

Contact

IGEN Tech Co., Ltd.

 Add: Block F4, China IoT International Innovation Park, No. 200,
Linghu Avenue, Wuxi, Jiangsu, P. R. China

 Sales Inquiries: info@solarmanpv.com

 After-sales Inquiries: customerservice@solarmanpv.com

 Website: www.solarmanpv.com

Single-phase Remote Control Meter (WiFi)

Product Model:

DDZY422-D2



Product Introduction

Single-phase Remote Control Meter (WiFi) (DDZY422-D2-W) is applied for energy management purpose, and it works to measure and control electricity consumption of PV system, power system, construction industry and etc,. A real-time, accurate and quick measurement of voltage, current, active power, frequency, power factor, positive/negative active energy and etc, has been realized.

	Parameter	Value
Communication	Wireless Type	WiFi
	Working Frequency	2.412GHz~2.484GHz
	Local COM	RS485
	Serial Parameter	Address 001、9600bps、E、8、1
	Data Interval	5 mins

Meter	Rated Voltage	AC 230V 5 (60)A 50/60Hz
	Power Range	0 ~ 999999.99kWh
	Accuracy Class	1.0
	Consumption	≤3.5W
Environment	WorkingTemperature	-30°C ~ +70°C
	Relative Humidity	≤85%(No condensation), Altitude<3000m
	Atmospheric Pressure	70kPa ~ 106kPa
	Transportation&Storage	Temperature: -40°C ~ 85°C , Relative Humidity≤85%

Display

3.1 Display Panel (Note: “*”represents single number,“#”represents“-”).

Flip-screen Mode: Auto-flip in 2s.

Click to flip the screen.

No.	Content	Display Form	Unit	No.	Content	Display Form	Unit
1	Positive Active TotalEnergy (High 4-bit)	****	kWh	5	Current	L #**	A
2	Positive Active Total Energy (Low4-bit) (Two decimal)	**.**	kWh	6	Power	P #**	kW
3	MODBUS COM Address	A ***		7	Power Factor	PF *.*	
4	Voltage	U ***	V	8	Frequency	F *.*	

3.2 Display of Positive Active Total Energy (4-bit liquid crystal, 2 decimal)

Data is less than 99.99, E.g.“68.52”:	Data is greater than 99.99, E.g.“220968.52”:

Interface Instruction

		Switch	Close: Press for 3s Open: Press for 3s
	A	RS485 A Receive&Send Data	Address 001、 9600 bps、 E、 8、 1
	B	RS485 B Receive&Send Data	
	+	Pulse Port	Calibration Interface
	-	Pulse Port	
	L↓	L-Line In	L-line Interface
	L↑	L-Line Out	
	N	N-Line In&Out	N-Line Interface
	485B	RS485 B Receive&Send Data	Address 001、 9600 bps、 E、 8、 1
	485A	RS485 A Receive&Send Data	
	Pin1	RS485 A Receive&Send Data	Address 001、 9600 bps、 E、 8、 1
	Pin2	RS485 B Receive&Send Data	
		Reset button	Restart(5s)/Reset(10s)

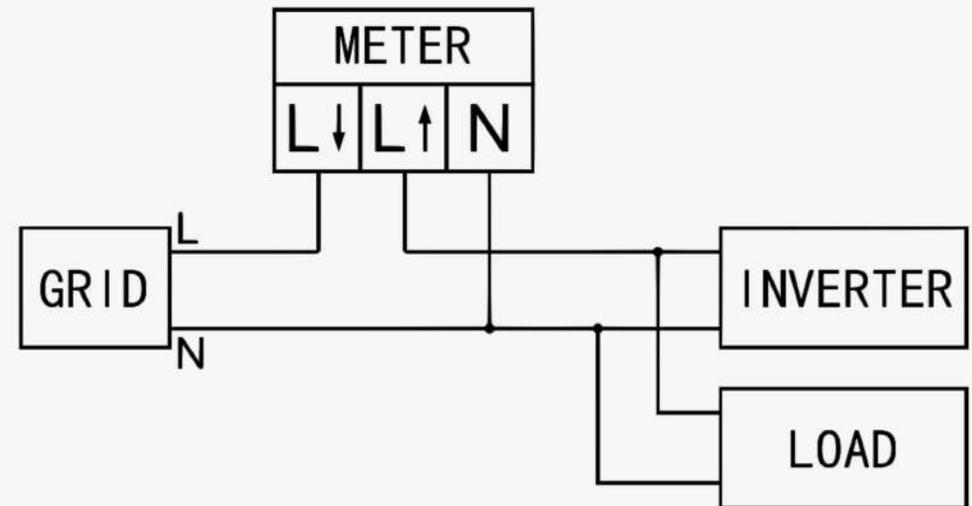
Notice: RS485A, RS485B of pin, female header are directly connected.

Indicator Lights

Indication	Identification	Status
	ON/OFF Switch (Green)	<ol style="list-style-type: none"> 1. On: Close 2. Off: Open
	Electric Energy Pulse (Red)	<ol style="list-style-type: none"> 1. Flash: According to consumption status. (1200 times means 1kWh)
	Communication status between meter and WiFi module (Green)	<ol style="list-style-type: none"> 1. On: Connected to meter. 2. On 400ms/Off 400ms: Data transmitting. 3. Off: Fail to communicate with to meter.
	Communication status between logger and server (Green)	<ol style="list-style-type: none"> 1. On: Connected to server. 2. On 400ms/Off 400ms: Connected to router, not connected to server. 3. Off: Fail to connect to router.
	Running Status (Green)	<ol style="list-style-type: none"> 1. On 64ms/Off 2000ms: WiFi module runs normally. 2. On/Off: WiFi module runs abnormally.

Installation Diagram

Installation Position: Grid Side



WiFi Configuration

7.1 Prepare a computer/smart phone that can connect to wireless network. Connect to logger AP (Please do Not connect the cable when configuring the logger.) Select and connect AP XXXXXXXXX in the network list (XXXXXXXXX means logger SN).



7.1.1 Log in to logger WEB page

Open a browser and enter 10.10.100.254.

Username: admin

Password: admin



Notice:

Supported browser: IE 8+, Chrome 15+, Firefox 10+

7.2 Go to "Setup Guide" and click "Start".





Notice:

1. Router name and password cannot have special characters, e.g. \ ; , = ' " .
2. 5 G WiFi is not supported.

7.3 Select "Wireless connection".

7.4 Select WiFi router name.

7.5 Enter router password.

7.6 Modify AP password to enhance safety.

Status
Wizard
Wireless
Cable
Advanced
Upgrade
Restart
Reset

Enhance Security

You can enhance your system security by choosing the following methods

Hide AP

Change the encryption mode for AP

Encryption mode: WPA2-PSK

WPA encryption

Encryption algorithm: TKIP AES TKIPAES

Password (8 to 63 characters): 12345678

Change the user name and password for Web server

Back Next

1 2 3 4 5 **6** 7

7.7 WiFi configuration is done.

Status
Wizard
Wireless
Cable
Advanced
Upgrade
Restart
Reset

Configuration completed!

Click OK, the settings will take effect and the system will restart immediately.

If you leave this interface without clicking OK, the settings will be ineffective.

Back OK



Notice:

Click "Done" to reboot system, which might take 1 minute.

Monitoring

8.1 Download app

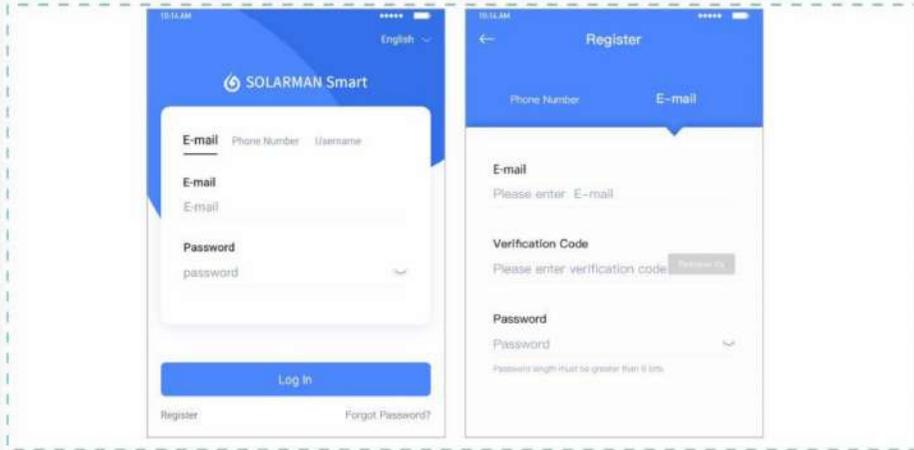


iPhone: Search "SOLARMAN Smart" in Apple Store.

Android: Search "SOLARMAN Smart" in Google Play.

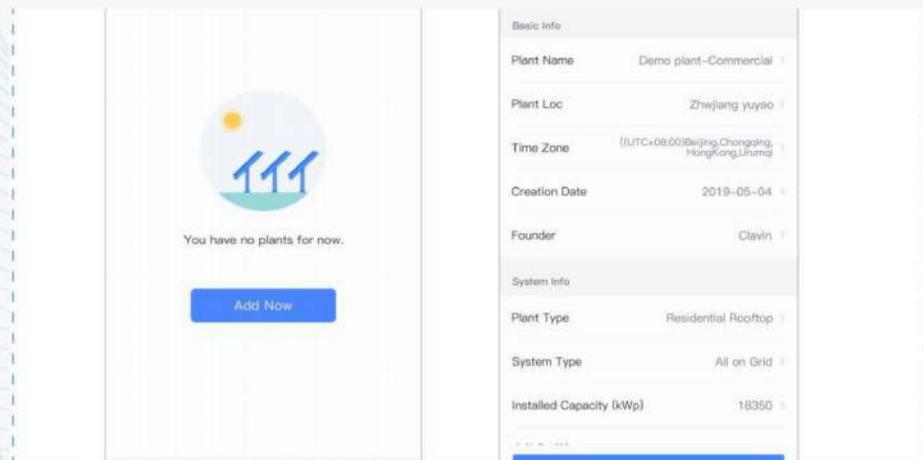
8.2 Registration on SOLARMAN Smart

Go to SOLARMAN Smart and register. Click "Register" and create your account here.



8.3 Create a Plant

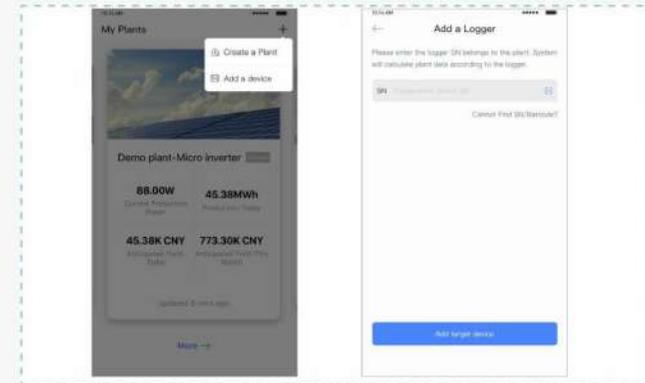
Click "Add Now" to create your plant. Please fill in plant basic info and other info here.



8.4 Add a Device

Method 1: Enter logger SN manually.

Method 2: Click the icon in the right and scan to enter logger SN. You can find logger SN in the external packaging or on the logger body.



8.5 Meter Configuration

Go to 「Device Info」 and click "Configure" button.

