120V and the widest voltage range of 80-550V, these inverters can provide greater options for your household system. The GoodWe DNS series is also extremely light - just 14kg, about 30% lighter than other inverters.

- Lowest startup voltage at 120V
- Wide range of MPPT voltage
- Small, lightweight and easy to install
- Built-in anti reverse function
- IP65 dustproof and waterproof
- Fanless and noiseless

Technical Data	GW3000D-NS	GW3600D-NS	GW4200D-NS	GW5000D-NS	GW6000D-NS
PV String Input Data					
Max. DC Input Power (W)	3900	4680	5460	6500	7200
Max. DC Input Voltage (V)	600	600	600	600	600
MPPT Range (V)	80~550	80~550	80~550	80~550	80~550
Start-up Voltage (V)	120	120	120	120	120
MPPT Range for Full Load (V)	150~550	180-550	210-550	250-550	280~550
Nominal DC Input Voltage (V)	360	360	360	360	360
Max. Input Current (A)	11/11	11/11	11/11	11/11	11/11
Max. Short Current (A)	13.8/13.8	13.8/13.8	13.8/13.8	13.8/13.8	13.8/13.8
No. of MPP Trackers	2	2	2	2	2
No. of Input Strings per Tracker	1	1	1	1	1
AC Output Data					
Nominal Output Power (W)	3000	3680	4200	5000	6000
Max. Output Apparent Power (VA)	3000	3680	4200	5000	6000
Nominal Output Voltage (V)	220/230	220/230	220/230	220/230	220/230
Nominal Output Frequency (Hz)	50/60	50/60	50/60	50/60	50/60
Max. Output Current (A)	13.6	16	19	22.8	27.3
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)				
Output THDi (@Nominal Output)	<3%	<3%	<3%	<3%	<3%
Efficiency					
Max. Efficiency	97.8%	97.8%	97.8%	97.8%	97.8%
Europe Efficiency	97.5%	97.5%	97.5%	97.5%	97.5%
MPPT Efficiency	99.9%	99.9%	99.9%	99.9%	99.9%
Protection					
Anti-islanding Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Input Reverse Polarity Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Insulation Resistor Detection	Integrated	Integrated	Integrated	Integrated	Integrated
Residual Current Monitoring Unit	Integrated	Integrated	Integrated	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Output Short Protection	Integrated	Integrated	Integrated	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated	Integrated	Integrated	Integrated
General Data					
Operating Temperature Range (°C)	-25~60	-25~60	-25~60	-25~60	-25~60
Relative Humidity	0~100%	0~100%	0~100%	0~100%	0~100%
Operating Altitude (m)	≤4000	≤4000	≤4000	≤4000	≤4000
Cooling	Natural Convection	Natural Convection	Natural Convection	Natural Convection	Natural Convection
Noise (dB)	<25	<25	<25	<25	<25
User Interface	LCD & LED	LCD & LED	LCD & LED	LCD & LED	LCD & LED
Communication	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi
Weight (kg)	14	14	14	14	14
Size (Width*Height*Depth mm)	354*433*147	354*433*147	354*433*147	354*433*147	354*433*147
Protection Degree	IP65	IP65	IP65	IP65	IP65
Night Self Consumption (W)	<1	<1	<1	<1	<1
Topology	Transformerless	Transformerless	Transformerless	Transformerless	Transformerless
Certifications & Standards					
Grid Regulation	VDE-AR-N 4105, VDE0126-1-1 EN50438(PL), EN50438(SW) AS4777.2, G83, IEC61727, IEC62116			VDE-AR-N 4105, VDE0126-1-1 EN50438(PL), EN50438(SW) AS4777.2, G59, IEC61727, MEA, PEA, IEC62116	
Safety Regulation	IEC62109-1&2	IEC62109-1&2	IEC62109-1&2	IEC62109-1&2	IEC62109-1&2
EMC	EN 61000-6-1, EN 61000-6-2, EN 61000-6-3, EN 61000-6-4				

Color Options

Smart DT Series (Dual-MPPT, Three-Phase)

The GoodWe Smart DT series inverter is specially designed for three-phase home solar systems, covering a wide power range of 4kW, 5kW, 6kW, 8kW, 10kW, 12kW and 15kW. The integrated two MPPTs allow two-array inputs from different roof orientations.

The SDT series inverter is small, light and easy to install. Suitable for both outdoor and indoor installations, this inverter offers a quiet operation thanks to its fanless, natural convection cooling. In addition, the combination of both RS485 and Wi-Fi communication allows the system to be easily monitored and controlled.

- Easy wall mounting
- Super large 5-inch LCD
- RS485 and Wi-Fi communication
- IP65 dustproof and waterproof
- Fanless and quiet

Technical Data

	GW4000-DT	GW5000-DT	GW6000-DT	GW8000-DT	GW10KN-DT	GW12KN-DT	GW15KN-DT
PV String Input Data							
Max. DC Input Power (W)	5200	6500	7800	9600	12000	16800	19500
Max. DC Input Voltage (V)	1000	1000	1000	1000	1000	1000	1000
MPPT Range (V)	200~800	200~800	200~800	200~850	200~850	200~850	200~850
Start-up Voltage (V)	180	180	180	180	180	180	180
MPPT Range for Full Load (V)	195~800	240~800	285~800	380~850	480~850	380~850	480~850
Nominal DC Input Voltage (V)	620	620	620	620	620	620	620
Max. Input Current (A)	11/11	11/11	11/11	11/11	11/11	22/11	22/11
Max. Short Current (A)	13.8	13.8	13.8	13.8	13.8	27.6/13.8	27.6/13.8
No. of MPP Trackers	2	2	2	2	2	2	2
No. of Input Strings per Tracker	1/1	1/1	1/1	1/1	1/1	2/1	2/1
AC Output Data							
Nominal Output Power (W)	4000	5000	6000	8000	10000	12000	15000
Max. Output Apparent Power (VA)	4000	5000	6000	8000	10000	14000	16500
Nominal Output Voltage (V)	400, 3L/N/PE	400, 3L/N/PE	400, 3L/N/PE	400, 3L/N/PE	400, 3L/N/PE	400, 3L/N/PE	400, 3L/N/PE
Nominal Output Frequency (Hz)	50/60	50/60	50/60	50/60	50/60	50/60	50/60
Max. Output Current (A)	8.5	8.5	10	12.1	15.2	21.5	24
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)						
Output THDi (@Nominal Output)	<2%	<2%	<2%	<2%	<2%	<2%	<2%
Efficiency							
Max. Efficiency	98.0%	98.0%	98.0%	98.3%	98.3%	98.3%	98.3%
Euro Efficiency	97.5%	97.5%	97.5%	98.0%	98.0%	98.0%	98.0%
MPPT Efficiency	99.9%	99.9%	99.9%	99.9%	99.9%	99.9%	99.9%
Protection							
Anti-islanding Protection	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated
Input Reverse Polarity Protection	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated
Insulation Resistor Detection	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated
Residual Current Monitoring Unit	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated
Output Short Protection	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated	Integrated
General Data							
Operating Temperature Range (°C)	-25~60	-25~60	-25~60	-25~60	-25~60	-25~60	-25~60
Relative Humidity	0~100%	0~100%	0~100%	0~100%	0~100%	0~100%	0~100%
Operating Altitude (m)	≤4000	≤4000	≤4000	≤4000	≤4000	≤4000	≤4000
Cooling	Natural Convection						
Noise (dB)	<30	<30	<30	<30	<30	<30	<30
User Interface	LCD & LED	LCD & LED	LCD & LED	LCD & LED	LCD & LED	LCD & LED	LCD & LED
Communication	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi
Weight (kg)	24	24	24	24	24	24	24
Size (Width*Height*Depth mm)	516*455*192	516*455*192	516*455*192	516*455*192	516*455*192	516*455*192	516*455*192
Protection Degree	IP65	IP65	IP65	IP65	IP65	IP65	IP65
Night Self Consumption (W)	<1	<1	<1	<1	<1	<1	<1
Topology	Transformerless	Transformerless	Transformerless	Transformerless	Transformerless	Transformerless	Transformerless
Standards							
Safety Regulation	IEC62109-1&2						
EMC	EN 61000-6-1, EN 61000-6-2, EN 61000-6-3, EN 61000-6-4						

LVDT Series (South America)

The GoodWe LVDT series three-phase inverter with low voltage power input is specifically designed for small commercial PV applications. Developed as an efficient response to the South American market needs for low-voltage inverters above 10kW, the GoodWe LVDT series is applicable to the different grid voltage ranges in the region, which mainly cover 208V, 220V and 240V. With the GoodWe LVDT series inverter, the system configuration can be simplified by avoiding the installation of an expensive transformer which adversely affects the system's conversion efficiency.

- Easy wall mounting
- Super large 5-inch LCD
- 30% lighter than similar inverters
- Wide range of output voltage
- IP65 dustproof and waterproof
- IP68 rated cooling fan

Technical Data	GW12KLV-DT	GW15KLV-DT
PV String Input Data		
Max. DC Input Power (W)	15600	19500
Max. DC Input Voltage (V)	800	800
MPPT Range (V)	260~650	260~650
Start-up Voltage (V)	180	180
MPPT Range for Full Load (V)	410~850	385~800
Max. Input Current (A)	20/10	20/20
Max. Short Current (A)	25/12.5	25/25
No. of MPP Trackers	2	2
No. of Input Strings Per MPP Tracker	2	3
AC Output Data		
Nominal Output Power (W) 208Vac System	11300	14200
Nominal Output Power (W) 220Vac System	12000	15000
Nominal Output Power (W) 240Vac System	13000	16000
Max. Output Apparent Power (VA)	13000	16000
Nominal Output Voltage (V)	150~300	150~300
Nominal Output Frequency (Hz)	50/60	50/60
Max. Output Current (A)	31.5	39.5
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)	
Output THDi (@Nominal Output)	<3%	<3%
Efficiency		
Max. Efficiency	98.4%	98.4%
Europe Efficiency	98.1%	98.1%
MPPT Efficiency	99.9%	99.9%
Protection		
Anti-islanding Protection	Integrated	Integrated
Input Reverse Polarity Protection	Integrated	Integrated
Insulation Resistor Detection	Integrated	Integrated
DC SPD Protectioin	Integrated (Type III)	Integrated (Type III)
Residual Current Monitoring Unit	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated
Output Short Protection	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated
General Data		
Operating Temperature Range (°C)	-25~60	-25~60
Relative Humidity	0~100%	0~100%
Operating Altitude (m)	≤4000	≤4000
Cooling	Fan Cooling	Fan Cooling
Noise (dB)	<45	<45
User Interface	LCD & LED	LCD & LED
Communication	RS485 or WiFi	RS485 or WiFi
Weight (kg)	39	40
Size (Width*Height*Depth mm)	516*650*203	516*650*203
Protection Degree	IP65	IP65
Night Self Consumption (W)	<1	<1
Topology	Transformerless	Transformerless
Certifications & Standards		
Grid Regulation	IEEE1547	IEEE1547
Safety Regulation	IEC62109-1&2	IEC62109-1&2
EMC	EN 61000-6-1, EN 61000-6-2 EN 61000-6-3, EN 61000-6-4	EN 61000-6-1, EN 61000-6-2 EN 61000-6-3, EN 61000-6-4

GOLDEN PIN DESIGN AWARD

DT Series (Dual-MPPT, Three-Phase)

The GoodWe DT series inverter is suitable for commercial and industrial roofs as well as small and medium-sized photovoltaic power systems. It has lower loss, more compact and lighter weight, extremely low THDi compared to similar products so that the power grid is purer. Because of the reliable grid support capabilities, high waterproof and dustproof grade and extra-wide voltage range of module, it can not only be used in commercial roof and commercial power station PV systems, but also is qualified for the design requirements of large-megawatt power stations.

- Perfect for commercial rooftop
- Super large 5-inch LCD
- IP65 dustproof and waterproof
- IP68 rated cooling fan
- RS485, Wi-Fi and Ethernet communication

Technical Data	GW17K-DT	GW20K-DT	GW25K-DT
PV String Input Data			
Max. DC Input Power (W)	22100	26000	32500
Max. DC Input Voltage (V)*	1000	1000	1000
MPPT Range (V)	260~850	260~850	260~850
Start-up Voltage (V)	250	250	250
MPPT Range for Full Load (V)	400~850	470~850	480~850
Nominal DC Input Voltage (V)	620	620	620
Max. Input Current (A)	22/22	22/22	27/27
Max. Short Current (A)	27.5/27.5	27.5/27.5	33.8/33.8
No. of MPP Trackers	2	2	2
No. of Input Strings per Tracker	2	2	3
AC Output Data			
Nominal Output Power (W)	17000	20000	25000
Max. Output Apparent Power (VA)	17000	20000	25000
Nominal Output Voltage (V)	400, 3L/N/PE	400, 3L/N/PE	400, 3L/N/PE
Nominal Output Frequency (Hz)	50/60	50/60	50/60
Max. Output Current (A)	25	30	37
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)		
Output THDi (@Nominal Output)	<1.5%	<1.5%	<1.5%
Efficiency			
Max. Efficiency	98.2%	98.4%	98.4%
Europe Efficiency	97.7%	98.1%	98.1%
MPPT Efficiency	99.9%	99.9%	99.9%
Protection			
Anti-islanding Protection	Integrated	Integrated	Integrated
Input Reverse Polarity Protection	Integrated	Integrated	Integrated
Insulation Resistor Detection	Integrated	Integrated	Integrated
DC SPD Protectioin	Integrated	Integrated	Integrated
Residual Current Monitoring Unit	Integrated	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated	Integrated
Output Short Protection	Integrated	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated	Integrated
General Data			
Operating Temperature Range (°C)	-25~60	-25~60	-25~60
Relative Humidity	0~100%	0~100%	0~100%
Operating Altitude (m)	≤4000	≤4000	≤4000
Cooling	Fan Cooling	Fan Cooling	Fan Cooling
Noise (dB)	<45	<45	<45
User Interface	LCD & LED	LCD & LED	LCD & LED
Communication	RS485 or WiFi	RS485 or WiFi	RS485 or WiFi
Weight (kg)	39	39	40
Size (Width*Height*Depth mm)	516*650*203mm	516*650*203mm	516*650*203mm
Protection Degree	IP65	IP65	IP65
Night Self Consumption (W)	<1	<1	<1
Topology	Transformerless	Transformerless	Transformerless
Certifications & Standards			
Grid Regulation	VDE0126-1-1, VDE-AR-N 4105, AS4777.2, G83/2, EN50438(PL), EN50438(SW), EN50438(IR), NRS 097-2-1, ERDF-NOI-RES_13E, IEC61727, IEC62116	VDE0126-1-1, VDE-AR-N 4105, AS4777.2, G83/2, EN50438(PL), EN50438(SW), EN50438(IR), NRS 097-2-1,ERDF-NOI-RES_13E, IEC61727, IEC62116, MEA, PEA	VDE0126-1-1, VDE-AR-N 4105, AS4777.2, G83/2, EN50438(PL), EN50438(SW), EN50438(IR), NRS 097-2-1, ERDF-NOI-RES_13E, IEC61727, IEC62116
Safety Regulation	IEC62109-1&2	IEC62109-1&2	IEC62109-1&2
EMC	EN 61000-6-1, EN 61000-6-2, EN 61000-6-3, EN 61000-6-4		

*: Maximum operating voltage is 950V

MT Series G2 (Four-MPPT, Three-Phase)

The second generation of GoodWe MT series inverter is suitable for medium and large scale commercial rooftops and ground-mounted solar PV systems where maximum versatility and profitability are important. With its compact design and power boost function, the GoodWe MT G2 series can provide a 15% continuous maximum AC output power overload, thus offering a faster return on investment. By using the MT G2 series string inverters, customers can benefit from faster installation and minimal system downtime due to short replacement lead time and ease of servicing.

- 30% DC input overloading ratio
- 15% AC output overloading ratio
- Smart monitoring for 13 strings
- Integrated DC & AC type II SPD
- High resolution auto LCD display
- IP65 dustproof and waterproof with IP68 rated cooling fan
- Full-load running at 50°C
- Integrated Bussman fuse for panel protection

Technical Data	GW50K-MT	GW60K-MT
DC Input Data		
Max. PV Power [W]	65000	80000
Nominal DC Power [W]	51500	62000
Max. DC voltage [V]	1000	1000
MPPT voltage range [V]	200~850	200~850
MPPT voltage range of full load [V]	520~850	520~850
Nominal DC Voltage	620	620
Starting Voltage [V]	200	200
Max. DC Current [A]	30/30/20/20	30/30/30/30
Max. Short Current [A]	37.5/37.5/25/25	37.5/37.5/37.5/37.5
No. of DC Connectors	10(3/3/2/2)	12(3/3/3/3)
No. of MPPT	4	4
DC Connector	MC4/Phoenix/Amphenol	MC4/Phoenix/Amphenol
AC Output Data		
Norminal AC Power [W]	50000	60000
Max. AC Power [W]	55000@400Vac,57500@415Vac	66000@400Vac,69000@415Vac
Max. AC Apparent Power [W]	55000@400Vac,57500@415Vac	66000@400Vac,69000@415Vac
Max. AC Current [A]	80	96
Norminal AC Output	50/60Hz; 400Vac	50/60Hz; 400Vac
AC Output Range	45~55Hz/55~65Hz;310~480Vac	45~55Hz/55~65Hz;310~480Vac
THDi	<3%	<3%
Power Factor	~1(Adjustable from 0.80leading to 0.80lagging)	
Grid Connection	3L/N/PE	3L/N/PE
Efficiency		
Max. Efficiency	98.7%	98.8%
Euro Efficiency	98.3%	98.5%
MPPT Adaptation Efficiency	99.9%	99.9%
Protection		
Residual Current Monitoring Unit	Integrated	Integrated
Anti-islanding Protection	Integrated	Integrated
Pv Array String Fault Monitoring	Integrated	Integrated
DC Fuse	Integrated	Integrated
DC Switch	Integrated(optional)	Integrated(optional)
DC SPD	Type II	Type II
AC SPD	Type II	Type II
SPD Fault Monitoring	Integrated	Integrated
AC Over Curent Protection	Integrated	Integrated
Insulation Monitoring	Integrated	Integrated
General Data		
Dimensions (WxHxD)	586*788*264mm	586*788*264mm
Weight (kg)	59	64
Mounting	Wall bracket	Wall bracket
Ambient Temperature Range	-30~60°C	-30~60°C
Relative Humidity	0~100%	0~100%
Operating Altitude(m)	≤4000	≤4000
Protection Degree	IP65	IP65
Topology	Transformerless	Transformerless
Cooling	Fan cooling	Fan cooling
Display	LCD	LCD
Communication	RS485; WiFi	RS485; WiFi
Standard Warranty(years)	5/10/15/20/25(optional)	5/10/15/20/25(optional)
Certifications & Standards		
Grid Regulation	VDE0126-1-1, AS4777.2, G59/3, VDE-AR-N 4105, EN50438, EC61727, IEC62116, PV502	
Safety	EN62109-1&-2	
EMC	EN61000-6-1, EN61000-6-2, EN61000-6-3, EN61000-6-4	

MT Series (Four-MPPT, Three-Phase)

The GoodWe MT series inverter is suitable for large scale commercial rooftop PV systems and large-megawatt utility scale projects where maximum versatility and profitability are important. Equipped with four MPPT trackers, the GoodWe MT series grid-tied inverters can ensure that the outputs of connected modules are able to generate the highest yields even in different PV installation conditions, thus offering a faster return on investment. By using the three phase MT series string inverters, customers can benefit from faster installation and minimal system downtime due to short replacement lead time and ease of servicing.

- Maximum efficiency up to 98.8%
- 4 MPPT trackers for higher yield
- Smart monitoring for 13 strings
- Integrated combiner box
- Integrated DC & AC type II SPD
- IP65 dustproof and waterproof with IP68 rated cooling fan
- Full-load running at 50°C

Technical Data

	GW75KHV-MT
PV String Input Data	
Max. DC Input Power (W)	80000
Max. DC Input Voltage (V)*	1000
MPPT Range (V)	260~850
Start-up Voltage (V)	250
MPPT Range for Full Load (V)	650~850
Nominal DC Input Voltage (V)	740
Max. Input Current (A)	28/28/28/36
Max. Short Current (A)	35/35/35/45
No. of MPP Trackers	4
No. of Input Strings per Tracker	3/3/3/4
AC Output Data	
Nominal Output Power (W)	75000
Max. Output Power (W)	75000
Max. Output Apparent Power (VA)	75000
Nominal Output Voltage (V)	480, 3L/PE
Nominal Ouput Frequency (Hz)	50/60
Max. Output Current (A)	90
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)
Output THDi (@Nominal Output)	<3%
Efficiency	
Max. Efficiency	98.8%
Europe Efficiency	98.5%
MPPT Efficiency	99.9%
Protection	
PV String Current Monitoring	Integrated
Anti-islanding Protection	Integrated
Input Reverse Polarity Protection	Integrated
Insulation Resistor Detection	Integrated
DC SPD Protectioin	Integrated (Type II)
AC SPD Protection	Integrated (Type II)
Residual Current Monitoring Unit	Integrated
Output Over Current Protection	Integrated
Output Short Protection	Integrated
Output Over Voltage Protection	Integrated
General Data	
Operating Temperature Range (°C)	-25~60
Relative Humidity	0~100%
Operating Altitude (m)	≤4000
Cooling	Fan Cooling
User Interface	LCD & LED
Communication	RS485 or WiFi
Weight (kg)	67
Size (Width*Height*Depth mm)	586*915*263
Protection Degree	IP65
Night Self Consumption (W)	<1
Topology	Transformerless
Certifications & Standards	
Grid Regulation	EN50438(PL), IEC61727 IEC62116
Safety Regulation	IEC62109-1&2
EMC	EN 61000-6-1, EN 61000-6-2 EN 61000-6-3, EN 61000-6-4

*: Maximum operating voltage is 950V

ES Series

The GoodWe ES series bi-directional energy storage inverter can be used for both on-grid and off-grid PV systems, with the ability to control the flow of energy intelligently. During the day, the PV array generates electricity which can be provided either to the loads, fed into the grid or charge the battery, depending on the economics and set-up. The electricity stored can be released when the loads require it during the night, including inductive loads such as air conditioners or refrigerators. Additionally, the power grid can also charge the storage devices via the inverter. An all-round intelligent system for maximum energy flexibility.

- Charge controller and inverter integrated
- Export control (Zero export)
- Safe and reliable UPS function with automatic switchover time of 10 ms
- Maximum charge and discharge up to 100A
- IP65 dustproof and waterproof
- Fanless design, long lifespan

Technical Data	GW3648D-ES	GW5048D-ES
PV String Input Data		
Battery Type	Li-Ion or Lead-acid*1	Li-Ion or Lead-acid*1
Nominal Battery Voltage (V)	48	48
Max. Charging Voltage (V)	≤60 (Configurable)	≤60 (Configurable)
Max. Charging Current (A)*1	75	100
Max. Discharging Current (A)*1	75	100
Battery Capacity (Ah)*2	50~2000	50~2000
Charging Strategy for Li-Ion Battery	Self-adaption to BMS	Self-adaption to BMS
PV String Input Data		
Max. DC Input Power (W)	4600	6500
Max. DC Input Voltage (V)	580	580
MPPT Range (V)	125~550	125~550
Start-up Voltage (V)*3	150	150
MPPT Range for Full Load (V)	170~500	170~500
Nominal DC Input Voltage (V)	360	360
Max. Input Current (A)	11/11	11/11
Max. Short Current (A)	13.8/13.8	13.8/13.8
No. of MPP Trackers	2	2
No. of Strings per MPP Tracker	1	1
AC Output Data (On-grid)		
Nominal Apparent Power Output to Utility Grid (VA）	3680	4600
Max. Apparent Power Output to Utility Grid (VA)*4	3680	5100
Max. Apparent Power from Utility Grid(VA)	7360	9200
Nominal Output Voltage (V)	230	230
Nominal Output Freqency (Hz)	50/60	50/60
Max. AC Current Output to Utility Grid (A)	16	24.5*5
Max. AC Current From Utility Grid (A)	32	40
Output Power Factor	~1(Adjustable from 0.8 leading to 0.8 lagging)	
Output THDi（@Nominal Output)	<3%	<3%
AC Output Data (Back-up)		
Max. Output Apparent Power (VA)	3680	4600
Peak Output Apparent Power (VA)*6	5520,10sec	6900,10sec
Max. Output Current (A)	16	20
Nominal Output Voltage (V)	230 (±2%)	230 (±2%)
Nominal Output Freqency (Hz)	50/60 (±0.2%)	50/60 (±0.2%)
Output THDv (@Linear Load)	<3%	<3%
Efficiency		
Max. Efficiency	97.6%	97.6%
Max. Battery to Load Efficiency	94.0%	94.0%
Euro Efficiency	97.0%	97.0%
MPPT Efficiency	99.9%	99.9%
Protection		
Anti-islanding Protection	Integrated	Integrated
PV String Input Reverse Polarity Protection	Integrated	Integrated
Insulation Resistor Detection	Integrated	Integrated
Residual Current Monitoring Unit	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated
Output Short Protection	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated
General Data		
Operating Temperature Range (°C)	-25~60	-25~60
Relative Humidity	0~95%	0~95%
Operating Altitude (m)	≤4000	≤4000
Cooling	Natural Convection	Natural Convection
Noise (dB)	<25	<25
User Interface	LED & APP	LED & APP
Communication with BMS*7	RS485; CAN	RS485; CAN
Communication with Meter	RS485	RS485
Communicaiton with Portal	Wi-Fi	Wi-Fi
Weight (kg)	28	30
Size (Width*Height*Depth mm)	516*440*184	516*440*184
Mounting	Wall Bracket	Wall Bracket
Protection Degree	IP65	IP65
Standby Self Consumption (W)	<13	<13
Topology	High Frequency Isolation	High Frequency Isolation
Certifications & Standards		
Grid Regulation	VDE-AR-N 4105, VDE0126-1-1, AS4777.2, G83/2, CEI 0-21, NRS 097-2-1, EN50438	
Safety Regulation	IEC/EN62109-1&2, IEC62040-1	
EMC	EN61000-6-1, EN61000-6-2, EN61000-6-3, EN61000-6-4, EN 61000-4-16, EN 61000-4-18, EN 61000-4-29	

*1: Lead-acid battery use refers to Approved Battery Options Statement.
The actual charge and discharge current also depends on the battery.
*2: Under off-grid mode, then battery capacity should be more than 100Ah.
*3: When there is no battery connected, inverter starts feeding in only if string voltage is higher than 200V.
*4: 4600 for VDE 0126-1-1 &VDE-AR-N4105, 4950 for AS4777.2(GW5048D-ES); 4050 for CEI 0-21(GW3648D-ES).
*5: 21.7A for AS4777.2
*6: Can be reached only if PV and battery power is enough.
*7: The standard configuration is CAN.

EM Series

The GoodWe EM series bi-directional energy storage inverter can be used for both on-grid and off-grid PV systems, with the ability to control the flow of energy intelligently. During the day, the PV array generates electricity which can be provided either to the loads, fed into the grid or charge the battery, depending on the economics and set-up. The electricity stored can be released when the loads require it during the night. Additionally, the power grid can also charge the storage devices via the inverter. An all-round intelligent system for maximum energy flexibility.

- Smart battery management function
- Export control (Zero export)
- Safe and reliable UPS function with automatic switchover time of 10 ms
- 50A charge & discharge capacity
- IP65 dustproof and waterproof
- Fanless design, long lifespan

Technical Data	GW3048-EM	GW3648-EM	GW5048-EM
Battery Input Data			
Battery Type	Li-Ion or Lead-acid*1	Li-Ion or Lead-acid*1	Li-Ion or Lead-acid*1
Nominal Battery Voltage (V)	48	48	48
Max. Charging Voltage (V)	≤60 (Configurable)	≤60 (Configurable)	≤60 (Configurable)
Max. Charging Current (A)*1	50	50	50
Max. Discharging Current (A)*1	50	50	50
Battery Capacity (Ah)*2	50~2000	50~2000	50~2000
Charging Strategy for Li-Ion Battery	Self-adaption to BMS	Self-adaption to BMS	Self-adaption to BMS
PV String Input Data			
Max. DC Input Power (W)	3900	4600	6500
Max. DC Input Voltage (V)*3	550	550	550
MPPT Range (V)	100~500	100~500	100~500
Start-up Voltage (V)*4	150	150	150
MPPT Range for Full Load (V)	280~500	170~500	230~500
Nominal DC Input Voltage (V)	360	360	360
Max. Input Current (A)	11	11/11	11/11
Max. Short Current (A)	13.8	13.8/13.8	13.8/13.8
No. of MPP Trackers	1	2	2
No. of Strings per MPP Tracker	1	1	1
AC Output Data (On-grid)			
Nominal Power Output to Utility Grid (W)	3000	3680	5000*5
Max. Apparent Power Output to Utility Grid (VA)*6	3000	3680	5000
Max. Apparent Power from Utility Grid(VA)	5300	5300	5300
Nominal Output Voltage (V)	230	230	230
Nominal Output Freqency (Hz)	50/60	50/60	50/60
Max. AC Current Output to Utility Grid (A)	13.6	16	22.8*7
Max. AC Current From Utility Grid (A)	23.6	23.6	23.6
Output Power Factor	~1(Adjustable from 0.8 leading to 0.8 lagging)		
Output THDi (@Nominal Output)	<3%	<3%	<3%
AC Output Data (Back-up)			
Max. Output Apparent Power (VA)	2300	2300	2300
Peak Output Apparent Power (VA)*8	3500,10sec	3500,10sec	3500,10sec
Automatic Switch Time (ms)	10	10	10
Nominal Output Voltage (V)	230 (±2%)	230 (±2%)	230 (±2%)
Nominal Ouput Frequency (Hz)	50/60 (±0.2%)	50/60 (±0.2%)	50/60 (±0.2%)
Max. Output Current (A)	10	10	10
Output THDv (@Linear Load)	<3%	<3%	<3%
Efficiency			
Max. Efficiency	97.6%	97.6%	97.6%
Max. Battery to Load Efficiency	94.5%	94.5%	94.5%
Euro Efficiency	97.0%	97.0%	97.0%
MPPT Efficiency	99.9%	99.9%	99.9%
Protection			
Anti-islanding Protection	Integrated	Integrated	Integrated
PV String Input Reverse Polarity Protection	Integrated	Integrated	Integrated
Insulation Resistor Detection	Integrated	Integrated	Integrated
Residual Current Monitoring Unit	Integrated	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated	Integrated
Output Short Protection	Integrated	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated	Integrated
General Data			
Operating Temperature Range (°C)	-25~60	-25~60	-25~60
Relative Humidity	0~95%	0~95%	0~95%
Operating Altitude (m)	≤4000	≤4000	≤4000
Cooling	Natural Convection	Natural Convection	Natural Convection
Noise (dB)	<25	<25	<25
User Interface	LED & APP	LED & APP	LED & APP
Communication with BMS*9	RS485; CAN	RS485; CAN	RS485; CAN
Communication with Meter	RS485	RS485	RS485
Communicaiton with Portal	Wi-Fi	Wi-Fi	Wi-Fi
Weight (kg)	16	17	17
Size (Width*Height*Depth mm)	347*432*175	347*432*175	347*432*175
Mounting	Wall Bracket	Wall Bracket	Wall Bracket
Protection Degree	IP65	IP65	IP65
Standby Self Consumption (W)	<13	<13	<13
Topology	High Frequency Isolation	High Frequency Isolation	High Frequency Isolation
Certifications & Standards			
Grid Regulation	AS/NZS 4777.2:2015, G83/2, G100, CEI 0-21, VDE4105-AR-N, VDE0126-1-1, NRS 097-2-1, RD1699, UNE206006, EN50438		
Safety Regulation	IEC/EN62109-1&2, IEC62040-1		
EMC	EN61000-6-1, EN61000-6-2, EN61000-6-3, EN61000-6-4, EN 61000-4-16, EN 61000-4-18, EN 61000-4-29		

*1: Lead-acid battery use refers to Approved Battery Options Statement . The actual charge and discharge current also depends on the battery.
*2: Under off-grid mode, then battery capacity should be more than 100Ah.
*3: Maximum operating dc voltage is 530V.
*4: When there is no battery connected, inverter starts feeding in only if string voltage is higher than 200V.
*5: 4600 for VDE0126-1-1&VDE-AR-N4105 & CEI 0-21(GW5048-EM).
*6: For CEI 0-21 GW3048-EM is 3300, GW3648-EM is 4050, GW5048-EM is 5100; for VDE-AR-N4105 GW5048-EM is 4600.
*7: 21.7A for AS4777.2
*8: Can be reached only if PV and battery power is enough.
*9: The standard configuration is CAN.

SBP Series

The GoodWe SBP series is the world's first AC-coupled battery storage retrofit solution with UPS function for both single-phase and three-phase systems. It can effectively upgrade any existing string inverter system by adding battery backup. Capable of being either grid-interactive or independent, it allows users to store surplus power and sell it back to the grid when demand peaks and the price of electricity is at its highest. With its UPS function with an automatic switchover time of less than 10 ms, GoodWe SBP provides uninterruptible power supply to inductive loads such as air conditioners or refrigerators.

- Capable of being grid-interactive or grid-independent
- Suitable for both single-phase and three-phase systems
- Smart battery management function – battery max. discharge power up to 4.6kW
- Export control (zero export)
- Safe and reliable UPS function with automatic switchover time of 10 ms
- Maximum charge and discharge up to 100A
- Fanless design, long lifespan

Technical Data	GW3600S-BP	GW5000S-BP
Battery Input Data		
Battery Type	Li-Ion or Lead-acid*1	Li-Ion or Lead-acid*1
Nominal Battery Voltage (V)	48	48
Max. Charging Voltage (V)	≤60 (Configurable)	≤60 (Configurable)
Max. Charging Current (A)*1	75	100
Max. Discharging Current (A)*1	75	100
Battery Capacity (Ah)*2	50~2000	50~2000
Charging Strategy for Li-Ion Battery	Self-adaption to BMS	Self-adaption to BMS
AC Output Data (On-grid)		
Nominal Power Output (W)	3680	5000*3
Max. Apparent Power Output (VA)*4	3680	5000
Max. Apparent Power Input (VA)	7360	9200
Nominal Output Voltage (V)	230	230
Nominal Output Freqency (Hz)	50/60	50/60
Max. AC Current Output (A)	16	22.8*5
Max. AC Current Input (A)	32	40
Output Power Factor	~1 (Adjustable from 0.8 leading to 0.8 lagging)	
Output THDi (@Nominal Output)	<3%	<3%
AC Output Data (Back-up)		
Max. Output Apparent Power (VA)*6	3680	5000
Peak Output Apparent Power (VA)*6	4416, 10sec	5500, 10sec
Automatic Switch Time (ms)	<10	<10
Nominal Output Voltage (V)	230 (±2%)	230 (±2%)
Nominal Ouput Frequency (Hz)	50/60 (±0.2%)	50/60 (±0.2%)
Max. Output Current (A)	16	22.8
Output THDv (@Linear Load)	<3%	<3%
Efficiency		
Max. Efficiency	95.5%	95.5%
Protection		
Anti-islanding Protection	Integrated	Integrated
Output Over Current Protection	Integrated	Integrated
Output Short Protection	Integrated	Integrated
Output Over Voltage Protection	Integrated	Integrated
General Data		
Operating Temperature Range (°C)	-25~60	-25~60
Relative Humidity	0~95%	0~95%
Operating Altitude (m)	≤4000	≤4000
Cooling	Natural Convection	Natural Convection
Noise (dB)	<25	<25
User Interface	LED & APP	LED & APP
Communication with BMS*7	RS485; CAN	RS485; CAN
Communication with Meter	RS485	RS485
Communicaiton with Portal	Wi-Fi	Wi-Fi
Weight (kg)	18.5	18.5
Size (Width*Height*Depth mm)	347*432*190	347*432*190
Mounting	Wall Bracket	Wall Bracket
Protection Degree	IP65	IP65
Standby Self Consumption (W)	<15	<15
Topology	High Frequency Isolation	High Frequency Isolation
Certifications & Standards		
Grid Regulation	AS/NZS 4777.2:2015, G83/2, G100, CEI 0-21, RD1699, UNE206006, VDE4105-AR-N, VDE0126-1-1, EN50438	
Safety	IEC62477-1, IEC62040-1	
EMC	EN 61000-6-1, EN 61000-6-2, EN 61000-6-3, EN 61000-6-4, EN 61000-4-16, EN 61000-4-18, EN 61000-4-29	

*1: Lead-acid battery use refers to Approved Battery Options Statement . The actual charge and discharge current also depends on the battery.
*2: Battery capacity could be not less than 100Ah where the back-up function is to be applied.
*3: 4600 for VDE0126-1-1&VDE-AR-N 4105 and CEI 0-21.
*4: For CEI 0-21 GW3648-EM is 4050, GW5048-EM is 5100; for VDE-AR-N4105 GW5048-EM is 4600.
*5: 21.7A for AS4777.2
*6: Can be reached only if battery capacity is enough, otherwise will shut down.
*7: The standard configuration is CAN.

BP Series

The GoodWe BP is a DC-coupled retrofit battery management system which offers PV plant owners the opportunity to integrate a battery storage solution to their existing installation. Compatible with most brands of single phase on-grid inverters, the BP Series intelligently manages the PV yield of a system allowing generated electricity to be directed within the home, fed to the grid or used to charge battery storage devices.

Electricity stored within batteries can be released when domestic loads are high but PV generation is not possible, helping to synchronize energy production and consumption.

The BP Series offers installers the opportunity to improve existing PV systems for customers with the prospect of increase self-consumptions and reduced reliance on grid supplied electricity.

- BMS communication integrated
- Nominal 48V battery, secure and reliable
- Higher self-consumption ratio
- IP65
- Fanless and quiet
- Full-load running at 45°C

Technical Data

	GW2500-BP
Battery Input Data	
Battery Type	Li-Ion or Lead-acid*1
Nominal Battery Voltage (V)	48
Max. Charging Voltage (V)	≤60 (Configurable)
Max. Charging Current (A)*2	50
Max. Discharging Current (A)*2	50
Battery Capacity (Ah)	50~1000
Charging Strategy	Self-adaption to BMS
PV String Input Data	
Max. DC Input Power (W)	6000
Max. DC Input Voltage (V)	500
Operating Voltage Range(V)	150~450
Start-up Voltage (V)	120
Max. Input Current (A)	25
No. of PV String Input Connectors	1
DC Output Data	
Output Voltage during Daytime	Follow the MPP Tracker of Inverter
Rated Output Voltage at Night (V)	360
Output Voltage Range (V)	250~360
Max Output Current (A)	10
No. of DC Output Connectors	1
Efficiency	
Max. Efficiency	96.5%
Protection	
PV String Input Reverse Polarity Protection	Integrated
Battery Over&Low Voltage Protection	Integrated
Output Over Current Protection	Integrated
Output Short Protection	Integrated
General Data	
Operating Temperature Range (°C)	-25~60
Relative Humidity	0~95%
Operating Altitude (m)	4000
Cooling	Natural Convection
Noise (dB)	<25
User Interface	LCD & APP
Communication with BMS	RS485; CAN (via EzConverter*3)
Communication with Meter	RS485
Communicaiton with Portal	Wi-Fi
Weight (kg)	8
Size (Width*Height*Depth mm)	344*274.5*128
Mounting	Wall Bracket
Protection Degree	IP65
Standby Self Consumption (W)	<8
Topology	High Frequency Isolation
Certifications&Standards	
Safety Regulation	CE
EMC	CE

*1: Lead-acid battery use refers to Approved Battery Options Statement.
*2: Charge & discharge current follows the command of BMS which doesn't exceed 50A. Note: Pylon US2000A default charge rate is 0.5C.
C means the battery capacity, such as the capacity is 50Ah, default charge current 0.5C is 0.5 * 50 = 25A.
*3: EzConverter is a device that acts as a protocol converter between BP and BMS of battery.

Smart Energy Management System

SEMS (Smart Energy Management System) is a comprehensive energy management system which integrates all different layers of communication, information and applications. Broadly speaking, SEMS puts every system component in an information environment that is interconnected rather than requiring actual physical connections.

Why do DNOs need SEMS?

Large installations can affect the stability of traditional energy distribution because of lack of management, dispatch and forecast. The GoodWe system has the functionality to maintain stability in independent situations. Meanwhile, users of large systems have additional requirements about their power generation. They are no longer content to merely monitor how much electricity their system produces or whether it is working optimally on their roof.

How does SEMS V1.0 manage your power?

1. Is already compatible with various batteries to store electricity generated from rooftop solar panels during the day, so that electricity can be used at night during peak-usage times. Users can use a mobile APP to control the flow of the energy and manage the batteries intelligently.

2. Supports remote control, management and updates so that users can get immediate problem solving and the latest operating software. Also, SEMS V1.0 integrates a smart chip in its solar inverter to realize high levels of data transmission encryption. This ensures the system operates effectively and in a safe condition.

3. Is fully compatible with MQTT (Message Queuing Telemetry Transport). MQTT is the important connectivity protocol “Internet of Thing” which supports SEMS to access and control smart homes. Users can manage household appliances, control and monitor their energy usage through SEMS.

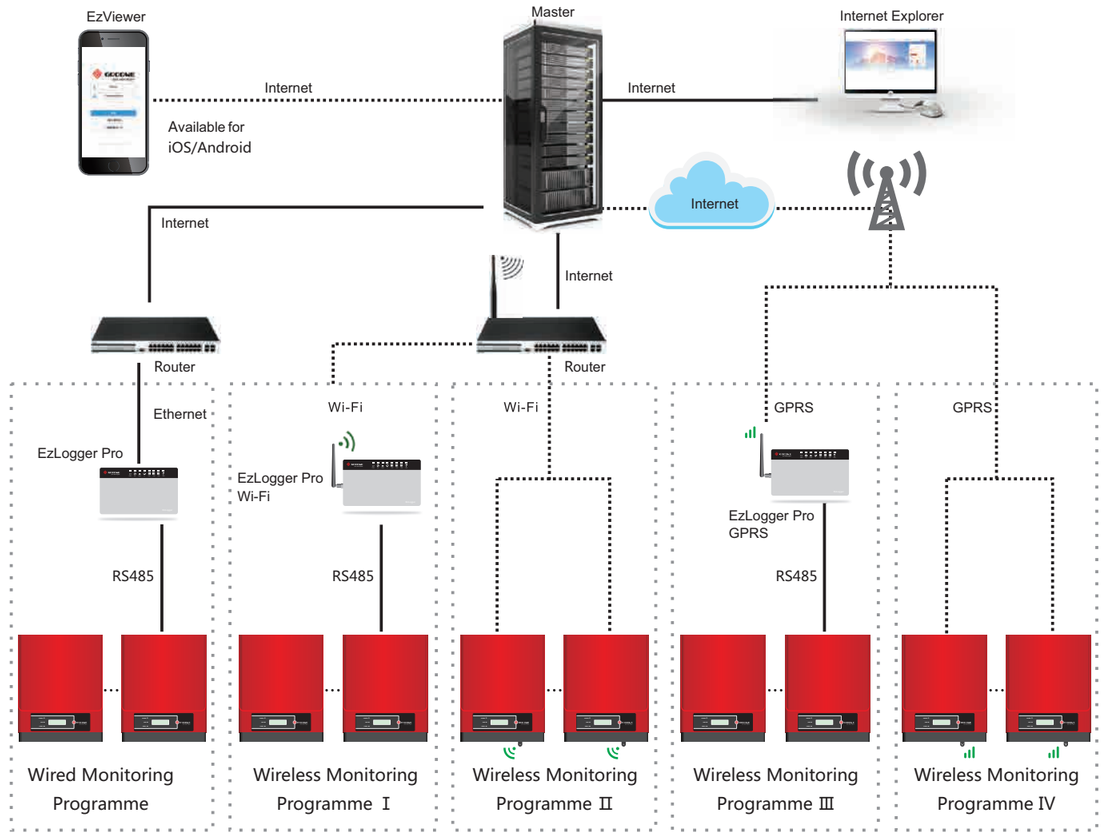
"Global energy is undergoing significant changes; we are in the era of the combination of information technology and energy systems. GoodWe is no longer just a component manufacturer. We are committed to building a Smart Energy Management System to manage the production, usage and scheduling of energy; to realize real-time monitoring, analysis and optimization via its data and cloud computing; to support free trade of distributed energy; to achieve optimal economic benefits and social benefits,” said GoodWe's General Manager, Mr. Huang Min.

GoodWe Monitoring System

General Introduction

We can provide our customers with a flexible internet monitoring solution which is suitable for residential, commercial rooftop systems and PV power plants. System monitoring device is user-friendly and reliable. It can archive all-weather data and automatically transmit data to our global PV monitoring web-server via internet. Our customers can login monitoring website or use smart phone Apps to check power plant information.

Monitoring System Diagram



EzLogger Pro

EzLogger is a self-developed monitoring device by GoodWe. In combination with a GoodWe solar inverter, it can easily read and record all key plant data and constantly transmit the data to the GoodWe portal via internet.

- EzLogger: link to the inverter via RS485 and connect with PC via ethernet, and transmit data to GoodWe monitoring software EzExplorer and GoodWe portal.

- EzLogger Wi-Fi: link to the inverter via RS485 and connect with wireless router via Built - in Wi-Fi communication module, and transmit data to GoodWe portal.

EzViewer

EzViewer is a PV system monitoring App developed by GoodWe which can be installed in your smart phone, iOS and Android available, it can link to GoodWe portal via internet in order to track the behavior and yields of PV power plants at any time.

Internet Monitoring Advantages

- Two basic communication choices of inverter: Wired RS485 and Wi-Fi
- Monitor the global PV power plants and automatically implement data acquisition via internet
- Equipped with data collector designed especially for enterprises to ensure data security
- Log-in web-server at any time via Internet Explorer to obtain information of PV power plants
- Support with iOS / Android APPs, rich and visual graphic display

Interface for Internet Monitoring

GoodWe Five-star Service System

Consulting Service

System design includes the selection of photovoltaic modules and inverters, detailed scheme for system design, and the detection system.

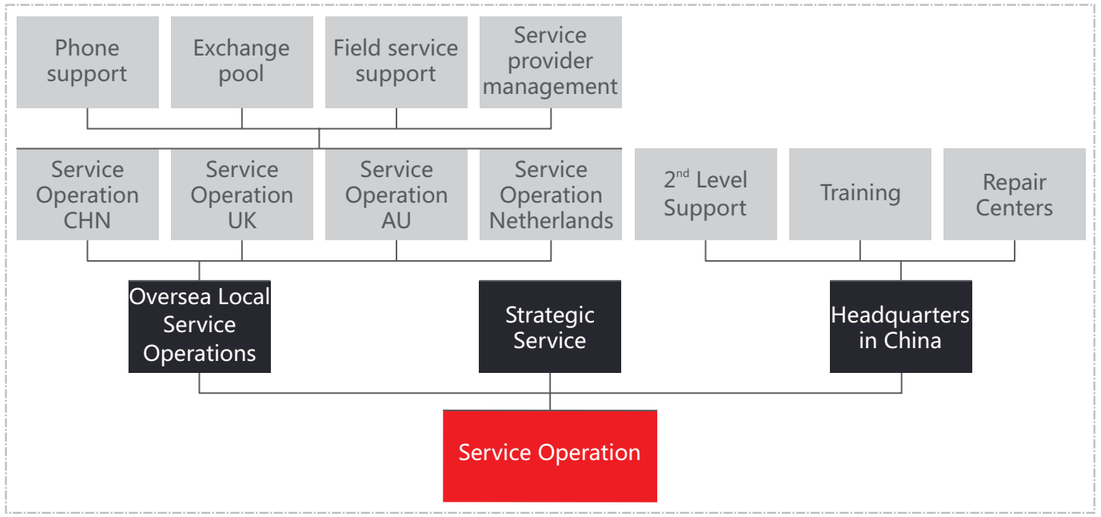
Field Service

GoodWe provides professional and efficient field installation and debugging service to ensure the smooth completion of project until successful generation.

After-sales service

GoodWe Customer-service System provides you with great service including assistance with system design, installation, debugging and troubleshooting.

Service Organization



GoodWe provides customized warranty service; in order to better service our dear clients, the warranty period is optional, including 5 years, 10 years, 15 years, 20 years and 25 years. Within the warranty period, GoodWe provides repair or replacement services free of charge. In case of any inverter failure beyond quality warranty period, only cost price will be charged for maintenance or machine replacement. The quality warranty period will be prolonged one year for the components after replacement.

GoodWe is cooperating with DSV (a famous international logistics company) and has set up bonded warehouses, to ensure that delivery on time, which is a good way to make the customer's needs our first priority.

Global Service Hotline: +86 4009-281-333

CEI 0-21 ISO 14001 RD1699

GoodWe Solar Academy

GoodWe Solar Academy is hosted by Goodwe Power Supply Technology Co., LTD. and co-organized by a number of strategic partners, focusing on solar industry and product application. It provides an open platform for communication and sharing, offering expertise and advanced training for the participants on GoodWe products and PV solution.

GoodWe Solar Academy can also provide custom-made photovoltaic products' application training, routine problem analysis and typical cases at the same time.

Workshop

Commercial Projects

5MW, the Netherlands

2MW, Korea

200kW, Australia

185kW, PV Carport, South Korea

100kW, Chinese poverty alleviation

500kW, Shanghai, China

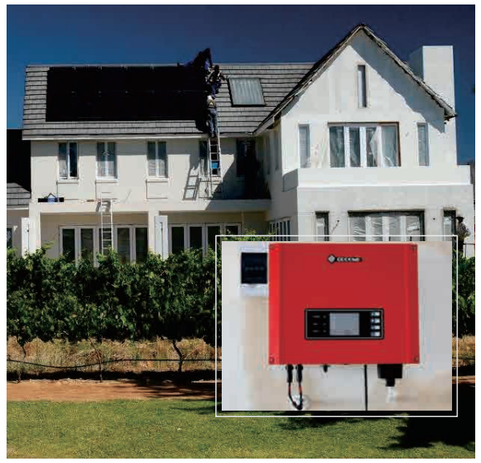
30kW, Petrol station

250kW, Shangdong, China

2MW, Zhejiang, China

Residential Projects

20kW, UK



6kW, South Africa

20kW, Germany

6kW, Denmark

6kW, Denmark

Capel St. Mary (GoodWe Village), UK

4.6kW, South Africa

4kW, Malaysia

8kW, Netherlands

40kW, South Africa

17kW, Hebei, China

8kW, Denmark

8kW, School of South Africa

17kW, South Africa

16X15kW, Jiangsu, China

Hybrid Inverter Projects

15kW, Australia

5kW, Australia

5kW, Sydney

5kW, Czech Republic

Series	Model	CE	VDE0126-1-1 (Europe)	VDE-AR-N 4105 (Germany)	EN/IEC 62109-1&-2 (Europe)	IEC 62477-1 (Europe)	AS 62040.1.1 (Australia)	AS4777.2 (Australia)	G83/2 (England)	G59/3 (England)	G100 (England)	NB-T 32004 (China)	GB/T19964 (China)	EN50438+ VDE0126-1-1/A1 (Poland)	NRS 097-2-1 (S. Africa)	MEA (Thailand)	PEA (Thailand)	ERDF-NOI-RES_13E (France)	IEC61727 IEC62116	IEC60068 IEC61683	EN50530	PV502 (Korean)	CEI0-21 (Italy)	RD1699 (Spain)	Barbados	Chile	EN50438 (Sweden)	IEEE1547 (America)	EN50438 (Irish)
NS	GW1000-NS																												
	GW1500-NS																												
	GW2000-NS																												
	GW2500-NS																												
	GW3000-NS																												
DNS	GW3000D-NS																												
	GW3600D-NS																												
	GW4200D-NS																												
	GW5000D-NS																												
	GW6000D-NS																												
SDT	GW4000-DT																												
	GW5000-DT																												
	GW6000-DT																												
	GW4000L-DT																												
	GW5000L-DT																												
	GW6000L-DT																												
	GW10KL-DT																												
	GW8000-DT																												
	GW9000-DT																												
	GW10KN-DT																												
	GW15KN-DT																												
DT	GW15K-DT																												
	GW17K-DT																												
	GW20K-DT																												
	GW25K-DT																												
	GW30K-DT																												
LVDT	GW12KLV-DT																												
	GW15KLV-DT																												
MT	GW50K-MT																												
	GW60K-MT																												
	GW75K-MT																												
MTG2	GW50K-MT																												
	GW60K-MT																												
ES	GW3648D-ES																												
	GW5048D-ES																												
BP	GW2500-BP																												
SBP	GW3600S-BP																												
	GW5000S-BP																												
EM	GW3048-EM																												
	GW3648-EM																												
	GW5048-EM																												
HF	GW3000-HF																												
	GW3000D-HF																												
	GW4000D-HF																												
	GW5000D-HF																												
	GW5KHV-HF																												

CERTIFICATES

RD1699 ISO 9001:2008 CEI 0-21 westernpower Clean Energy Council ACCREDITED

Official Website

Company Wechat

GOODWE

YOUR SOLAR ENGINE

4G

Good Quality, Good Value, Good Service, GoodWe!

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