HYDRO-PRO

Environmental Control System



Contents

1.1	Regist	tration	01
	1.1.1 1.1.2	Application Download Registering an Account	01 02
1.2	Bindir	ng a New Device	03
1.3	Mobil	e Applications Instructions	07
	1.3.1	Home Page	07
	1.3.2	Device Details	09
	1.3.3	CO2 Setting	11
	1.3.4	Humidity Settings	14
	1.3.5	Temperature setting	15
	1.3.6	Lighting Control	16
	1.3.7	General Settings	17
1.4	Webs	ite	18

1.1 Registration

1.1.1 Application Download

Scan and download overseas application :





1.1.2 Registering an Account

Tap [Quick Registration] on the login interface

Pro-Leaf [®]						
Email/Name Password	Email or Username Please enter 6 to 24 characte					
	Sign in					
Fast registration Forget password						

Enter the Username, E-mail and Password, the APP will send the verification code by email, use the verification code in the Inbox (maybe in the spam), complete the registration with verification code, and log in the APP after successful registration.

Pro-Leaf [®]						
Username	Enter username					
Email	name@example.com					
Password	Please enter 6 to 24 characo					
Confirm password	Please enter 6 to 24 chara 👁					
City	Please select a city					
Code Ema	ail Code Send Code					
Register						
	Register					

1.2 Binding a New Device

You need to restart the Hydro-Pro after plugged into the internet cable to connect to the Internet.

Step 1: Tap SYSTEM SETTING:

÷.	Daytime	Mode	10:49:05 11-01-2020	(CONNECTION STATUS 05	SYSTEM SETTING	CLIMATE
C	LIMATE				CO2 PPN	1100	Alarm
		44.7 %RH Humidify: Dehumidify:	Alarm 30 %RH 90 %RH		647 CO2	Targe Deadbanc High CO2 PPN Protectior	:: 1200 :: 200 <u>:</u> 5000
	TEMP	Deadband: 28.5 ℃	5 %RH		LIGHT	Ala CHANNEL 1	rm CHANNEL 2
	E + +	Heat: Cool: Deadband:	15.0 ℃ 35.0 ℃ 5.0 ℃		Type: ON at: OFF at:	LED 08:00 18:00	HID 08:30 18:30
	VPD	1.73			MODE: OUTPUT MAX:	Auto 80%	FOLLOW 60%

Step 2: Tap NET SETTING:

SYSTEM SETTING	Save Home
System Version: V1.00 Update	System Setting
Date Setting 2017-03-22	Sensor List
	Station List
Time Setting 15:20:29 12-nour 24-nour	AUX List
Alarm ON OFF Unit CC F	NET Setting
	d
BacklightGreen ON OFF	e

Step 3: IP shows the LAN IP means that the network is worked. The overseas SERVER IP shows Amazon Cloud , and the domestic shows SERVER IP Alibaba Cloud.

SETTING						
MODBUS ID	247 26BAB418	DNS	SYSTEM SETTING			
IP	192.168.0.215		SENSOR LIST			
GATEWAY 192.168.0.1			DEVICE LIST			
GAILWAI			AUX LIST			
NETMASK	255.255.255.0		NET SETTING			
SERVER IP	192.168.0.128	MANUAL				
PORT	6800		FACTORY RESET			

Step 4: Open the mobile APP and click on the upper right corner "+" enter the Scan page and scan the QR code of the device on the NET SETTING page to bind the device.

Note: If your device does not automaticly connect to APP due to certain limitations of router, please follow below steps to resolve this issue.

Step 1: Switch to manual mode then enter IP: 13.57.62.222

Step 2: Reboot the device.





Step 5: Tap the "Device not bound" to bind the device.



Step 6: Enter the device name, select the area, and tap confirm to complete the process.

Modify device name						
HDP	HDP					
Please select area						
Cancel	Confirm					

1.3 Mobile Applications Instructions

1.3.1 Home Page

Tap the B icon on the upper left corner to manage multiple grow areas. Grower can add new devices to a specified area, an area can have multiple devices, but a device can only in one area.



Grower can tap the icon of a area to query the device status in this area. This icon sindicates that the device is online.



1.3.2 Device Details

← Device Detai	s	Ø
1		
СО2 492 РРМ UP	Max Min	2146 377
Humidity 52.9% Humidification	Max Min	76.9% 29.8%
Temperature 28.6°C Cooling	Max Min	32.4°C 23.1°C

Tap CO2, humidity, temperature, light to enter the setting page.

Tap the device name grower can rename the device and corresponding area:



CO2, humidity and temperature statistics can be displayed on a daily/week-ly/monthly basis.



1.3.3 CO2 Setting

The WORKING modes of CO2 are Monitoring mode /PPM UP/Fuzzy Logic. The working mode switch takes effect immediately without save.

When the working mode is PPM UP or Fuzzy Logic:

(1) When CO2 & TEMP lock is On, the CO2 device will be shut down during cooling process.

(2) When CO2 & HUMI Lock is On, the CO2 device will be shut down during dehumidifying process.

CO2					
Working mode		F	PPM UP)	
Target		-	1200	+	ppm
Deadband		-	300	+	ppm
High Alarm		-	2000	+	ppm
CO2 & Temp Lock				10	
CO2 & HUMI Lock				\bigcirc	OFF
	Save s	ettings			

When CO2 & TEMP lock is On, the CO2 device will be shut down during cooling process.

← Device Detail	S	ගි
1		
CO2 & Temp Lock	Max Min	2146 377
Humidity 52.6% Humidification	Max Min	76.9% 29.8%
Temperature 28.8°C Cooling	Max Min	32.4°C 23.1°C

When CO2 & HUMI Lock is On, the CO2 device will be shut down during dehumidifying process.

← Device Detail	ls	Ø
() 1		
CO2 & Humi Lock	Max Min	2146 377
Humidity 52.0% Dehumidification	Max Min	76.9% 29.8%
Temperature 28.8°C Cooling	Max Min	32.4°C 23.1°C

1.3.4 Humidity Settings

Humidity working mode: monitoring mode/humidification/dehumidification/automatic. The working mode switch takes effect immediately without save.

(1) When the working mode is humidification, only the humidification target value can be modified. When the ambient humidity is lower than the preset value, the humidifier starts.

(2) When the working mode is dehumidification, only the dehumidification target value can be modified. When the ambient humidity is higher than the preset dehumidification target, the dehumidifier starts.

← General settings						
Humidity						
Working mode	Dehumi	dificatio	on			
	_					
Humidification Target	-	0	+	%		
Dehumidification Target	-	40.0	+	%		
Deadband	-	2.0	+	%		
Low Alarm	-	25.0	+	%		
High Alarm	-	90.0	+	%		
Save settings						

1.3.5 Temperature setting

Temperature working mode: monitoring mode/heating/cooling/automatic. The working mode switch takes effect immediately without clicking save.

(1) When the working mode is heating, only the heating target value can be modified. When the temperature is lower than the heating target value, start the heating device.

(2) When the working mode is cooling, only the cooling target value can be modified. When the temperature is higher than the cooling target value, start the cooling device.

← General setting	s			
Temperature				
Working mode	Cooling			
Heating Target	-	0	+	°C
Cooling Target	-	25.0	+	°C
Deadband	-	2.0	+	°C
Low Alarm	-	10.0	+	°C
High Alarm	-	40.0	+	°C
Save settings				

1.3.6 Lighting Control

(1) Channel 1 working mode includes Manual mode and Automatic mode.

(2) Channel 2 working mode includes Manual mode, Following mode and Independent mode.

(3) Temperature control setting is effective for Channel 1 and Channel 2, and the following settings Automatic dimming temperature , Automatic off temperature, sunrise and sunset time are set for both Channels.

← General settings							
Channel 1							
Working mode	Manual						
Output Max			100	+	%		
On Time	08:00						
Off Time	18:00						
Light Type	LED						
HID Delay		_	3	+	min		
Save settings							
Auto Dim TEMP		-	30.0	+	°C		
Auto Off TEMP		-	35.0	+	°C		
Sunrise and sunset time _ 30 .		+	min				
Save settings							

1.3.7 General Settings

Tap On the upper right corner of device to enter General Settings page.

(1) System Configuration: Grower can set the Temperature unit and System time.

← General settings					
System configuration Location					
Temperature unit	°C				
Save settings					
System Time	2021-03-31 10:40:46				

(2) Location setting You can set the geographical location of the device and unbind the device.

← General settings				
System configuration	Location			
Region selection				
Province anPlease select		\$		
Prefecture I		\$		
district and		¢		
street		¢		
Determi	ne the choice			
ι	Jnbind			

1.4 Website

To access the PC web version, enter the address:

http://guardian.pro-leaf.com/pc/html/home/device_pc_index.html in the PC browser.Please refer to the user manual of the mobile app for operating instructions.