

#### Mandatory actions to be taken towards cybersecurity

#### 1. Change Passwords and Use Strong Passwords:

The number one reason systems get "hacked" is due to having weak or default passwords. It is recommended to change default passwords immediately and choose a strong password whenever possible. A strong password should be made up of at least 8 characters and a combination of special characters, numbers, and upper and lower case letters.

#### 2. Update Firmware

As is standard procedure in the tech-industry, we recommend keeping NVR, DVR, and IP camera firmware up-to-date to ensure the system is current with the latest security patches and fixes.

#### "Nice to have" recommendations to improve your network security

#### 1. Change Passwords Regularly

Regularly change the credentials to your devices to help ensure that only authorized users are able to access the system.

#### 2. Change Default HTTP and TCP Ports:

• Change default HTTP and TCP ports for systems. These are the two ports used to communicate and to view video feeds remotely.

• These ports can be changed to any set of numbers between 1025-65535. Avoiding the default ports reduces the risk of outsiders being able to guess which ports you are using.

#### 3. Enable HTTPS/SSL:

Set up an SSL Certificate to enable HTTPS. This will encrypt all communication between your devices and recorder.

#### 4. Enable IP Filter:

Enabling your IP filter will prevent everyone, except those with specified IP addresses, from accessing the system.

#### 5. Change ONVIF Password:

On older IP Camera firmware, the ONVIF password does not change when you change the system's credentials. You will need to either update the camera's firmware to the latest revision or manually change the ONVIF password.

#### 6. Forward Only Ports You Need:

• Only forward the HTTP and TCP ports that you need to use. Do not forward a huge range of numbers to the device. Do not DMZ the device's IP address.

• You do not need to forward any ports for individual cameras if they are all connected to a recorder on site; just the NVR is needed.

## 7. Disable Auto-Login on SmartPSS:

Those using SmartPSS to view their system and on a computer that is used by multiple people should disable auto-login. This adds a layer of security to prevent users without the appropriate credentials from accessing the system.

## 8. Use a Different Username and Password for SmartPSS:

In the event that your social media, bank, email, etc. account is compromised, you would not want someone collecting those passwords and trying them out on your video surveillance system. Using a different username and password for your security system will make it more difficult for someone to guess their way into your system.

### 9. Limit Features of Guest Accounts:

If your system is set up for multiple users, ensure that each user only has rights to features and functions they need to use to perform their job.

### 10. UPnP:

• UPnP will automatically try to forward ports in your router or modem. Normally this would be a good thing. However, if your system automatically forwards the ports and you leave the credentials defaulted, you may end up with unwanted visitors.

• If you manually forwarded the HTTP and TCP ports in your router/modem, this feature should be turned off regardless. Disabling UPnP is recommended when the function is not used in real applications.

### 11. SNMP:

Disable SNMP if you are not using it. If you are using SNMP, you should do so only temporarily, for tracing and testing purposes only.

### 12. Multicast:

Multicast is used to share video streams between two recorders. Currently there are no known issues involving Multicast, but if you are not using this feature, deactivation can enhance your network security.

### 13. Check the Log:

If you suspect that someone has gained unauthorized access to your system, you can check the system log. The system log will show you which IP addresses were used to login to your system and what was accessed.

### 14. Physically Lock Down the Device:

Ideally, you want to prevent any unauthorized physical access to your system. The best way to achieve this is to install the recorder in a lockbox, locking server rack, or in a room that is behind a lock and key.

### 15. Connect IP Cameras to the PoE Ports on the Back of an NVR:

Cameras connected to the PoE ports on the back of an NVR are isolated from the outside world and cannot be accessed directly.

#### 16. Isolate NVR and IP Camera Network

The network your NVR and IP camera resides on should not be the same network as your public computer network. This will prevent any visitors or unwanted guests from getting access to the same network the security system needs in order to function properly.

## General

This document mainly introduces structure, mounting process, debugging and verification process of villa VTO products.

## **Device Upgrade**

Please don't cut off power supply during device upgrade. Power supply can be cut off only after the device has completed upgrade and has rebooted.

## Safety Instructions

The following categorized signal words with defined meaning might appear in the Manual.

Signal Words	Meaning
	Indicates a high potential hazard which, if not avoided, will result in death or serious injury.
	Indicates a medium or low potential hazard which, if not avoided, could result in slight or moderate injury.
	Indicates a potential risk which, if not avoided, could result in property damage, data loss, lower performance, or unpredictable result.
©¹ TIPS	Provides methods to help you solve a problem or save you time.
	Provides additional information as the emphasis and supplement to the text.

## **Revision History**

No.	Version No.	Revision Content	Release Date
1	V1.0.0	First release	2017.11.10
2	V1.0.1	Add privacy protection notice	2018.05.23

## **Privacy Protection Notice**

As the device user or data controller, you might collect personal data of others' such as face, fingerprints, car plate number, Email address, phone number, GPS and so on. You need to be in compliance with the local privacy protection laws and regulations to protect the legitimate rights and interests of other people by implementing measures include but not limited to: providing clear and visible identification to inform data subject the existence of surveillance area and providing related contact.

## About the Manual

- The Manual is for reference only. If there is inconsistency between the Manual and the actual product, the actual product shall prevail.
- We are not liable for any loss caused by the operations that do not comply with the Manual.
- The Manual would be updated according to the latest laws and regulations of related regions. For detailed information, see the paper User's Manual, CD-ROM, QR code or our official website. If there is inconsistency between paper User's Manual and the electronic version, the electronic version shall prevail.
- All the designs and software are subject to change without prior written notice. The product updates might cause some differences between the actual product and the Manual. Please contact the customer service for the latest program and supplementary documentation.
- There still might be deviation in technical data, functions and operations description, or errors in print. If there is any doubt or dispute, please refer to our final explanation.
- Upgrade the reader software or try other mainstream reader software if the Guide (in PDF format) cannot be opened.
- All trademarks, registered trademarks and the company names in the Manual are the properties of their respective owners.
- Please visit our website, contact the supplier or customer service if there is any problem occurred when using the device.
- If there is any uncertainty or controversy, please refer to our final explanation.

# Important Safeguards and Warnings

The following description is the correct application method of the device. Please read the manual carefully before use, in order to prevent danger and property loss. Strictly conform to the manual during application and keep it properly after reading.

## **Operating Requirement**

- Please don't place and install the device in an area exposed to direct sunlight or near heat generating device.
- Please don't install the device in a humid, dusty or fuliginous area.
- Please keep its horizontal installation, or install it at stable places, and prevent it from falling.
- Please don't drip or splash liquids onto the device; don't put on the device anything filled with liquids, in order to prevent liquids from flowing into the device.
- Please install the device at well-ventilated places; don't block its ventilation opening.
- Use the device only within rated input and output range.
- Please don't dismantle the device arbitrarily.
- Please transport, use and store the device within allowed humidity and temperature range.

## **Power Requirement**

- The product shall use electric wires (power wires) recommended by this area, which shall be used within its rated specification!
- Please use power supply that meets SELV (safety extra low voltage) requirements, and supply power with rated voltage that conforms to Limited Power Source in IEC60950-1. For specific power supply requirements, please refer to device labels.
- Appliance coupler is a disconnecting device. During normal use, please keep an angle that facilitates operation.

# Table of Contents

С	ybersecurity Recommendations	II
F	oreword	V
lr	nportant Safeguards and Warnings	VII
1	Product Structure	1
	1.1 VTO6210B/BW	1
	1.1.1 Front Panel	1
	1.1.2 Rear Panel	2
	1.2 VTO6000CM/VTO6100C	4
	1.2.1 Front Panel	4
	1.2.2 Rear Panel	5
	1.3 VTO2000A/VTO2000A-2	6
	1.3.1 Front Panel	6
	1.3.2 Rear Panel	7
2	Mounting and Debugging	11
	2.1 Mounting	.11
	2.1.1 VTO6210B and VTO6210BW	.11
	2.1.2 VTO6000CM and VTO6100C	12
	2.1.3 VTO2000A/VTO2000A-2	13
	2.2 Debugging	16
	2.2.1 VTO Settings	16
	2.2.2 VTH Settings (Version 3.1)	19
	2.2.3 VTH Settings (Version 4.0)	22
	2.3 Debugging Verification	27
	2.3.1 Verification with Version 3.1 VTH	27
	2.3.2 Verification with Version 4.0 VTH	28

Product Structure

# 1.1 VTO6210B/BW

## 1.1.1 Front Panel

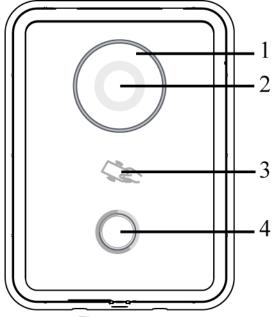


Figure 1-1

No.	Name	Description
1	Fill-in light	Provide fill-in light for camera in case of insufficient light.
2	Camera	Monitor the door area.
3	Card swiping area	Open the door with authorized IC card and swiping card.
4	Call key	Call management center or VTH.

Table 1-1

# 1.1.2 Rear Panel

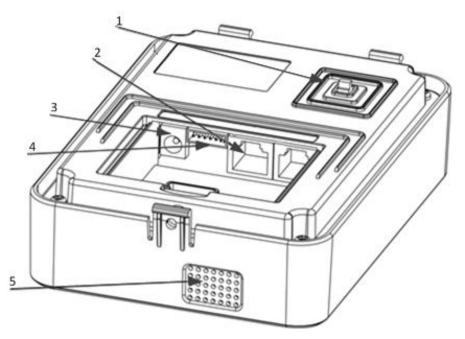


Figure 1-2

No.	Name	Description
1 Tompor owitch	Tamper switch	When VTO is detached from the wall forcibly, give out alarm sound
1	Tamper Switch	and report alarm info to management center.
2	Network port	Insert network cable (RJ45 plug).
3	Power port	Connect 12V DC power supply.
4	RS485 port	Be able to connect access extension module.
5	Speaker	Audio output.

Table 1-2

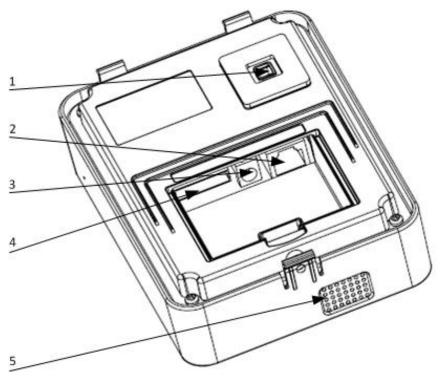


Figure 1-3

No.	Name	Description	
1	Tamper	When VTO is detached from the wall forcibly, give out alarm sound and	
	switch	report alarm info to management center.	
2	Network port	Insert network cable (RJ45 plug).	
3	Power port	Connect 12V DC power supply.	
4	10-core port	<ul> <li>Provide lock port, door sensor feedback port and exit button port to connect electric control lock, solenoid lock and exit button. Wiring method is shown in Figure 1-4 and Figure 1-5.</li> <li>Provide reserved port to connect access extension module.</li> </ul>	
5	Speaker	Audio output.	

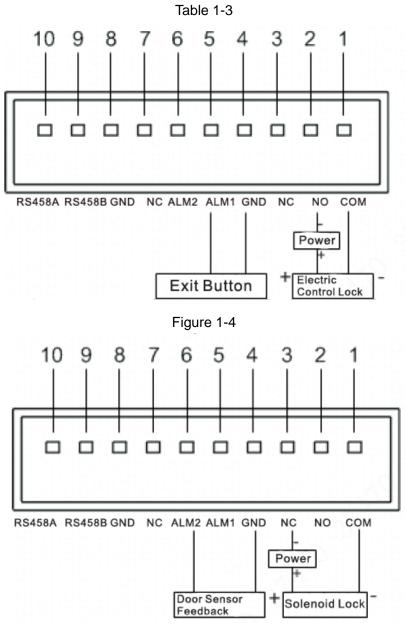


Figure 1-5

# $1.2 \ VTO6000 \ CM/VTO6100 \$

# 1.2.1 Front Panel

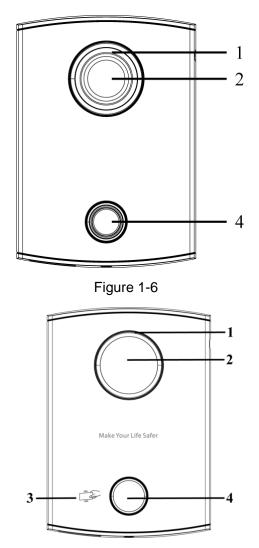
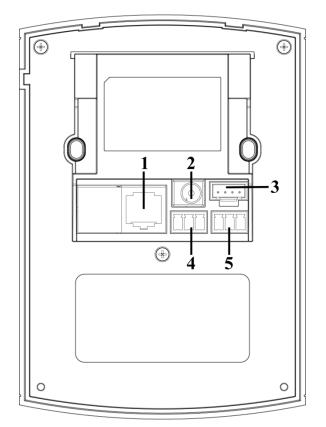


Figure 1-7

No.	Name	Description
1	Fill-in light	Provide fill-in light for camera in case of insufficient light.
2	Camera	Monitor the door area.
3	Card swiping area	Open the door with authorized IC card (card issuing function) and swiping card. Note Only VTO6100C supports to exit with IC card. Silkscreen icon of card swiping area may have different positions; the actual product shall
		prevail. This schematic diagram is only for your reference.
	Call key	Call management center or VTH.
4		Blue solid light: VTO is in standby status.
-		Blue flashing light: VTO is calling or talking.
		Yellow: it is unlocked with IC card or there is a problem in calling.

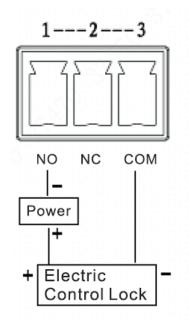
Table 1-4

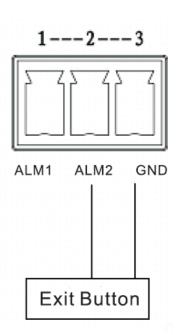


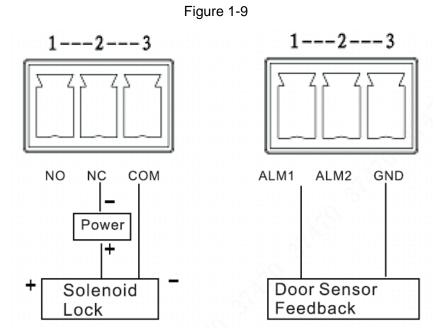


No.	Name	Description
1	Network port	Insert network cable (RJ45 plug).
2	Power port	Connect 12V DC power supply.
3	Debugging port	It is used by engineering personnel during debugging.
4	Green plug port 1	Provide lock port, door sensor feedback port and exit button port
5	Croop plug port 2	to connect electric control lock, solenoid lock and exit button.
	Green plug port 2	Wiring method is shown in Figure 1-9 and Figure 1-10.

Table 1-5



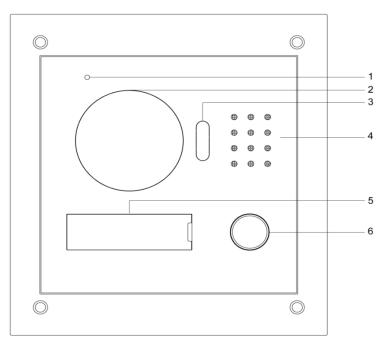






# 1.3 VTO2000A/VTO2000A-2

## 1.3.1 Front Panel





No.	Name	Description
1	Microphone	Audio input.
2	Camera	Monitor the door area.
3	Fill-in light	Provide fill-in light for camera in case of insufficient light.

No.	Name	Description
4	Speaker	Audio output.
5	User directory	Set user info.
6	Call key	Call management center or VTH.



# 1.3.2 Rear Panel

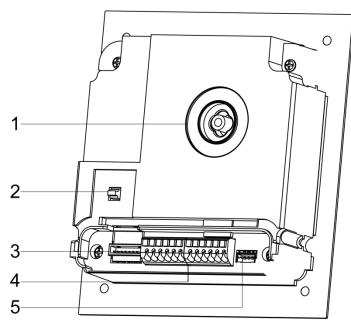


Figure 1-12

No.	Name	Description
	Camera angle	
1	adjusting	Adjust camera angle.
	column	
2	Tamper switch	When VTO is detached from the wall forcibly, give out alarm sound
2	Tamper Switch	and report alarm info to management center.
3	Network port	Connect network cable (RJ45 plug) with adapter cable.
	User port	Provide power port, lock port, door sensor feedback port and exit
4		button port to connect power supply, electric control lock, solenoid
4		lock and exit button. Wiring method is shown in Figure 1-13 and
		Figure 1-14.
5	Debugging port	It is used by engineering personnel during debugging.

Table 1-7

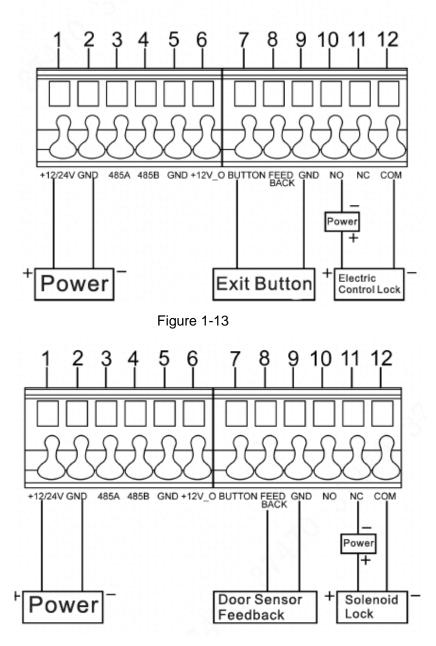
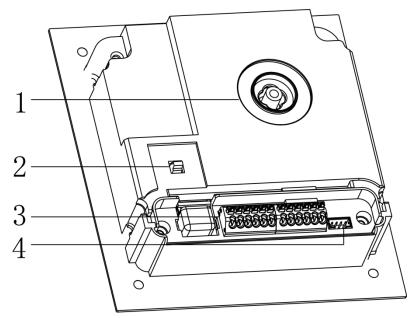


Figure 1-14



#### Figure 1-15

No.	Name	Description
1	Camera angle adjusting column	Adjust camera angle.
2	Tamper switch	When VTO is detached from the wall forcibly, give out alarm sound and report alarm info to management center.
3	User port	Provide power port, 2-wire port, lock port, door sensor feedback port and exit button port to connect power supply, 2-wire VTH, electric control lock, solenoid lock and exit button. Wiring method is shown in Figure 1-16 and Figure 1-17.
4	Debugging port	It is used by engineering personnel during debugging.



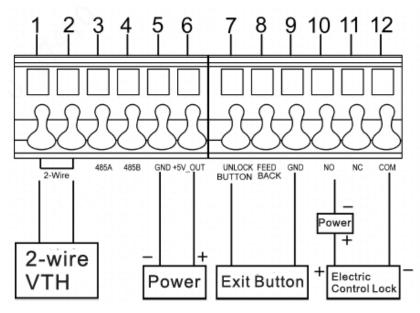


Figure 1-16

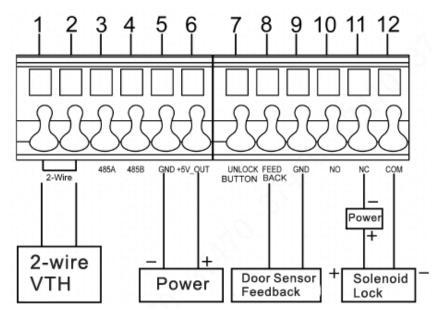


Figure 1-17

# Mounting and Debugging

# 2.1 Mounting



- Don't install VTO in bad environment, such as condensation, high temperature, stained, dusty, chemically corrosive, direct sunshine or completely unsheltered environment.
- Engineering mounting and debugging shall be done by professional teams. Please don't dismantle or repair arbitrarily in case of device failure.

## 2.1.1 VTO6210B and VTO6210BW



Before installing the bracket or flush mount box, cables in the wall shall be led through the bracket or flush mount box.

Mounting method of VTO6210B and VTO6210BW is the same. Take "VTO6210B" for example. Step 1 Fix the mounting bracket onto the wall.

- 1. Fix the bracket onto 86 box with M4 screws. Screw holes are located in Points 3 as shown in the figure.
- 2. To strengthen product firmness, tighten it with ST3.0 screws in Points 4 as shown in the figure.
- Step 2 Connect cables. Please refer to "1.1.2 Rear Panel" for details.
- Step 3 Put the bare device onto the mounting bracket; fit the upper edge first and then push the lower edge gently.
- Step 4 Fix the whole device onto the bracket with M3 screws.

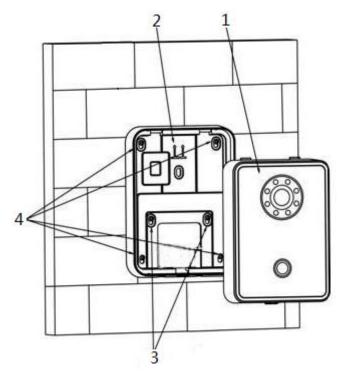


Figure 2-1

## 2.1.2 VTO6000CM and VTO6100C



- Before installing the bracket or flush mount box, cables in the wall shall be led through the bracket or flush mount box.
- Try not to install VTO6100C onto an iron door directly. Otherwise, signals may be shielded and card induction may be poor.
- Step 1 Dismantle M3 screws at the bottom of VTO and take off the decorative cap.
- Step 2 Connect cables. Please refer to "1.2.2 Rear Panel" for details.
- Step 3 Fix the bare device onto 86 box with M4 screws. Screw holes are located in Points 3 as shown in the figure.
- Step 4 To strengthen product firmness, after 86 box is in place, tighten it with ST3.0 screws in Points 6 as shown in the figure.
- Step 5 Install the decorative cap onto the bare device, and fix it with M3 screws.

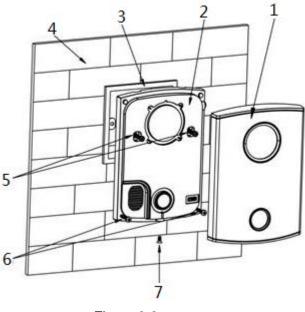


Figure 2-2

## 2.1.3 VTO2000A/VTO2000A-2

VTO2000A and VTO2000A-2 devices support the same mounting method and process. Take "VTO2000A" for example.

## 2.1.3.1 Surface Mounting

- Step 1 Drill holes according to hole positions of sheet metal bracket, and put expansion pipe in place.
- Step 2 Connect cables. Please refer to "1.3.2 Rear Panel" for details.
- Step 3 Fix sheet metal bracket onto the wall with ST3x18 screws.

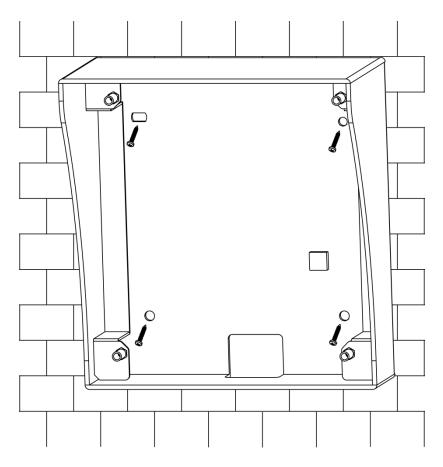


Figure 2-3 Step 4 Fix the bare device onto sheet metal bracket with M3×6 screws.

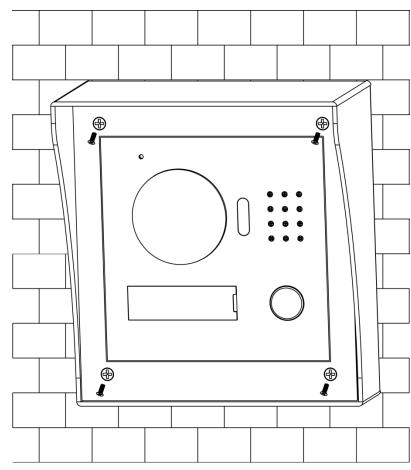


Figure 2-4

## 2.1.3.2 Flush Mounting

Step 1 Dig a hole in the wall, embed flush mounting box into the wall, and ensure that box edge clings to the wall.

Note Note

- Hole dimension is 117mm×128mm×80mm.
- During flush mounting, lead cables out from the wall.

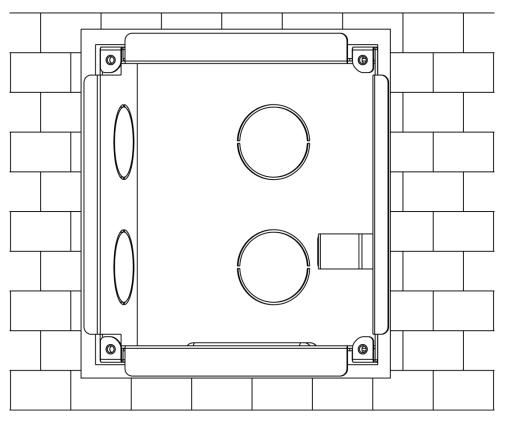
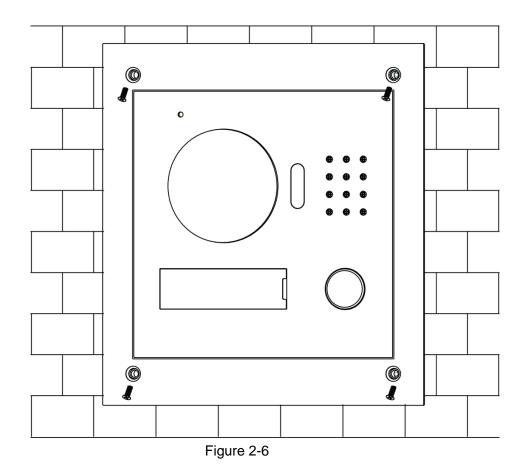


Figure 2-5

Step 2 Connect cables. Please refer to "1.3.2 Rear Panel" for details.

Step 3 Fix the bare device onto the box with M3×8 screws.



2.2 Debugging

Caution

Carry out debugging to ensure that the device can realize basic network access, call and monitoring functions after installation. Before debugging, please check whether the following work has been completed.

- Debugging personnel shall get familiar with relevant documents in advance, and get to know device mounting, wiring and use.
- Check whether there is short circuit or open circuit. Power on the device only after the circuit is confirmed to be normal.
- IP and no. (or room no.) of every VTO and VTH have been planned.

# 2.2.1 VTO Settings

For the first time, please initialize login password.

Note Note

Please ensure that default IP addresses of PC and VTO are in the same network segment. Default IP address of VTO is 192.168.1.110.

Step 1 Power on the device, and enter default IP address of VTO at the address bar of PC browser. The system displays "Setting" interface, as shown in Figure 2-7.

Device
<b>1</b> Setting <b>2</b> Protect <b>3</b> OK
Username admin New Password
Weak Middle Strong Confirm
Use a password that has 8 to 32 characters, it can be a combination of letters, numbers and symbols (please do not use special symbols like ' $v$ " $v$ ( $v$ : $v$ &)
Next

Figure 2-7

- Step 2 According to interface prompt, enter "New Password" and "Confirm", and click "Next". Select "Email" and enter your Email address. This Email address is used to reset the password, so it is recommended that it should be set.
- Step 3 Login WEB interface.

Note Note

- Default user name is admin.
- Password is the new one set during initialization.
- Step 4 Select "System Config > Network Config > TCP/IP".

The system displays "TCP/IP" interface, as shown in Figure 2-8.

TCP/IP	FTP	Port	DDNS	HTTPS Setting
-				
IP Address	172.26.7.42			
Subnet Mask	255.255.0.0			
Default Gateway	172.26.0.1			
MAC Address	00:01:5b:00:	33:55		
DNS Address	8.8.8.8			
SSH	🔿 On 🖉	Off		
	Default	Refresh OK		

Figure 2-8

- Step 5 Enter the planned "IP Address", "Subnet Mask" and "Default Gateway", and click "OK". After modification is completed, VTO reboots automatically, while the following two cases occur at WEB interface.
  - If PC is in the planned network segment, WEB interface jumps to new IP login interface automatically.
  - If PC is not in the planned network segment, login will be failed. Please add PC to

the planned network segment and login WEB interface again.

Step 6 Login WEB interface again; select "System Config > LAN Config".

The system displays "LAN Config" interface, as shown in Figure 2-9.

LAN Config		
Building No.	01	
Building Unit No.	1	
VTO No.	6901	
Max Extension Index	5	Group Call
MGT Centre IP Address	10.34.6.102	Register to the MGT Centre
MGT Port No.	12801	
NoAnswer Transfer MGT Centre	🔿 Enable 🛛 💿	Disable
	Warning:The device ne	eds reboot after modifing the config above.
	If extensionCount chan	ged,need reboot VTH and init VTH information again!
	Default Re	fresh OK

Figure 2-9

- 1. Enter VTO "Building No.", "Building Unit No." and "VTO No.".
  - To call the management center, please tick "Register to the MGT Center", and set "MGT Center IP Address" and "MGT Port No.".
  - To provide group call function, please tick "Group Call" and set "Max Extension Index", which is 5 at most.
- 2. Click "OK".
- Step 7 Select "System Config > Digital Indoor Station Manager".

The system displays "Digital Indoor Station Manager" interface, as shown in Figure 2-10.

Note Note

- Add master VTH.
- After "Network" interface of extension VTH has added and enabled master VTH, VTO interface will obtain extension VTH info automatically.

al Indoor Station N	lanager						
FamilyName	FirstName	Nick Name	Room No.	IP Address	Card No. Info	Modify	Delete
			9901	172.26.7.41		2	•
			101	0.0.0.0		2	•
			201	172.26.7.43		1	•

Figure 2-10

- 1. Click "Add".
- 2. Enter VTH "Family Name", "First Name", "Nick Name", "VTH Short No." (VTH room no.) and "IP Address".

Note Note

It is OK if IP address is not filled in. After VTH is registered to VTO successfully, VTO will obtain IP address of VTH.

3. Click "OK".

## 2.2.2 VTH Settings (Version 3.1)

For the first time, please initialize the password and bind Email. Password is used to enter project setting interface, while Email is used to retrieve your password when you forget it. Step 1 Power on the device.

The system displays "Welcome" and enters "Initialization" interface, as shown in Figure 2-11.

	Device I	nit	
Passw	ord		
Confirm	m Pwd:		
Email:			
		1.200 M	
	OK		

Figure 2-11

- Step 2 Enter "Password", "Confirm Pwd" and "Email".
- Step 3 Click [OK].

The system displays "Info Init" interface. Press it to turn it off.

- Step 4 Select "System Config > Project Settings". The system pops up "Password" prompt box.
- Step 5 Enter the password set during initialization, and click [OK].
- Step 6 Click [Net Set].

The system displays "Net Set" interface, as shown in Figure 2-12. Note Note

- IP addresses of VTH and VTO shall be in the same network segment. Otherwise, • VTH will fail to obtain VTO info after configuration.
- To obtain IP with DHCP, please ensure the connected router has DHCP function and DHCP function has been enabled.

₽	Project Settings	â	
			Product Info
	Static IP     DHCP		<>> Net Set
Local IP	172 . 26 . 7 . 41		교 Network
Gateway	90:02:a9:80:aa:11		uPC Info
WAC	90.02.49.60.44.11		Search Device
			Default
	OK		

Figure 2-12

- 1. Set according to actual network access mode.
- Static IP Select "Static IP". Enter "Local IP", "Subnet Mask" and "Gateway".
  DHCP
  - Select "DHCP" to obtain IP address automatically.
- 2. Click [OK] to save the settings.
- Step 7 Press [Product Info].

The system displays "Product Info" interface, as shown in Figure 2-13.

₽	Project Settings		<b>A</b>
Room No.	9901	Master	🔜 Product Info 🧹
Master IP	0 . 0 . 0 . 0		<b>∢&gt;</b> Net Set
Version	General_Eng_P		
	V3.120.0000.0.R.20170804		Network
User Name	admin		urger lPC Info
Password	••••		Search Device
SSH	ON		<b>A b</b> ( )
	OK	eset MSG	😳 Default
		eser mod	

Figure 2-13

• Be used as a master VTH.

Enter "Room No." (such as 9901) and click "OK".

Note Note

"Room no." shall be the same with "VTH Short No.", which is set when adding VTH at

WEB interface. Otherwise, it will fail to connect VTO.

- Be used as an extension VTH.
- 1. Press [Master] and switch to "Extension".
- 2. Enter "Room No." (such as 9901-1) and "Master IP" (IP address of master VTH).

"User Name" and "Password" are the user name and password of master VTH. Default user name is admin, and the password is the one set during device initialization.

- 3. Click [OK] to save the settings.
- Step 8 Press [Network].

#### The system displays "Network" interface, as shown in Figure 2-14.

₽		G		
	Main_VTO Name	Main VTO		Product Info
	Device Type	Door Station		<b>∢&gt;</b> Net Set
	VTO Middle No.	10116901		
<	VTO IP Address	172 . 26 . 7 . 42		🖵 Network <
	User Name	admin		IPC Info
	Password	•••••		Search Device
	Network Port	13801		Cearch Device
	Enable Status	ON		Default
		ОК		



- Add main VTO.
- 1. In Figure 2-14, enter main VTO name, IP address, "User Name" and "Password".
- 2. Switch "Enable Status" to

Note Note

- Default device type is "Door Station". VTO middle no. will be obtained automatically. The format is "1+building no.+ unit no. + VTO no.". Building no. has 2 digits, unit no. has 1 digit, and no. has 4 digits, so middle no. has 8 digits in total.
- "User Name" and "Password" shall be consistent with WEB login user name and password of VTO. Otherwise, it will fail to connect.
- "Enable Status" of main VTO is "ON" by default. After setting VTO info, please turn it off and then reboot, in order to put it into effect.
- Add sub VTO.
- 1. Press to switch to sub VTO setting interface.
- 2. Enter sub VTO name, IP address, "User Name" and "Password".

Switch "Enable Status" to 3.



- Add fence station.
- to switch to sub VTO setting interface. Press 1.
- Select device type to be "fence station"; enter sub VTO name (fence station name), 2. VTO middle no. (fence station middle no.), "User Name" and "Password". Note Note

Fence station middle no. consists of "1+00+0+fence station no."; building no. is 00, unit no. is 0 and VTO no. has 4 digits, so middle no. has 8 digits in total. For example, 10006901.

3. Switch "Enable Status" to

Step 9 Click [OK] to save the settings.

## 2.2.3 VTH Settings (Version 4.0)

For the first time, please initialize the password and bind Email. Password is used to enter project setting interface, while Email is used to retrieve your password when you forget it. Step 1 Power on the device.

The system displays "Welcome" and enters "Device Initialization" interface, as shown in Figure 2-15.

Device Init						
Password						
Confirm Pwd						
Email						
OK						



- Step 2 Enter "Password", "Confirm Pwd" and "Email". Click [OK].
- Step 3 Press [Setting] for more than 6 seconds.

The system pops up "Password" prompt box.

- Step 4 Enter the password set during initialization, and click [OK].
- Step 5 Click [Network].

The system displays "Network" interface, as shown in Figure 2-16 or Figure 2-17. Please set according to network access mode in actual application.  $\square$  Note

IP addresses of VTH and VTO shall be in the same network segment. Otherwise, VTH will fail to obtain VTO info after configuration.



Figure 2-16



Figure 2-17

Wired IP

Enter "Local IP", "Subnet Mask" and "Gateway", press [OK]. Or press OFF to enable DHCP function and obtain IP info automatically.

Note Note

If the device has wireless function, please click "Wired IP" tab to set it.

• WLAN

1. Press OFF to enable WIFI function.

The system displays available WIFI list, as shown in Figure 2-18.

♥ 9901		Network			A
Network	WLAN	Wired IP	WireLess IP		
VTH Config	WIFI Name			ON	
VTO Config	TP-LINK_9388		<b>^</b>	<b></b>	
Search Device	cdl		<b>A</b>	Ŷ	
Default	D6_19430_152		<b>A</b>	Ş	
	AE-1		<b>^</b>	Ŷ	
Reset MSG	OPPO A37m		<b>A</b>	Ŷ	
			1/3	< >	

Figure 2-18

2. Connect WIFI.

The system has 2 access ways as follows.

- At "WLAN" interface, select WIFI, click "Wireless IP" tab to enter "Local IP", "Subnet Mask" and "Gateway", and press [OK].
- ♦ At "WLAN" interface, select WIFI, click "Wireless IP" tab, press <sup>■</sup> <sup>OFF</sup> to

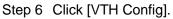
enable DHCP function and obtain IP info automatically, as shown in Figure 2-19.

Note Note

To obtain IP info with DHCP function, use a router with DHCP function.

9901		Network		2 🖬 🔒
Network	WLAN	Wired IP	WireLess IP	
VTH Config	Local IP			
VTO Config	Subnet Mask			
Search Device	Gateway			
Default	MAC	3c.ef.8c.07.ab.63		
Reset MSG	DHCP	ON		
		ОК		
	-			

Figure 2-19



The system displays "VTH Config" interface, as shown in Figure 2-20.

9901		VTH Config	
Network			
	Room No.	9901	Master
VTH Config	Master IP	0 . 0 . 0	
VTO Config	Master Name		
Search Device	Master Pwd		
Default	Version	V4.000.0000.0 R.20171024	
Reset MSG	SSH		
		ОК	

Figure 2-20

• Be used as a master VTH.

Enter "Room No." (such as 9901) and click "OK".

Note Note

"Room no." shall be the same with "VTH Short No.", which is set when adding VTH at WEB interface. Otherwise, it will fail to connect VTO.

- Be used as an extension VTH.
- 1. Press [Master] and switch to "Extension".
- 2. Enter "Room No." (such as 9901-1) and "Master IP" (IP address of master VTH).

"Master Name" and "Master Pwd" are the user name and password of master VTH. Default user name is admin, and the password is the one set during device initialization.

- 3. Press [OK] to save settings.
- Step 7 Click [VTO Config].

The system displays "VTO Config" interface, as shown in Figure 2-21.

9901		VTO Config		
Network	Main_VTO	Main VTO		
VTH Config	VTO IP	172 . 26 . 7 . 42		
VTO Config	Device Type	Door	-	
	Middle No.			
Search Device	User Name	admin		
Default	Password	•••••		
Reset MSG	Enable Status			
		<	>	

Figure 2-21

- Add main VTO.
- 1. In Figure 2-21, enter main VTO name, VTO IP, "User Name" and "Password".
- 2. Switch the "Enable Status" to be

Note Note

- Default device type is "Door". VTO middle no. will be obtained automatically. The format is "1+building no.+ unit no. + VTO no.". Building no. has 2 digits, unit no. has 1 digit, and no. has 4 digits, so middle no. has 8 digits in total.
- "User Name" and "Password" shall be consistent with WEB login user name and password of VTO. Otherwise, it will fail to connect.
- "Enable Status" of main VTO is "ON" by default. After setting VTO info, please turn it off and then reboot, in order to put it into effect.
- Add sub VTO.
- 1. Press to switch to sub VTO setting interface.
- 2. Enter sub VTO name, IP address, "User Name" and "Password".
- 3. Switch the "Enable Status" to be
- Add fence station.
- 1. Press to switch to sub VTO setting interface.
- Select device type to be "Fence Station", enter sub VTO name (fence station name), VTO middle no., "User Name" and "Password".
   Note

Fence station middle no. consists of "1+00+0+fence station no."; building no. is 00, unit no. is 0 and VTO no. has 4 digits, so middle no. has 8 digits in total. For

example, 10006901.

3. Switch the "Enable Status" to be

# 2.3 Debugging Verification

## 2.3.1 Verification with Version 3.1 VTH

## 2.3.1.1 VTO Calls VTH

Press call key at VTO, to call VTH. VTH pops up monitoring image and operating keys, as shown in Figure 2-22. It represents successful debugging.

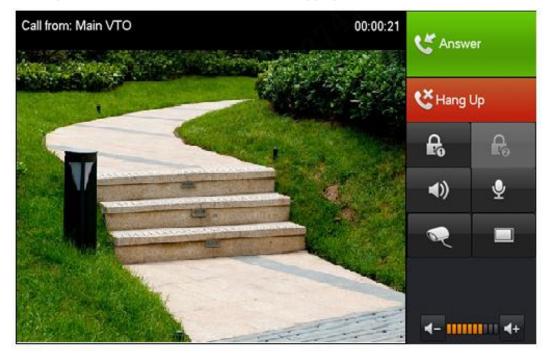


Figure 2-22

## 2.3.1.2 VTH Monitors VTO

VTH is able to monitor VTO, fence station or IPC. Take "VTO" for example.

Select "Video Talk > Monitor > Door Station", as shown in Figure 2-23. Select the VTO to enter monitoring image, as shown in Figure 2-24.



Figure 2-23



Figure 2-24

# 2.3.2 Verification with Version 4.0 VTH

## 2.3.2.1 VTO Calls VTH

Press call key at VTO, to call VTH. VTH pops up monitoring image and operating keys, as shown in Figure 2-25. It represents successful debugging.

Note Note

The following figure means that SD card has been inserted into VTH. If SD card is not inserted, recording and snapshot icons are gray.



Figure 2-25

## 2.3.2.2 VTH Monitors VTO

VTH is able to monitor VTO, fence station or IPC. Take "VTO" for example.

Select "Monitor > Door", as shown in Figure 2-26. Select the VTO to enter monitoring image, as shown in Figure 2-27.

#### Note Note

The following figure means that SD card has been inserted into VTH. If SD card is not inserted, recording and snapshot icons are gray.



Figure 2-26



Figure 2-27