



DS-K3G411 Series Tripod Turnstile

User Manual

Legal Information

©2020 Hangzhou Hikvision Digital Technology Co., Ltd. All rights reserved.

About this Manual

The Manual includes instructions for using and managing the Product. Pictures, charts, images and all other information hereinafter are for description and explanation only. The information contained in the Manual is subject to change, without notice, due to firmware updates or other reasons. Please find the latest version of this Manual at the Hikvision website (<https://www.hikvision.com/>).

Please use this Manual with the guidance and assistance of professionals trained in supporting the Product.

Trademarks

HIKVISION and other Hikvision's trademarks and logos are the properties of Hikvision in various jurisdictions.

Other trademarks and logos mentioned are the properties of their respective owners.

Disclaimer

TO THE MAXIMUM EXTENT PERMITTED BY APPLICABLE LAW, THIS MANUAL AND THE PRODUCT DESCRIBED, WITH ITS HARDWARE, SOFTWARE AND FIRMWARE, ARE PROVIDED “AS IS” AND “WITH ALL FAULTS AND ERRORS”. HIKVISION MAKES NO WARRANTIES, EXPRESS OR IMPLIED, INCLUDING WITHOUT LIMITATION, MERCHANTABILITY, SATISFACTORY QUALITY, OR FITNESS FOR A PARTICULAR PURPOSE. THE USE OF THE PRODUCT BY YOU IS AT YOUR OWN RISK. IN NO EVENT WILL HIKVISION BE LIABLE TO YOU FOR ANY SPECIAL, CONSEQUENTIAL, INCIDENTAL, OR INDIRECT DAMAGES, INCLUDING, AMONG OTHERS, DAMAGES FOR LOSS OF BUSINESS PROFITS, BUSINESS INTERRUPTION, OR LOSS OF DATA, CORRUPTION OF SYSTEMS, OR LOSS OF DOCUMENTATION, WHETHER BASED ON BREACH OF CONTRACT, TORT (INCLUDING NEGLIGENCE), PRODUCT LIABILITY, OR OTHERWISE, IN CONNECTION WITH THE USE OF THE PRODUCT, EVEN IF HIKVISION HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES OR LOSS.

YOU ACKNOWLEDGE THAT THE NATURE OF THE INTERNET PROVIDES FOR INHERENT SECURITY RISKS, AND HIKVISION SHALL NOT TAKE ANY RESPONSIBILITIES FOR ABNORMAL OPERATION, PRIVACY LEAKAGE OR OTHER DAMAGES RESULTING FROM CYBER-ATTACK, HACKER ATTACK, VIRUS INFECTION, OR OTHER INTERNET SECURITY RISKS; HOWEVER, HIKVISION WILL PROVIDE TIMELY TECHNICAL SUPPORT IF REQUIRED.

YOU AGREE TO USE THIS PRODUCT IN COMPLIANCE WITH ALL APPLICABLE LAWS, AND YOU ARE SOLELY RESPONSIBLE FOR ENSURING THAT YOUR USE CONFORMS TO THE APPLICABLE LAW. ESPECIALLY, YOU ARE RESPONSIBLE, FOR USING THIS PRODUCT IN A MANNER THAT DOES NOT INFRINGE ON THE RIGHTS OF THIRD PARTIES, INCLUDING WITHOUT LIMITATION, RIGHTS OF PUBLICITY, INTELLECTUAL PROPERTY RIGHTS, OR DATA PROTECTION AND OTHER PRIVACY RIGHTS. YOU SHALL NOT USE THIS PRODUCT FOR ANY PROHIBITED END-USES, INCLUDING THE DEVELOPMENT OR PRODUCTION OF WEAPONS OF MASS DESTRUCTION, THE DEVELOPMENT OR

PRODUCTION OF CHEMICAL OR BIOLOGICAL WEAPONS, ANY ACTIVITIES IN THE CONTEXT RELATED TO ANY NUCLEAR EXPLOSIVE OR UNSAFE NUCLEAR FUEL-CYCLE, OR IN SUPPORT OF HUMAN RIGHTS ABUSES.

IN THE EVENT OF ANY CONFLICTS BETWEEN THIS MANUAL AND THE APPLICABLE LAW, THE LATER PREVAILS.

Data Protection

During the use of device, personal data will be collected, stored and processed. To protect data, the development of Hikvision devices incorporates privacy by design principles. For example, for device with facial recognition features, biometrics data is stored in your device with encryption method; for fingerprint device, only fingerprint template will be saved, which is impossible to reconstruct a fingerprint image.

As data controller, you are advised to collect, store, process and transfer data in accordance with the applicable data protection laws and regulations, including without limitation, conducting security controls to safeguard personal data, such as, implementing reasonable administrative and physical security controls, conduct periodic reviews and assessments of the effectiveness of your security controls.

Regulatory Information

FCC Information

Please take attention that changes or modification not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

FCC compliance: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help

This equipment should be installed and operated with a minimum distance 20cm between the radiator and your body.

FCC Conditions

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions:

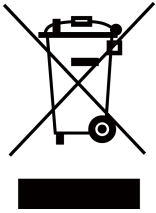
1. This device may not cause harmful interference.
2. This device must accept any interference received, including interference that may cause undesired operation.

EU Conformity Statement



This product and - if applicable - the supplied accessories too are marked with "CE" and comply therefore with the applicable harmonized European standards listed

under the EMC Directive 2014/30/EU, RE Directive 2014/53/EU, the RoHS Directive 2011/65/EU



2012/19/EU (WEEE directive): Products marked with this symbol cannot be disposed of as unsorted municipal waste in the European Union. For proper recycling, return this product to your local supplier upon the purchase of equivalent new equipment, or dispose of it at designated collection points. For more information see: www.recyclethis.info



2006/66/EC (battery directive): This product contains a battery that cannot be disposed of as unsorted municipal waste in the European Union. See the product documentation for specific battery information. The battery is marked with this symbol, which may include lettering to indicate cadmium (Cd), lead (Pb), or mercury (Hg). For proper recycling, return the battery to your supplier or to a designated collection point. For more information see: www.recyclethis.info

Safety Instruction

These instructions are intended to ensure that user can use the product correctly to avoid danger or property loss.

The precaution measure is divided into Dangers and Cautions:

Dangers: Neglecting any of the warnings may cause serious injury or death.

Cautions: Neglecting any of the cautions may cause injury or equipment damage.

	
Dangers: Follow these safeguards to prevent serious injury or death.	Cautions: Follow these precautions to prevent potential injury or material damage.

Danger:

- In the use of the product, you must be in strict compliance with the electrical safety regulations of the nation and region.
- The equipment must be connected to an earthed mains socket-outlet.
- Shock hazard! Disconnect all power sources before maintenance.
- Do not touch the bare metal contacts of the inlets after the circuit breaker is turned off. Electricity still exists.
- This equipment is not suitable for use in locations where children are likely to be present.
- To prevent possible hearing damage, do not listen at high volume levels for long periods.
- All the electronic operation should be strictly compliance with the electrical safety regulations, fire prevention regulations and other related regulations in your local region.
- Please use the power adapter, which is provided by normal company. The power consumption cannot be less than the required value.
- Do not connect several devices to one power adapter as adapter overload may cause over-heat or fire hazard.
- Please make sure that the power has been disconnected before you wire, install or dismantle the device.
If the top caps should be open and the device should be powered on for maintenance, make sure:
 1. Power off the fan to prevent the operator from getting injured accidentally.
 2. Do not touch bare high-voltage components.
 3. Make sure the switch's wiring sequence is correct after maintenance.
- Please make sure that the power has been disconnected before you wire, install or dismantle the device.
- When the product is installed on wall or ceiling, the device shall be firmly fixed.
- If smoke, odors or noise rise from the device, turn off the power at once and unplug the power cable, and then please contact the service center.
- Do not ingest battery, Chemical Burn Hazard.

This product contains a coin/button cell battery. If the coin/button cell battery is swallowed, it can cause severe internal burns in just 2 hours and can lead to death.

Keep new and used batteries away from children. If the battery compartment does not close securely, stop using the product and keep it away from children. If you think batteries might have been swallowed or placed inside any part of the body, seek immediate medical attention.

- If the product does not work properly, please contact your dealer or the nearest service center. Never attempt to disassemble the device yourself. (We shall not assume any responsibility for problems caused by unauthorized repair or maintenance.)
- The Terminal PE of the switch should be connect to a ground wire.

Cautions:

- The equipment shall not be exposed to dripping or splashing and that no objects filled with liquids, such as vases, shall be placed on the equipment.
- The equipment has been designed, when required, modified for connection to an IT power distribution system.
- Ensure correct wiring of the terminals for connection to an AC mains supply.
- Provide a surge suppressor at the inlet opening of the equipment under special conditions such as the mountain top, iron tower, and forest.
- The equipment has been designed, when required, modified for connection to an IT power distribution system.
- No naked flame sources, such as lighted candles, should be placed on the equipment.
- The ventilation should not be impeded by covering the ventilation openings with items, such as newspapers, table-cloths, curtains, etc. The openings shall never be blocked by placing the equipment on a bed, sofa, rug or other similar surface.
- This equipment is suitable for mounting on concrete or other non-combustible surface only.
- The serial port of the equipment is used for debugging only.
 - Install the equipment according to the instructions in this manual.
 - To prevent injury, this equipment must be securely attached to the floor/base of the turnstile in accordance with the installation instructions.
- Keep straight down when moving or using the equipment.
- Never place the equipment in an unstable location. The equipment may fall, causing serious personal injury or death.
- Stainless steel may be corroded in some circumstances. You need to clean and care the device by using the stainless steel cleaner. It is suggested to clean the device every month.
- Do not drop the device or subject it to physical shock, and do not expose it to high electromagnetism radiation. Avoid the equipment installation on vibrations surface or places subject to shock (ignorance can cause equipment damage).
- Do not place the device in extremely hot (refer to the specification of the device for the detailed operating temperature), cold, dusty or damp locations, and do not expose it to high electromagnetic radiation.
- The device cover for indoor use shall be kept from rain and moisture.
- Exposing the equipment to direct sun light, low ventilation or heat source such as heater or radiator is forbidden (ignorance can cause fire danger).

- Do not aim the device at the sun or extra bright places. A blooming or smear may occur otherwise (which is not a malfunction however), and affecting the endurance of sensor at the same time.
- Please use the provided glove when open up the device cover, avoid direct contact with the device cover, because the acidic sweat of the fingers may erode the surface coating of the device cover.
- Please use a soft and dry cloth when clean inside and outside surfaces of the device cover, do not use alkaline detergents.
- Please keep all wrappers after unpack them for future use. In case of any failure occurred, you need to return the device to the factory with the original wrapper. Transportation without the original wrapper may result in damage on the device and lead to additional costs.
- Improper use or replacement of the battery may result in hazard of explosion. Replace with the same or equivalent type only. Dispose of used batteries according to the instructions provided by the battery manufacturer.
- Biometric recognition products are not 100% applicable to anti-spoofing environments. If you require a higher security level, use multiple authentication modes.
- Do not stay in the lane when the device is rebooting.
- RISK OF EXPLOSION IF BATTERY IS REPLACED BY AN INCORRECT TYPE. DISPOSE OF USED BATTERIES ACCORDING TO THE INSTRUCTIONS.
- SUITABLE FOR MOUNTING ON CONCRETE OR OTHER NON-COMBUSTIBLE SURFACE ONLY.
- The instructions shall require connection of the equipment protective earthing conductor to the installation protective earthing conductor.

Available Models

Product Name	Model
Tripod Turnstile	DS-K3G411

Contents

Chapter 1 Overview	1
1.1 Introduction	1
1.2 Main Features	1
Chapter 2 System Wiring	3
Chapter 3 Installation	5
3.1 Disassemble Pedestals	5
3.2 Install Pedestals	5
Chapter 4 General Wiring	9
4.1 Components Introduction	9
4.2 Wiring Electric Supply	9
4.3 Wire Network Switch	10
4.4 Terminal Description	12
4.4.1 Main Control Board Terminal and BUS Terminal Description	12
4.4.2 Main Control Board DIP Switch Description	20
4.4.3 RS-485 Wiring	24
4.4.4 RS-232 Wiring	25
4.4.5 Wiegand Wiring	27
4.4.6 Barrier Control Wiring	27
4.4.7 Alarm Output Wiring	29
4.4.8 Fire Alarm Module Wiring	29
Chapter 5 Device Settings	30
5.1 Pair Keyfob (Optional)	30
5.2 Initialize Device	31
5.3 Relay Output NO/NC Settings	32
5.3.1 Alarm Relay Output Mode (NO/NC)	32
5.3.2 Barrier Control Relay Output Mode	33

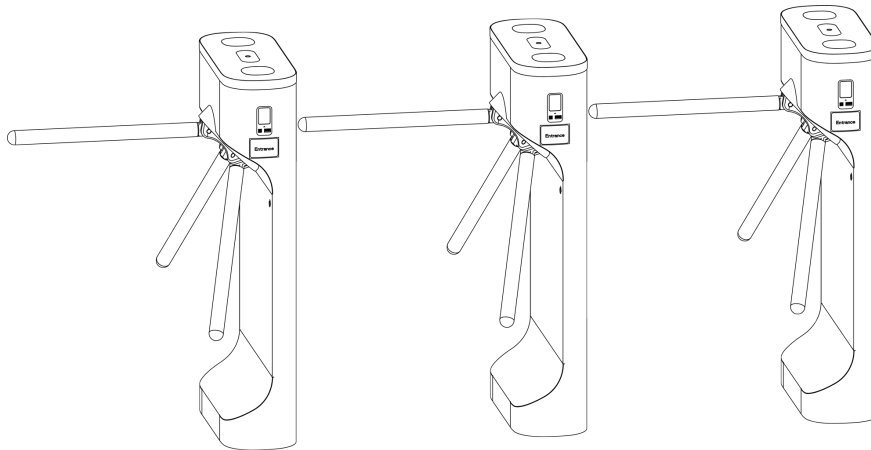
Chapter 6 Activation	35
6.1 Activate via SADP	35
6.2 Activate Device via Client Software	36
Chapter 7 Client Software Configuration	38
7.1 Configuration Flow of Client Software	38
7.2 Device Management	38
7.2.1 Add Device	39
7.2.2 Reset Device Password	45
7.3 Group Management	45
7.3.1 Add Group	46
7.3.2 Import Resources to Group	46
7.3.3 Edit Resource Parameters	46
7.3.4 Remove Resources from Group	47
7.4 Person Management	47
7.4.1 Add Organization	47
7.4.2 Configure Basic Information	48
7.4.3 Issue a Card by Local Mode	49
7.4.4 Upload a Face Photo from Local PC	51
7.4.5 Take a Photo via Client	51
7.4.6 Collect Face via Access Control Device	53
7.4.7 Collect Fingerprint via Client	53
7.4.8 Configure Access Control Information	54
7.4.9 Customize Person Information	55
7.4.10 Configure Resident Information	56
7.4.11 Configure Additional Information	56
7.4.12 Import and Export Person Identify Information	57
7.4.13 Import Person Information	57
7.4.14 Import Person Pictures	58

7.4.15 Export Person Information	58
7.4.16 Export Person Pictures	59
7.4.17 Get Person Information from Access Control Device	59
7.4.18 Move Persons to Another Organization	60
7.4.19 Issue Cards to Persons in Batch	60
7.4.20 Report Card Loss	60
7.4.21 Set Card Issuing Parameters	61
7.5 Configure Schedule and Template	62
7.5.1 Add Holiday	62
7.5.2 Add Template	63
7.6 Set Access Group to Assign Access Authorization to Persons	64
7.7 Configure Advanced Functions	66
7.7.1 Configure Device Parameters	67
7.7.2 Configure Remaining Open/Closed	71
7.7.3 Configure Multi-Factor Authentication	73
7.7.4 Configure Custom Wiegand Rule	75
7.7.5 Configure Card Reader Authentication Mode and Schedule	76
7.7.6 Configure First Person In	78
7.7.7 Configure Anti-Passback	79
7.7.8 Configure Device Parameters	80
7.8 Configure Linkage Actions for Access Control	81
7.8.1 Configure Client Actions for Access Event	81
7.8.2 Configure Device Actions for Access Event	82
7.8.3 Configure Device Actions for Card Swiping	84
7.9 Door Control	85
7.9.1 Control Door Status	85
7.9.2 Check Real-Time Access Records	86
7.10 Event Center	88

7.10.1 Enable Receiving Event from Devices	88
7.10.2 View Real-Time Events	88
7.10.3 Search Historical Events	90
7.11 Remote Configuration via Client Software	92
7.11.1 Check Device Information	92
7.11.2 Edit Device Name	92
7.11.3 Edit Time	92
7.11.4 Set System Maintenance	92
7.11.5 Manage Network User	93
7.11.6 Manage Keyfob User	93
7.11.7 Set Security	94
7.11.8 Configure Screen Parameters	94
7.11.9 Configure Screen Parameters	95
7.11.10 Configure Advanced Network	96
7.11.11 Configure Audio File	96
7.11.12 View Relay Status	97
Appendix A. Tips When Collecting/Comparing Face Picture	98
Appendix B. Tips for Scanning Fingerprint	99
Appendix C. DIP Switch Description	101
Appendix D. Event and Alarm Type	102
Appendix E. Table of Audio Index Related Content	103
Appendix F. Communication Matrix and Device Command	104

Chapter 1 Overview

1.1 Introduction



The tripod turnstile is designed to detect unauthorized entrance or exit. By adopting the turnstile integratedly with the access control system, person should authenticate to pass through the lane via swiping IC or ID card, scanning QR code, etc. It is widely used in attractions, stadiums, construction sites, residences, etc.

1.2 Main Features

- 32-bit high-speed processor
- TCP/IP network communication
The communication data is specially encrypted to relieve the concern of privacy leak
- Remaining open/closed mode selectable
- Bidirectional (Entering/Exiting) lane
The barrier opening and closing speed can be configured according to the visitor flow
- Self-detection, Self-diagnostics, and automatic alarm
- Remote control and management
- Online/offline operation
- LED indicates the entrance/exit and passing status
- Barrier is in free status when powered down. People can pass through the lane along single/both single and double directions
- Fire alarm passing
When the fire alarm is triggered, the barrier will be dropped down automatically for emergency evacuation
- Valid passing duration settings
System will cancel the passing permission if a person does not pass through the lane within the valid passing duration

- Opens/Closes barrier according to the schedule template
- Up to 3000 visitor cards and up to 60,000 cards except for visitor cards can be added
- Up to 180,000 presenting card events can be recorded
- Adjustable strip light brightness

Chapter 2 System Wiring

The preparation before installation and general wiring.

Steps

1. Draw a central line on the installation surface of the left or right pedestal.
2. Draw other parallel lines for installing the other pedestals.



Note

The distance between the nearest two line is $581+200$ mm. L represents the lane width.

3. Slotting on the installation surface and dig installation holes according to the hole position diagram.

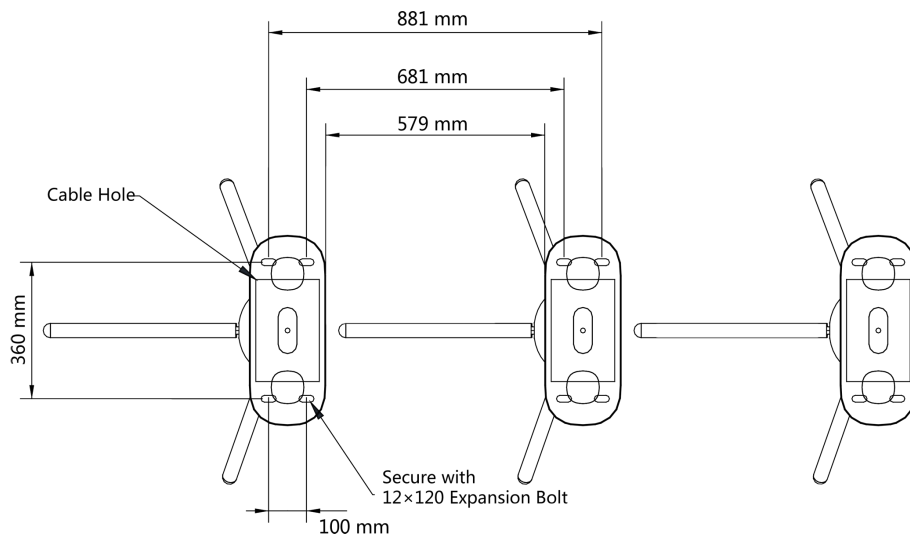


Figure 2-1 Hole Position Diagram

4. Bury cables. Each lane buries 1 network cable and 1 high voltage cable. For details, see the system wiring diagram below.

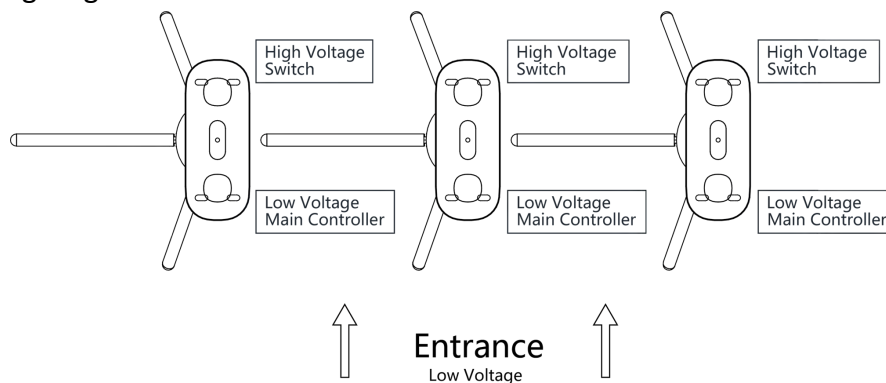


Figure 2-2 System Wiring Diagram



Note

- The suggested inner diameter of the low voltage conduit is larger than 30 mm.
 - If the face recognition module are required to be connected on the left lane, you should increase the conduit diameter or bury another conduit for the external cables.
 - You should bury one network cable and one high voltage conduit for the right and middle lane.
 - The network cable must be CAT5e or the network cable has better performance. And the suggested network cable length should be less than 100 m.
-

Chapter 3 Installation

3.1 Disassemble Pedestals

Before installation, you should use the key to open the pedestals.

View the pictures below to find the lock holes.

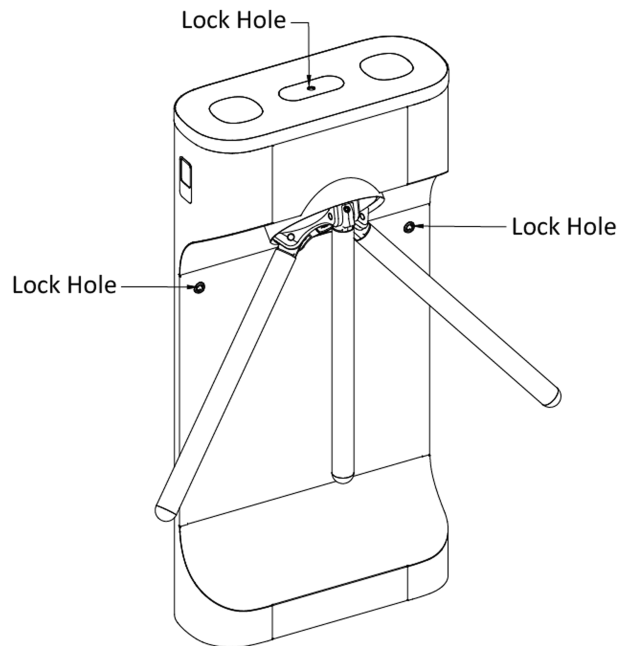


Figure 3-1 Lock Holes

3.2 Install Pedestals

Before You Start

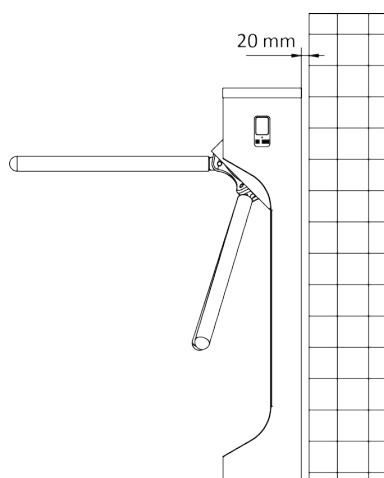
Prepare for the installation tools, check the device and the accessories, and clear the installation base.

Steps

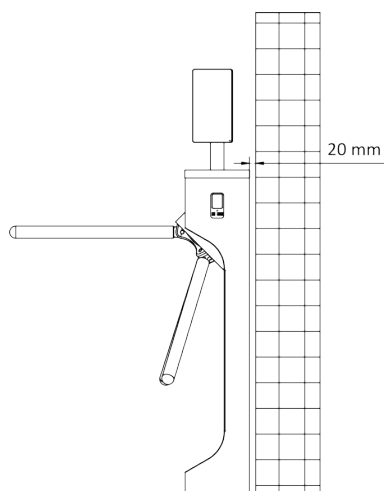


Note

- The device should be installed on the concrete surface or other non-flammable surfaces.
- No face recognition terminal installed: If the installation area is too close to the wall, make sure the distance between the pedestal and the wall should be more than 20 mm, or the surface may be scratched.



Face recognition terminal installed: If the installation area is too close to the wall, make sure the distance between the pedestal and the wall should be more than 20 mm, or the surface may be scratched.



- The dimension is as follows.

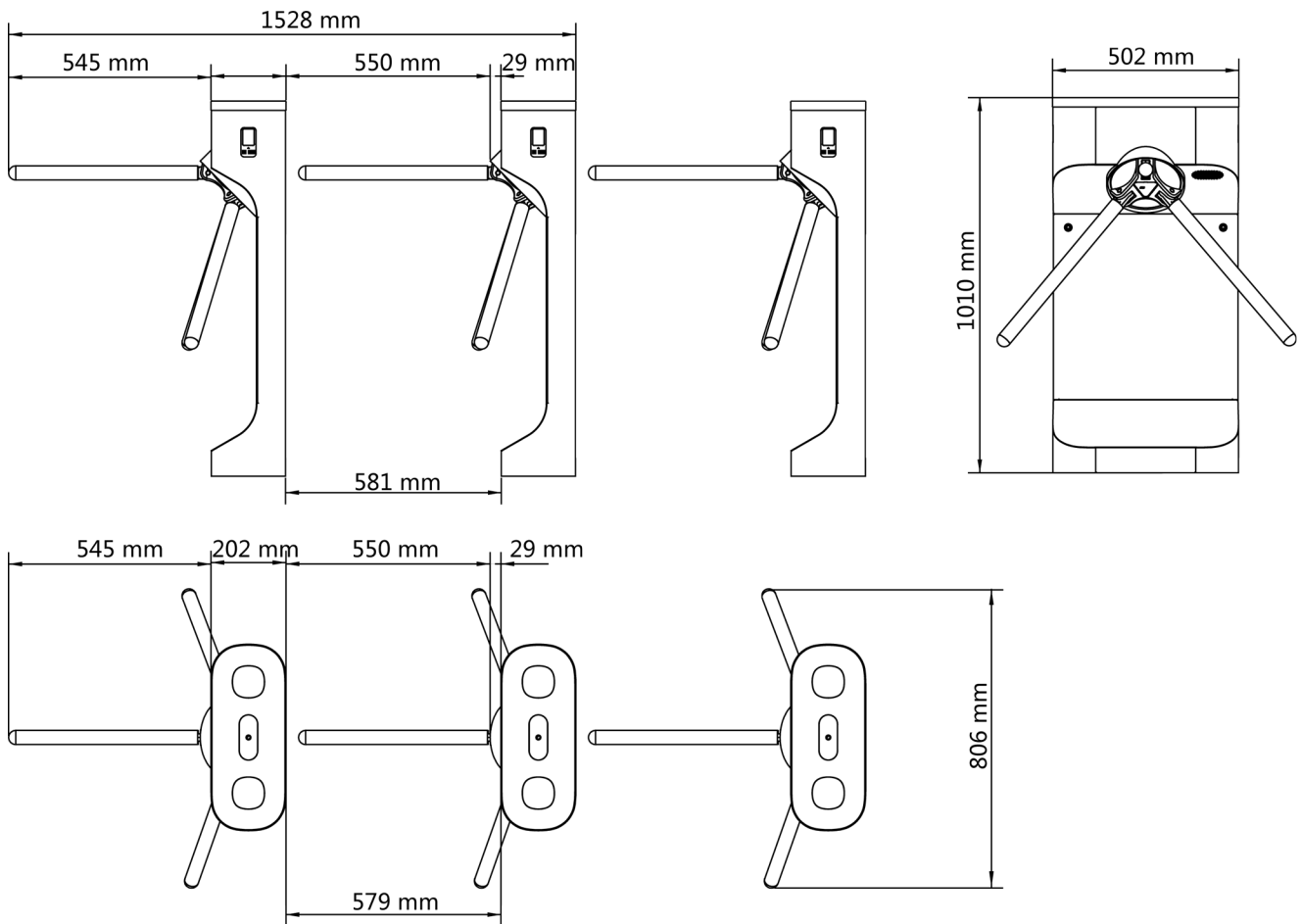


Figure 3-2 Dimension

1. Prepare for the installation tools, check the components, and prepare for the installation base.
2. Drill holes on the ground according to the installation holes on the pedestals and insert the expansion sleeves.
3. Seal the bottom of the turnstile to avoid water from entering.



Note

Make sure the installation holes on the pedestals and the base are aligned with each other.

4. Secure the pedestals with expansion bolts.



Note

- Do not immerse the pedestal in the water. In special circumstances, the immersed height should be no more than 690 mm.
- The installation footprint is as follows:

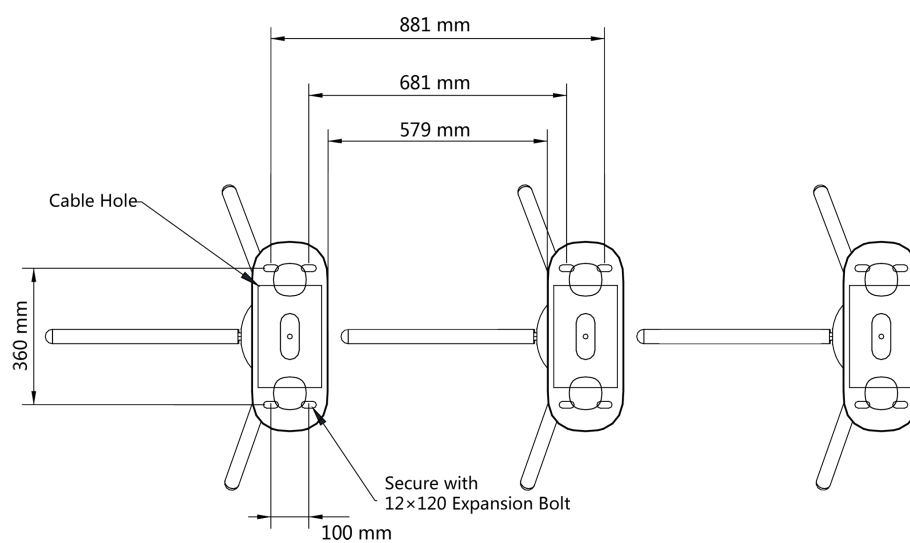


Figure 3-3 Installation Footprint

Chapter 4 General Wiring

4.1 Components Introduction

By default, basic components of the turnstile are connected well. The turnstile supports wiring the AC electric supply for the whole system's power supply.

 Note

The voltage fluctuation of the electric supply is between 100 VAC and 220 VAC, 50 to 60 Hz.

The picture displayed below describes each component's position on the turnstile.

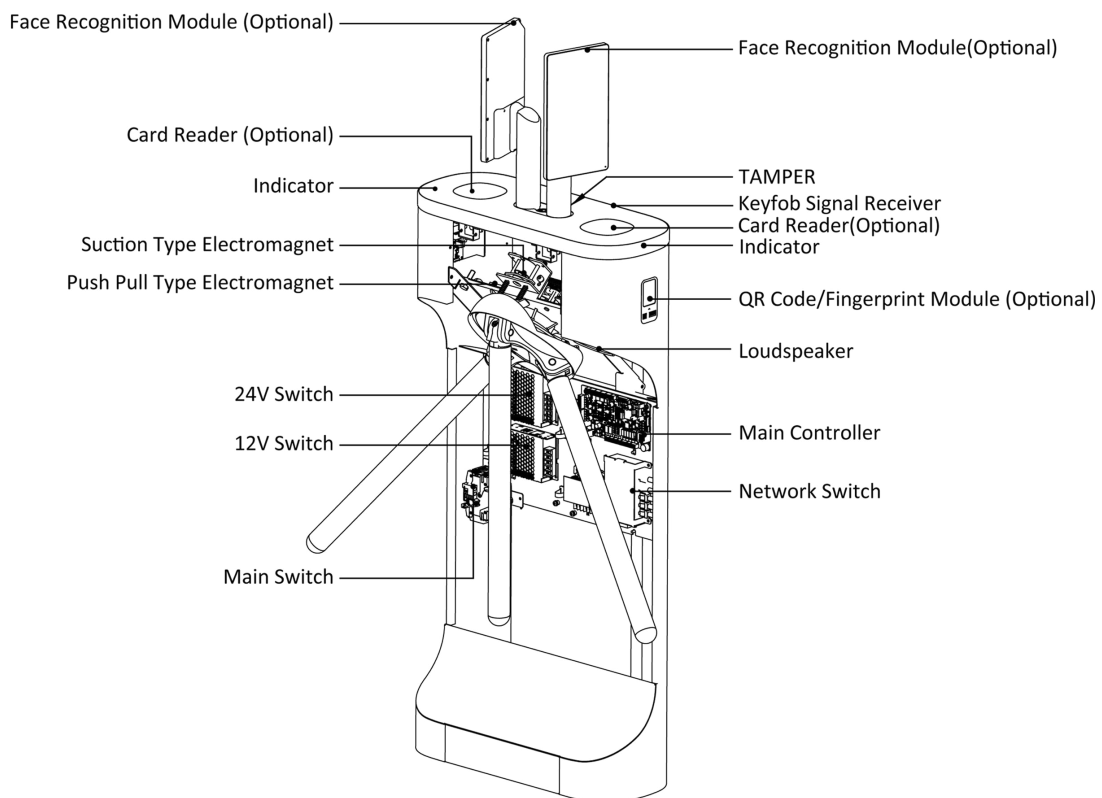
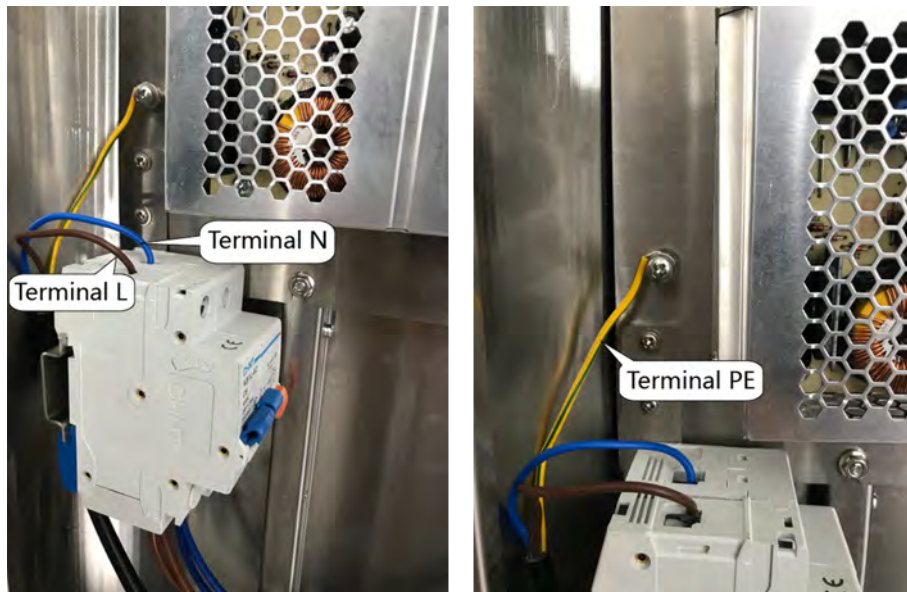


Figure 4-1 Components Diagram 1

4.2 Wiring Electric Supply

Wire electric supply with the switch in the pedestal. Terminal L and terminal N are on the switch, while terminal PE should connect to a ground wire (yellow and green wire).



Warning

Terminal PE should connect to a ground wire to avoid hazard when people touching the device.

Note

- The cable bare part should be no more than 8 mm. If possible, wear an insulation cap at the end of the bare cable. Make sure there's no bare copper or cable after the wiring.
 - The Terminal L and the Terminal N cannot be wired reversely. Do not wire the input and output terminal reversely.
 - To avoid people injury and device damage, when testing, the ground resistance of the equipotential points should not be larger than 2 Ω .
-

4.3 Wire Network Switch

Connect the network cable and the network switch.

Steps

1. Use the key to open the side panel of the pedestal.

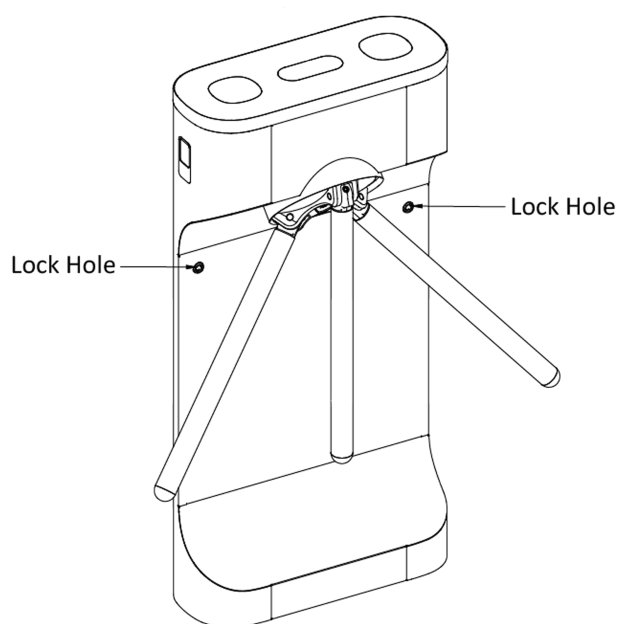


Figure 4-2 Open Side Panel

2. Connect the network cable with the network switch.

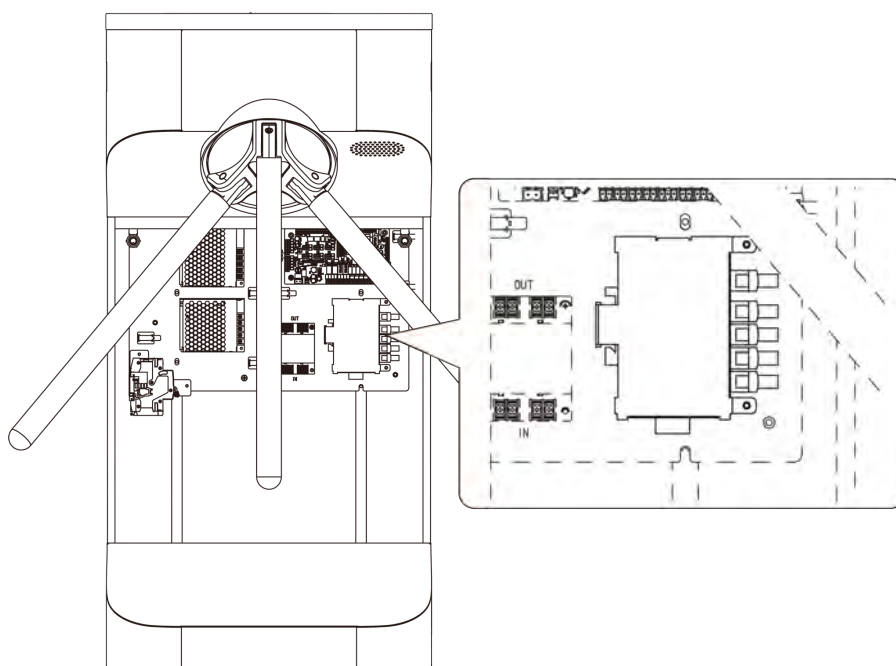


Figure 4-3 Network Switch Position

4.4 Terminal Description

4.4.1 Main Control Board Terminal and BUS Terminal Description

Main Control Board Description

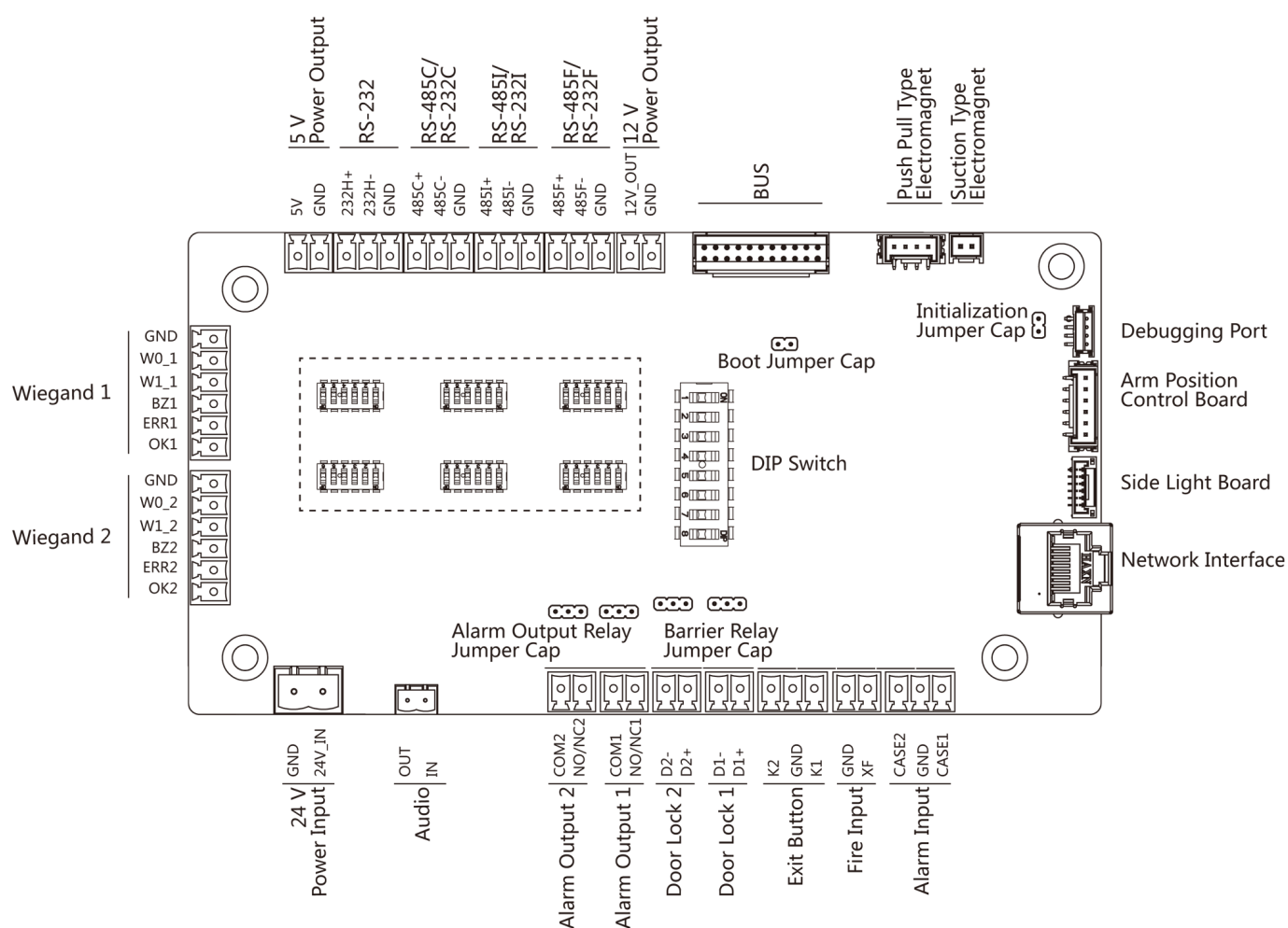


Figure 4-4 Main Control Board Diagram

Table 4-1 Main Control Board Terminal Description Table

Interface Name	Terminal Name	Description	Remark
24 V Power Input	+24 V	24 V Power Output	/
	GND	Grounding	
Audio	OUT	Audio Output	/

Interface Name	Terminal Name	Description	Remark
	IN	Audio Input	
Alarm Output 2	NO/NC2	Alarm Output Relay 2 (Dry Contact)	 Note The alarm output supports relay output.
	COM2		
Alarm Output 1	NO/NC1	Alarm Output Relay 1 (Dry Contact)	 Note The alarm output supports relay output.
	COM1		
Door Lock 2	D2+	Door 2 Relay Output (Dry Contact)	 Note For any requirements, the door lock can control the door barrier status of the third party. D1 controls the barrier opening for entrance, while D2 controls the door opening for exit. For details, see Barrier Control Relay Output Mode .
	D2-		
Door Lock 1	D1+	Door 1 Relay Output (Dry Contact)	 Note For any requirements, the door lock can control the door barrier status of the third party. D1 controls the barrier opening for entrance, while D2 controls the door opening for exit. For details, see Barrier Control Relay Output Mode .
	D1-		
Exit Button	K1	Door 1 Signal Input	/

Interface Name	Terminal Name	Description	Remark
	GND	Grounding	
	K2	Door 2 Signal Input	
Fire Input	XF	Fire System Input	/
	GND	Grounding	
Event Input	CASE1	Event Alarm Input 1	 Note The alarm input hardware interface is normally open by default. So only the normally open signal is allowed. It can be linked to the buzzer of the card reader and access controller, and the alarm relay output and open door relay output.
	GND	Grounding	
	CASE2	Event Alarm Input 2	
Network Interface	LAN	Network Accessing	/
Side Light Board	/	Light Board Accessing	/
Arm Position Control Board	/	Arm Position Control Board Accessing	/
Debugging Port	/	For Debugging Only	/
Suction Type Electromagnet	/	Suction Type Electromagnet Accessing	/
Push Pull Type Electromagnet	/	Push Pull Type Electromagnet Accessing	/
BUS	/	BUS Accessing	 Note For details, see the BUS terminal description table below.

Interface Name	Terminal Name	Description	Remark
RS-485F/RS-232F	485F+	RS-485+ Terminal of Face Recognition Terminal Accessing (Default)	 Note - The DIP of RS-485 card ID is set as 1 and 4 by default. 1 is for entering, and 4 is for exiting. - If the visitor card is configured, you should wire two card readers for the exiting side. One's DIP address is 4, and the other is 3. Card Reader 3 can be applied together with the card receiver. The normal user can authenticate on Card Reader 4 and the visitor can authenticate on Card Reader 3. - You can switch the communication mode between RS-485 and RS-232. For details about the DIP switch description, see Main Control Board DIP Switch Description
	485F-	RS-485- Terminal of Face Recognition Terminal Accessing (Default)	
	GND	Grounding	
RS-485I/RS-232I	485I+	RS-485+ Terminal of Face Recognition Terminal Accessing (Default)	 Note The DIP of RS-485 card ID is set as 1 and 4 by default. 1
	485I-	RS-485- Terminal of Face Recognition	

Interface Name	Terminal Name	Description	Remark
		Terminal Accessing (Default)	is for entering, and 4 is for exiting.
	GND	Grounding	- If the visitor card is configured, you should wire two card readers for the exiting side. One's DIP address is 4, and the other is 3. Card Reader 3 can be applied together with the card receiver. The normal user can authenticate on Card Reader 4 and the visitor can authenticate on Card Reader 3. - You can switch the communication mode between RS-485 and RS-232. For details about the DIP switch description, see Main Control Board DIP Switch Description
RS-485C/RS-232C	485C+	RS-232_RX Terminal of Fingerprint Recorder Accessing (Default)	 Note - The DIP of RS-485 card ID is set as 1 and 4 by default. 1 is for entering, and 4 is for exiting. - If the visitor card is configured, you should wire two card readers for the exiting side. One's
	485C-	RS-232_TX Terminal of Fingerprint Recorder Accessing (Default)	
	GND	Grounding	

Interface Name	Terminal Name	Description	Remark
			DIP address is 4, and the other is 3. Card Reader 3 can be applied together with the card receiver. The normal user can authenticate on Card Reader 4 and the visitor can authenticate on Card Reader 3. You can switch the communication mode between RS-485 and RS-232. For details about the DIP switch description, see Main Control Board DIP Switch Description
RS-232H	232H+	RS-232_RX Terminal of QR Code Scanner Accessing (Default)	 Note The terminal is for RS-232 communication only. You cannot switch its communication mode.
	232H-	RS-232_TX Terminal of QR Code Scanner Accessing (Default)	
	GND	Grounding	
5 V Power Output	5 V	5 V Power Output	/
	GND	Grounding	
Wiegand Card Reader 1	OK1	Indicator of Card Reader Control Output (Invalid Card Output)	 Note The Wiegand card reader 1 refers to the card reader (entering).
	ERR1	Indicator of Card Reader Control Output (Valid Card Output)	

Interface Name	Terminal Name	Description	Remark
	BZ1	Card Reader Buzzer Control Output	
	W1_1	Wiegand Reading Data Input Data1	
	W0_1	Wiegand Reading Data Input Data0	
	GND	Grounding	
Wiegand Card Reader 2	OK2	Indicator of Card Reader Control Output (Invalid Card Output)	 Note The Wiegand card reader 1 refers to the card reader (entering).
	ERR2	Indicator of Card Reader Control Output (Valid Card Output)	
	BZ2	Card Reader Buzzer Control Output	
	W1_2	Wiegand Reading Data Input Data1	
	W0_2	Wiegand Reading Data Input Data0	
	GND	Grounding	

BUS Terminal Description

You can connect the card reader, QR code scanner, etc. via the BUS terminal.

Table 4-2 BUS Terminal Description Table

Interface Name	Terminal Name	Color	Description
Lane Controller Light Board 1	12V	Red	
	PD_485+	Yellow	RS-485+ of Light Board Accessing
	PD_485-	Blue	RS-485- of Light Board Accessing
	GND	Black	Grounding
Lane Controller Light Board 1	12V	Red	12 V Power Terminal
	PD_485+	Yellow	RS-485+ of Light Board Accessing

Interface Name	Terminal Name	Color	Description
	PD_485-	Blue	RS-485- of Light Board Accessing
	GND	Black	Grounding
UART 1 (In Card Reader)  Note For RS-485A/RS-232A	12V	Red	12 V Power Terminal
	PA_485/232+	Yellow	RS-485+ of Card Reader Accessing (Default)
	PA_485/232-	Blue	RS-485- of Card Reader Accessing (Default)
	GND	Black	Grounding
TAMPER	TAMPER	Brown	TAMPER
	GND	Brown	Grounding
UART 8 (QR Code)  Note For RS-232G	5V	Red	5 V Power Terminal
	232+	Blue	RS-232- of QR Code Scanner Accessing (Default)
	232-	Green	RS-232- of QR Code Scanner Accessing (Default)
	GND	Black	Grounding
UART 5 (Out Card Reader)  Note For RS-232E/RS-485E	12V	Red	12 V Power Terminal
	485/232+	Yellow	RS-485+ of Card Reader Accessing (Default)
	485/232-	Blue	RS-485- of Card Reader Accessing (Default)
	GND	Black	Grounding
UART 2 (Out Fingerprint)  Note For RS-232B/RS485B	5V	Red	5 V Power Terminal
	PB_485/232+	Purple	RS-232_RX of Fingerprint Recorder Accessing (Default)

Interface Name	Terminal Name	Color	Description
	PB_485/232-	Yellow	RS-232_TX of Fingerprint Recorder Accessing (Default)
	GND	Black	Grounding

4.4.2 Main Control Board DIP Switch Description

You can set the device mode, switch the communication mode between RS-232 and RS-485, initialize the device via the DIP switch on the main control board.

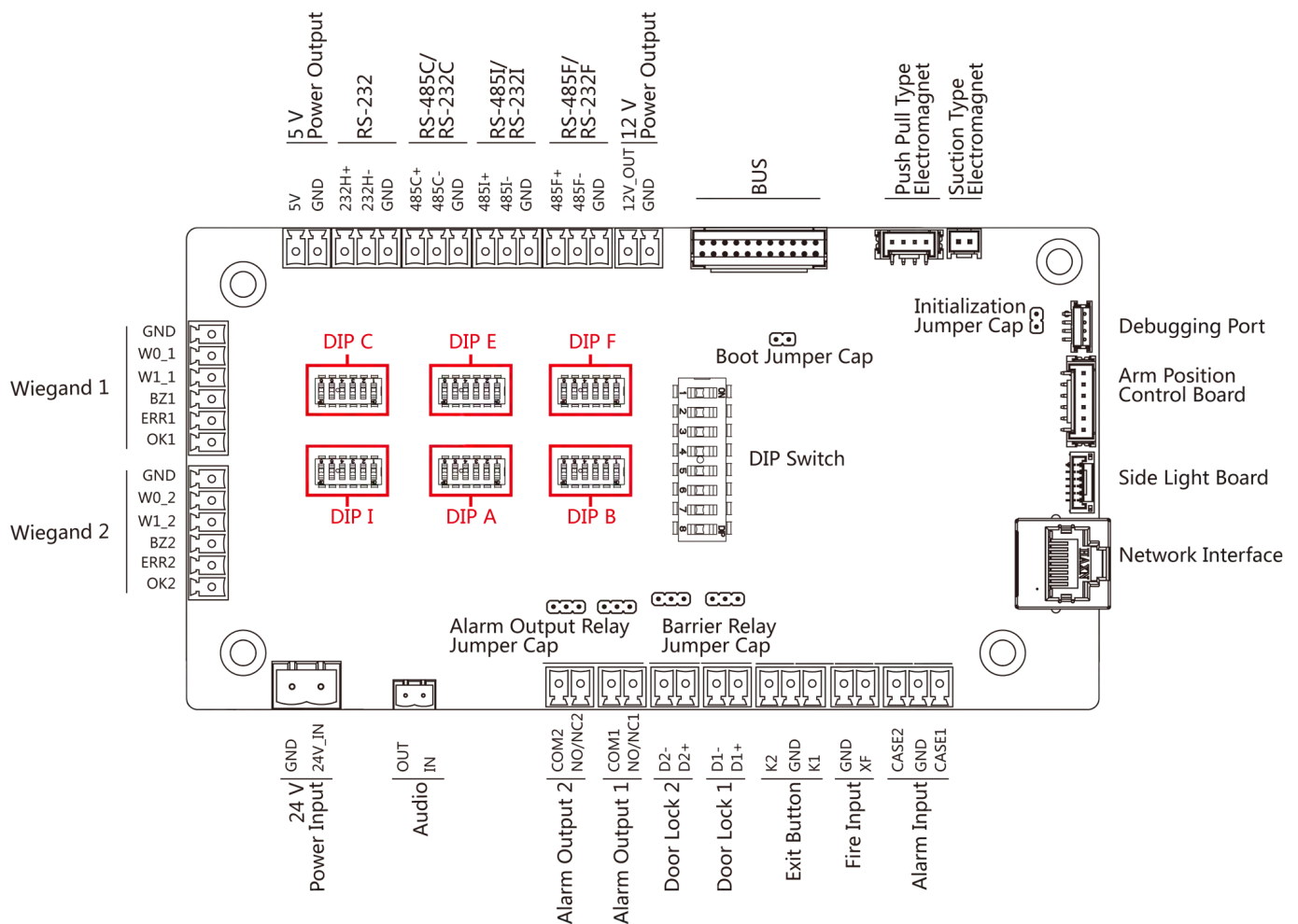


Figure 4-5 DIP Switch on Main Control Board

You can set the device mode via the 8-bit DIP switch.

You can switch the communication mode between RS-232 and RS-485 via DIP A, DIP B, DIP C, DIP E, DIP F, and DIP I.

The corresponded UART No. of the DIP switch is as follows:

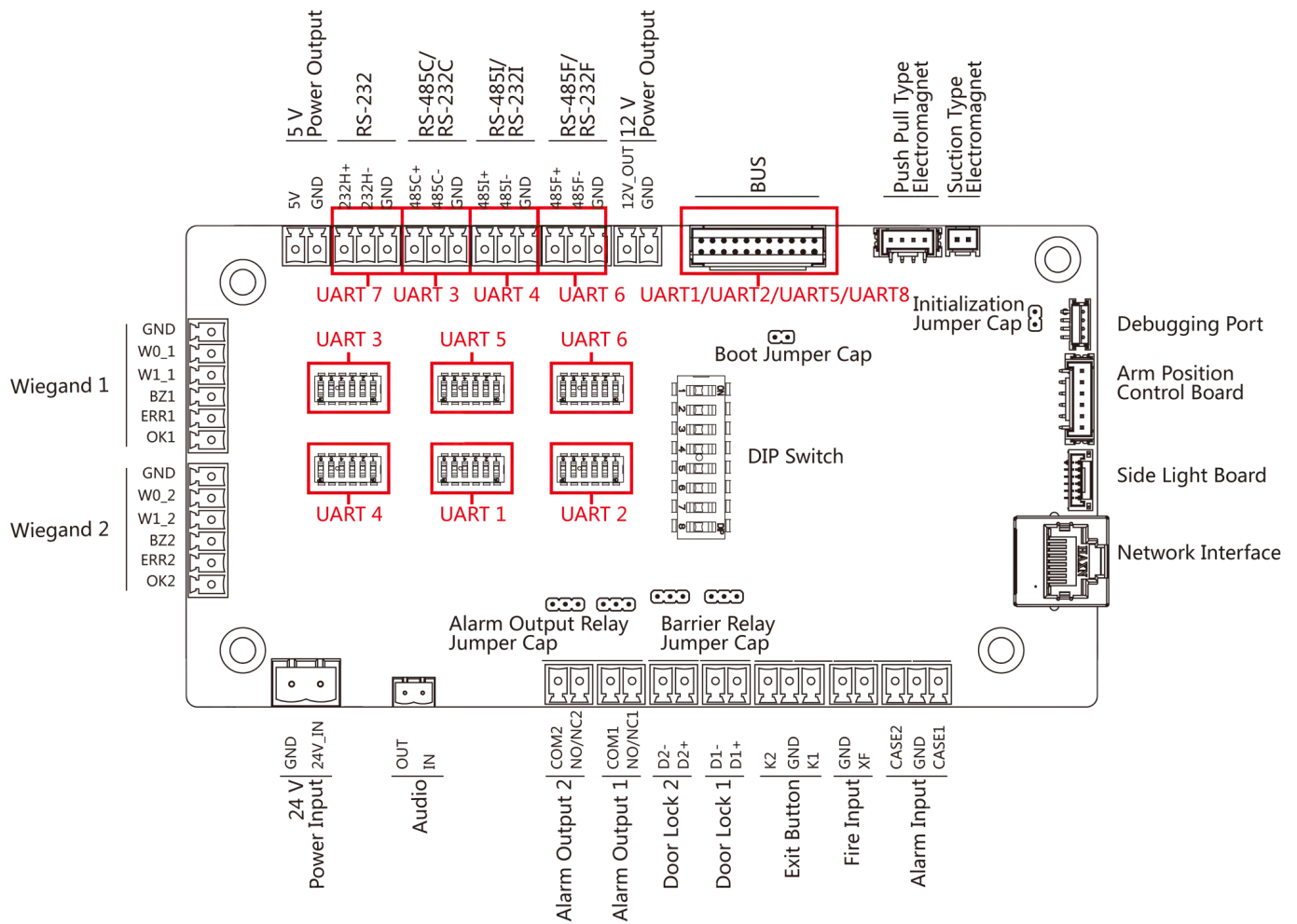
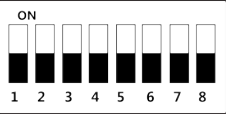
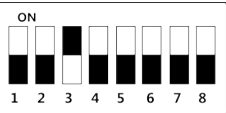
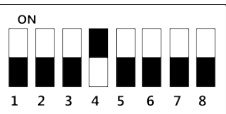
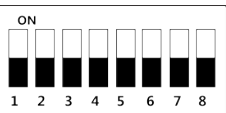
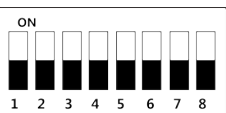
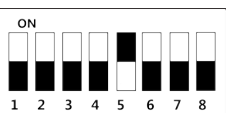
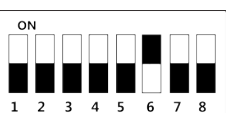
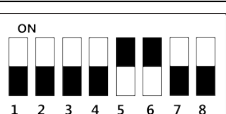
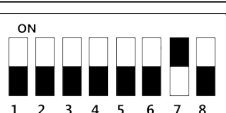
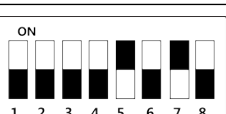
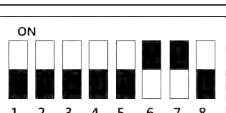


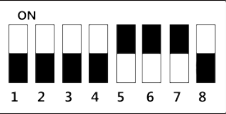
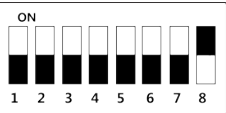
Figure 4-6 UART No. Diagram

The function of different DIP switches are as follows:

Table 4-3 Function of DIP Switch

DIP Switch Name	DIP Switch Bit	UART No.	Function	Diagram
8-bit DIP Switch	1 to 2 (Work Mode)	/	Normal Mode	
			Test Mode	

DIP Switch Name	DIP Switch Bit	UART No.	Function	Diagram
	3 (Memory Mode)	/	Enable Memory Mode	
			Disable Memory Mode	
	4 (Keyfob Pairing Mode)	/	Enable Keyfob Pairing Mode	
			Disable Keyfob Pairing Mode	
	5 to 8 (Passing Mode)	/	Controlled Bi-direction	
			Controlled Entrance and Prohibit Exit	
			Controlled Entrance and Free Exit	
			Free Bi-direction	
			Free Entrance and Controlled Exit	
			Free Entrance and Prohibit Exit	
			Prohibited Bi-direction	

DIP Switch Name	DIP Switch Bit	UART No.	Function	Diagram
			Prohibit Entrance and Controlled Exit	
			Prohibit Entrance and Free Exit	
DIP A	1 to 3	UART 1	ON: UART 1 is RS-232A Interface	/
	4 to 6		ON: UART 1 is RS-485A Interface	/
DIP B	1 to 3	UART 2	ON: UART 2 is RS-232B Interface	/
	4 to 6		ON: UART 2 is RS-485B Interface	/
DIP C	1 to 3	UART 3	ON: UART 3 is RS-232C Interface	/
	4 to 6		ON: UART 3 is RS-485C Interface	/
DIP E	1 to 3	UART 5	ON: UART 5 is RS-232E Interface	/
	4 to 6		ON: UART 5 is RS-485E Interface	/
DIP F	1 to 3	UART 6	ON: UART 6 is RS-232F Interface	/
	4 to 6		ON: UART 6 is RS-485F Interface	/
DIP I	1 to 3	UART 4	ON: UART 4 is RS-232I Interface	/
	4 to 6		ON: UART 4 is RS-485I Interface	/



Note

Bit 1 to 3 and bit 4 to 6 of DIP switch A, B, C, E, F, and I cannot be ON at the same time.

The UART No., the related tag, and the tag's position are as follows:

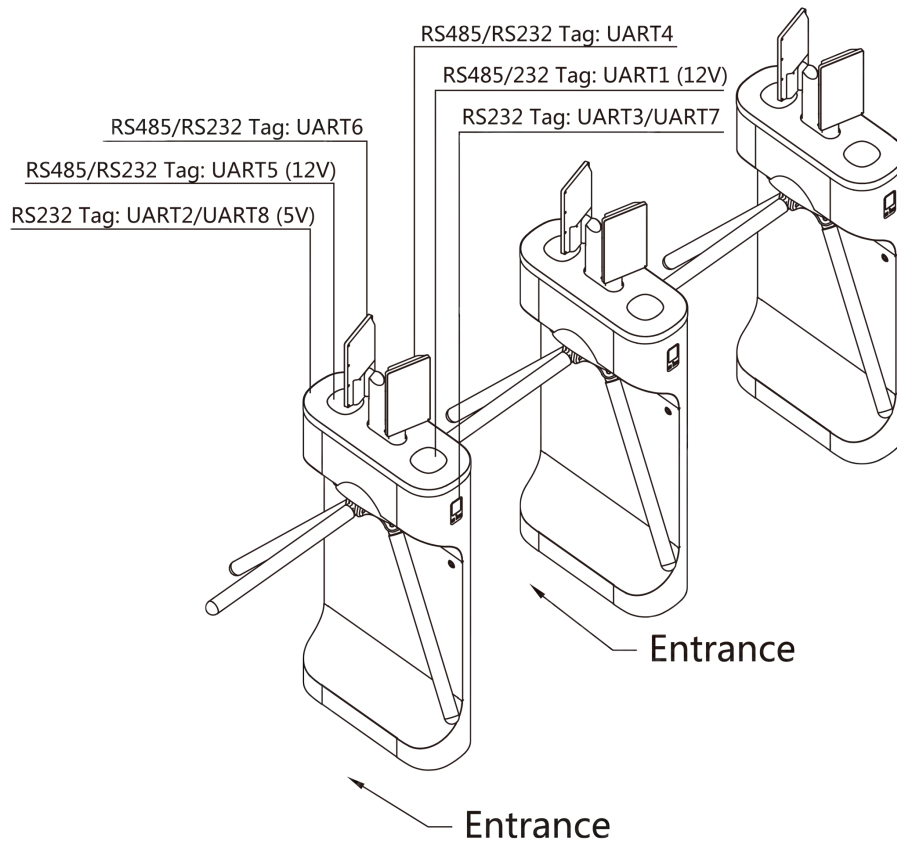
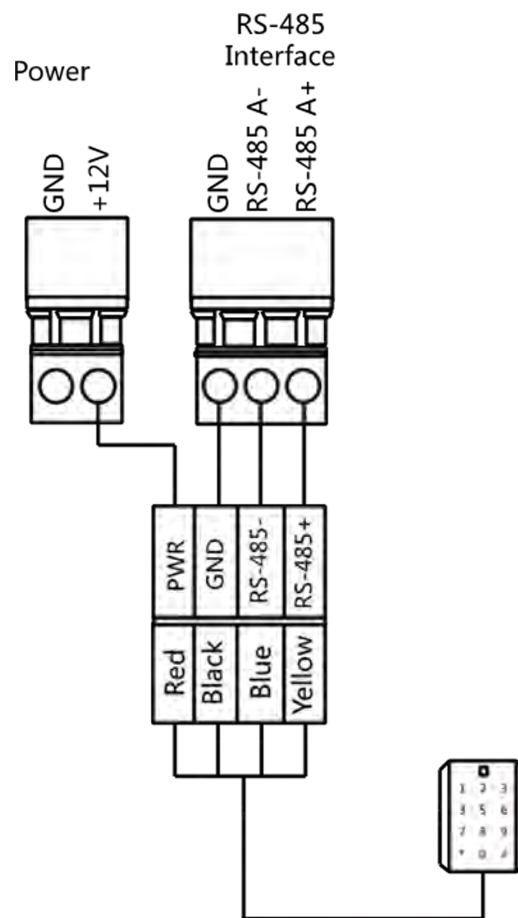


Figure 4-7 Interface and Corresponded UART No.

4.4.3 RS-485 Wiring

Note

- When the RS-485 terminal should connect with card reader, the DIP switch for entrance is 1, for exit is 4.
- The RS-485 ID should not be duplicated when connecting to multiple RS-485 devices.



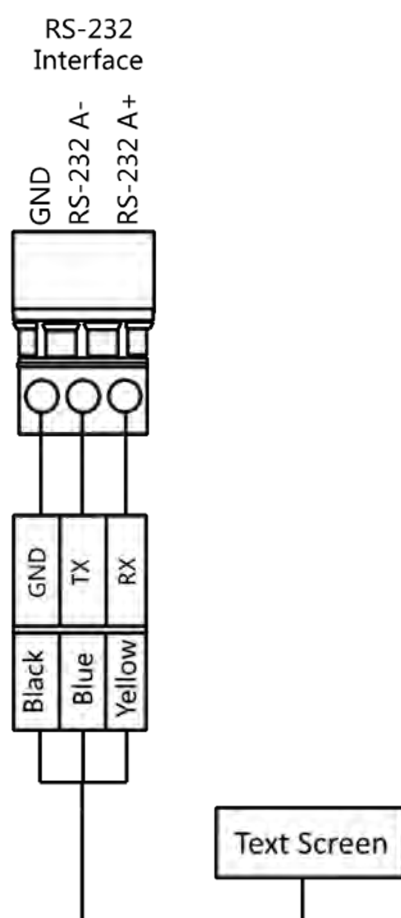
Note

- There are four RS-485 interfaces, which are for connecting ID card reader, IC card reader, QR code scanner, fingerprint and card reader, card recycler, text screen, fingerprint reader, and face recognition terminal. Take the wiring of RS-485 card reader as an example.
 - For details about text screen, see *Configuring Screen Parameters* in *User Manual of iVMS-4200 AC Client Software*.
-

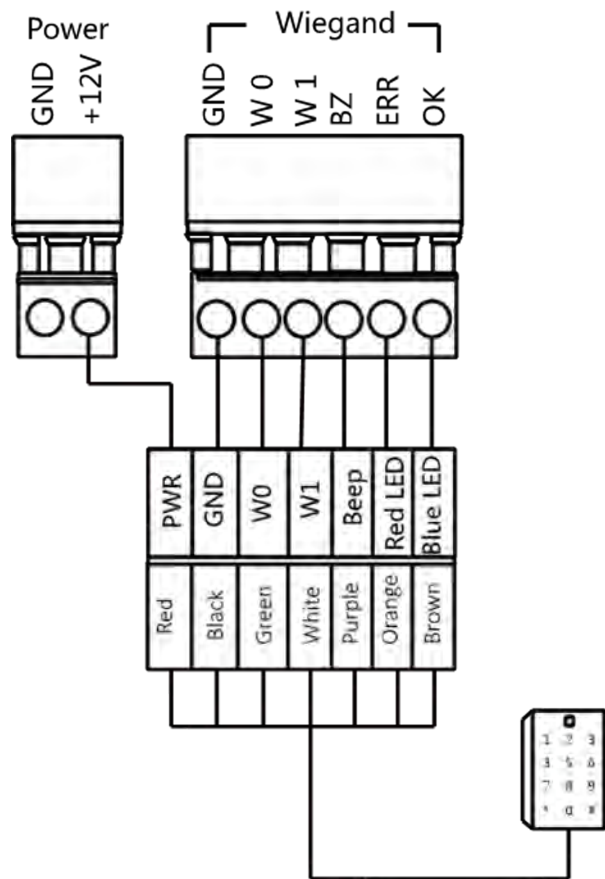
4.4.4 RS-232 Wiring

Note

- The RS-232 interfaces can connect QR code scanner, card recycler, and text screen.
 - For details about text screen, see *Configuring Screen Parameters* in *User Manual of iVMS-4200 AC Client Software*.
 - Take the wiring of text screen as an example.
-



4.4.5 Wiegand Wiring



Note

Connect the OK/ERR/BZ if the access controller should control the LED and buzzer of the Wiegand card reader.

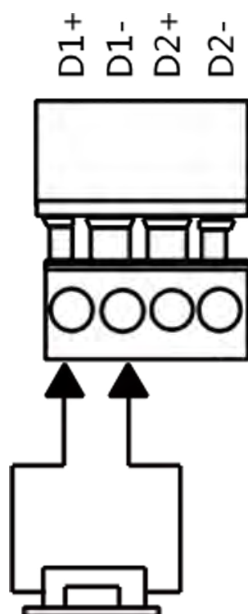
4.4.6 Barrier Control Wiring

By default, the barrier has connected with the main control board. If possible, the device can connect with a third party control board to control the third party barriers. Interface D1 controls barrier opening for entrance, while interface D2 controls barrier opening for exit.

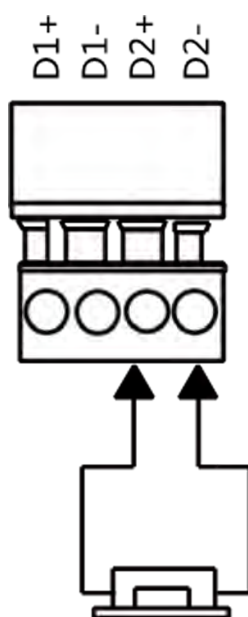
Note

The output signal is relay. The terminals cannot connect with the devices carrying voltage.

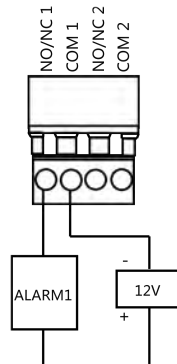
Entering Wiring



Exiting Wiring



4.4.7 Alarm Output Wiring



Note

For details about changing the relay output status via the jumper cap, see **Alarm Relay Output Mode (NO/NC)**.

4.4.8 Fire Alarm Module Wiring

You can view the fire alarm module wiring diagram.

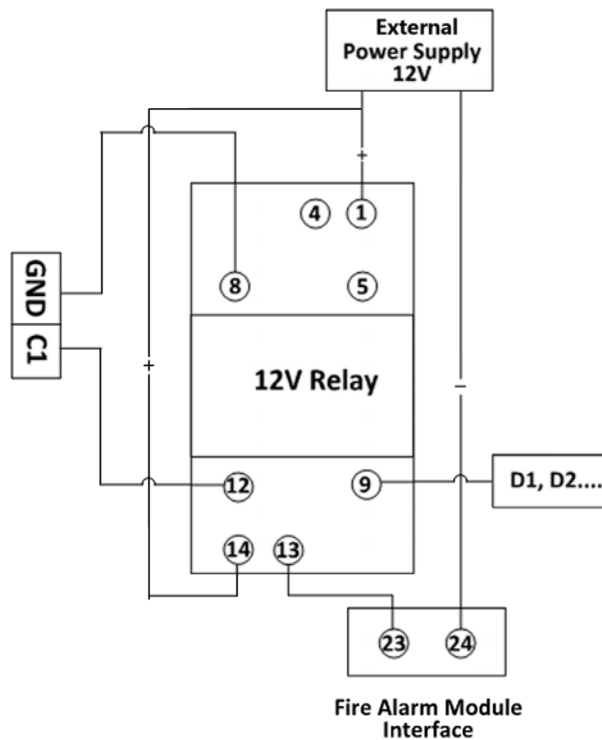


Figure 4-8 Fire Alarm Module Wiring

Chapter 5 Device Settings

You can also set the turnstile to passing mode and memory mode, pair the keyfob, initialize the hardware, switching between RS-485 communication mode and RS-232 communication mode, and view relay output NO/NC diagram by setting the DIP switch on the main control board.

- Normal Mode: The device will work properly.
- Passing Mode: There are 9 passing modes, including controlled bi-direction, controlled entrance and prohibited exit, controlled entrance and free exit, free bi-direction, free entrance and controlled exit, free entrance and prohibited exit, prohibited bi-direction, prohibited entrance and free exit.
- Memory Mode: By default, the memory mode is enabled. When multiple cards are presented and authenticated, it allows multiple persons passing through the lane. When it counts the passing people number is equal to the card presented times, or no person passing through the lane after the last person passing, the barriers will be closed.

Note

You can also set the DIP switch on the main control board to control the entrance and exit controlling type, keyfob pairing, etc. For details about the DIP switch value, see .

5.1 Pair Keyfob (Optional)

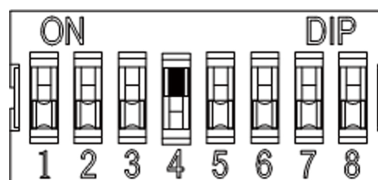
Pair the remote control to the device through DIP switch to open/close the barrier remotely.

Before You Start

Ask our technique supports or sales and purchase the keyfob.

Steps

1. Power off the turnstile.
2. Set the No.4 switch of the 8-digit DIP Switch on the main control board to the ON side.



3. Power on the turnstile and it will enter the keyfob pairing mode.
4. Hold the **Close** button for more than 10 seconds.

The keyfob's indicator of the will flash twice if the pairing is completed.

5. Set the DIP switch as OFF (the number side), and reboot the turnstile to take effect.



Note

- You can also pair the keyfob via the client software. For details, see **Manage Keyfob User**.
- Only one turnstile can pair the keyfob. If multiple turnstiles are in the pairing mode, the keyfob will select only one of them to pair.
- For details about DIP switch value and meaning, see .

6. **Optional:** Go to **System → User → Keyfob User** on the remote control page of the client software to delete the keyfob.

5.2 Initialize Device

Steps

1. Remove the jumper cap of initialization pin on the main control board.

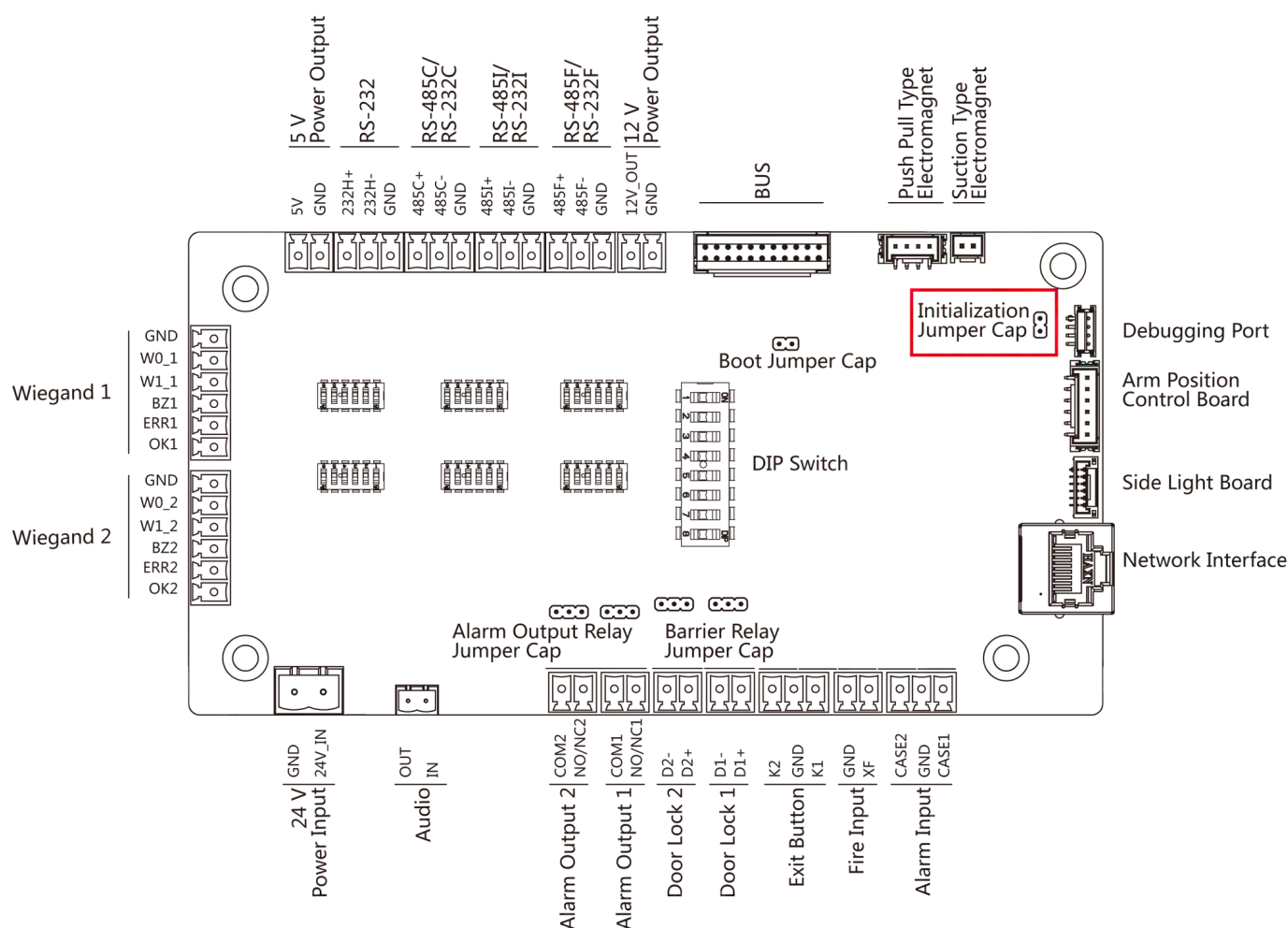


Figure 5-1 Initialization Jumper Cap

2. Disconnect the power and reboot the device. The device buzzer buzzes a long beep.

3. When the beep stopped, plug the jumper cap back.
4. Disconnect the power and power on the device again.



Caution

The initialization of the device will restore all the parameters to the default setting and all the device events are deleted.



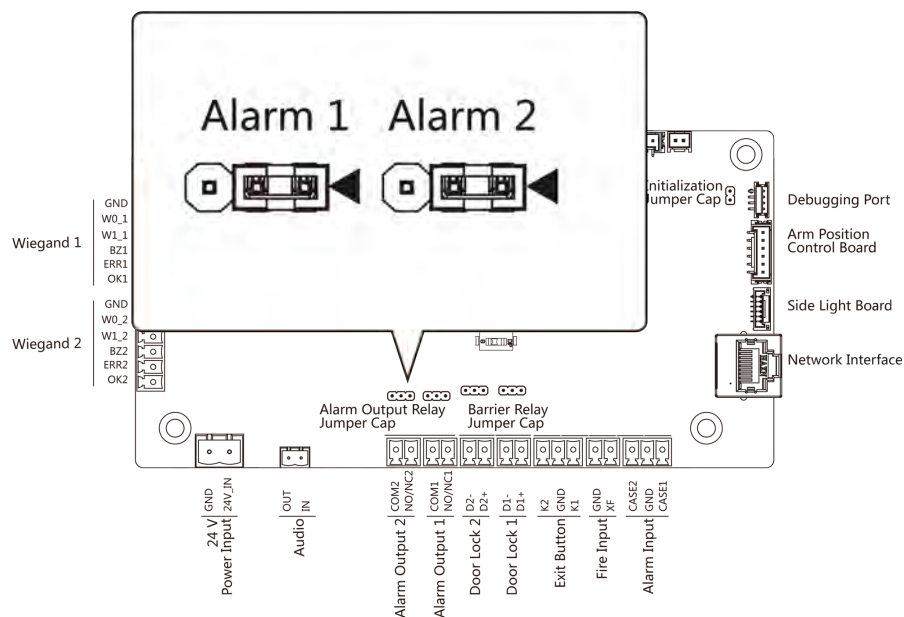
Note

Make sure no persons are in the lane when powering on the device.

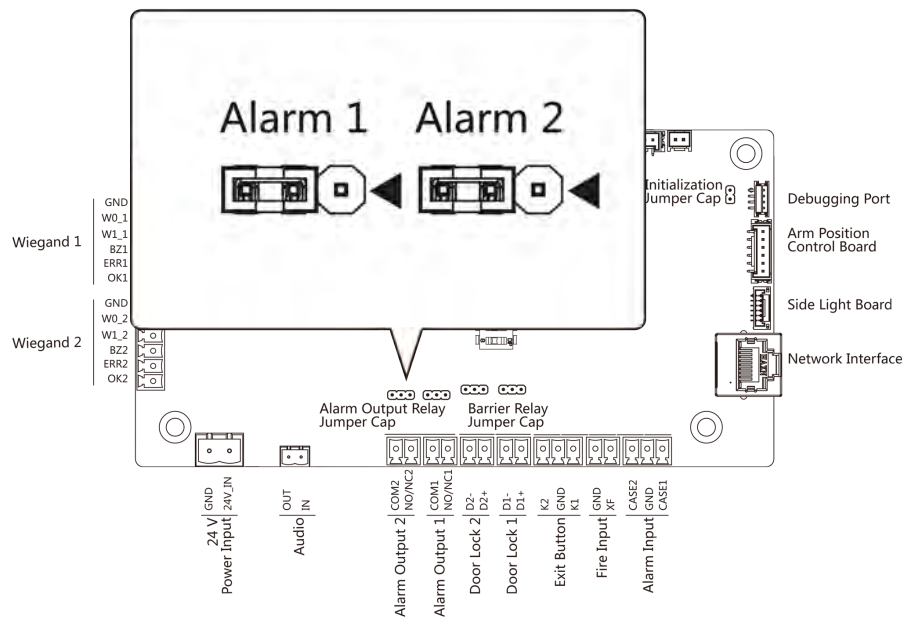
5.3 Relay Output NO/NC Settings

5.3.1 Alarm Relay Output Mode (NO/NC)

Alarm Relay Output Mode (NO):

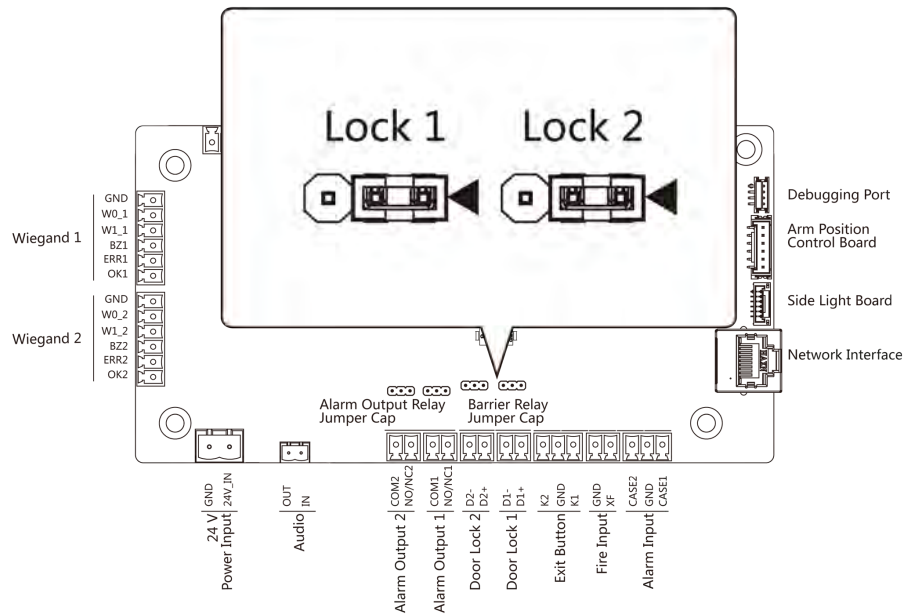


Alarm Relay Output Mode (NC):

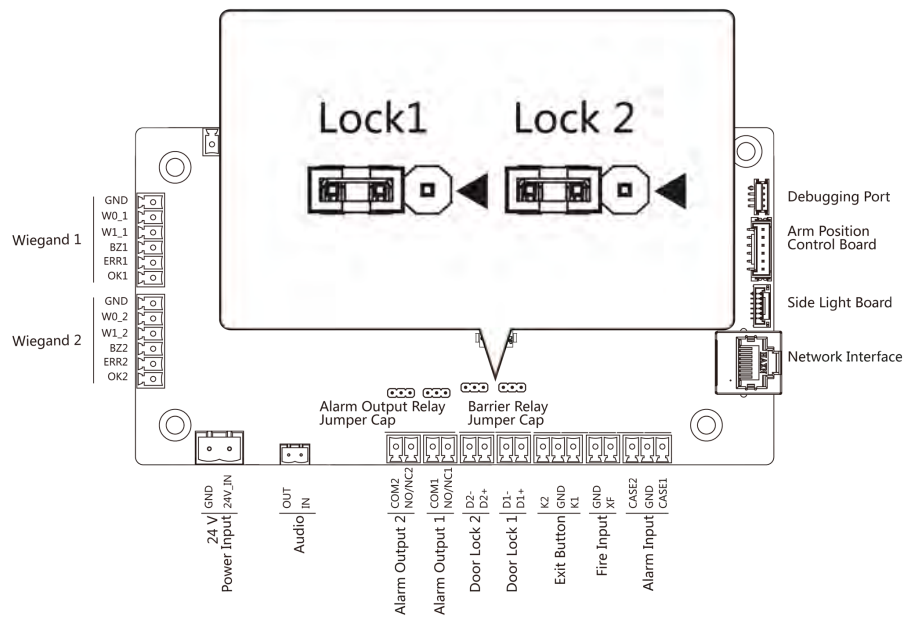


5.3.2 Barrier Control Relay Output Mode

Barrier Control Relay Output Mode (NO):



Barrier Control Relay Output Mode (NC):



Chapter 6 Activation

You should activate the device before the first login. After powering on the device, the system will switch to Device Activation page.

Activation via the device, SADP tool and the client software are supported.

The default values of the device are as follows:

- The default IP address: 192.0.0.64
- The default port No.: 8000
- The default user name: admin

6.1 Activate via SADP

SADP is a tool to detect, activate and modify the IP address of the device over the LAN.

Before You Start

- Get the SADP software from the supplied disk or the official website <http://www.hikvision.com/en/>, and install the SADP according to the prompts.
- The device and the PC that runs the SADP tool should be within the same subnet.

The following steps show how to activate a device and modify its IP address. For batch activation and IP addresses modification, refer to *User Manual of SADP* for details.

Steps

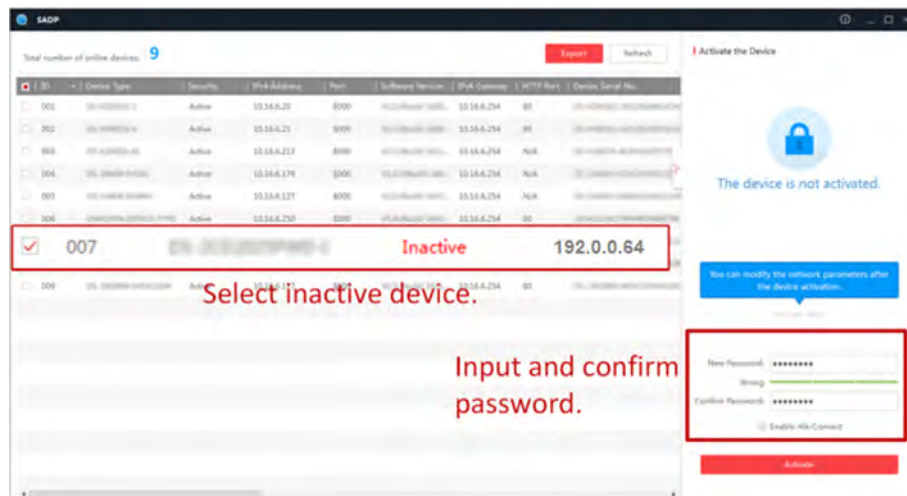
1. Run the SADP software and search the online devices.
2. Find and select your device in online device list.
3. Input new password (admin password) and confirm the password.



Caution

STRONG PASSWORD RECOMMENDED-We highly recommend you create a strong password of your own choosing (using a minimum of 8 characters, including upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you reset your password regularly, especially in the high security system, resetting the password monthly or weekly can better protect your product.

4. Click **Activate** to start activation.



Status of the device becomes **Active** after successful activation.

5. Modify IP address of the device.

- 1) Select the device.
- 2) Change the device IP address to the same subnet as your computer by either modifying the IP address manually or checking **Enable DHCP**.
- 3) Input the admin password and click **Modify** to activate your IP address modification.

6.2 Activate Device via Client Software

For some devices, you are required to create the password to activate them before they can be added to the software and work properly.

Steps



Note

This function should be supported by the device.

1. Enter the Device Management page.
2. Click  on the right of **Device Management** and select **Device**.
3. Click **Online Device** to show the online device area.

The searched online devices are displayed in the list.

4. Check the device status (shown on **Security Level** column) and select an inactive device.
5. Click **Activate** to open the Activation dialog.
6. Create a password in the password field, and confirm the password.



Caution

The password strength of the device can be automatically checked. We highly recommend you change the password of your own choosing (using a minimum of 8 characters, including at least

three kinds of following categories: upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you change your password regularly, especially in the high security system, changing the password monthly or weekly can better protect your product.

Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.

7. Click **OK** to activate the device.

Chapter 7 Client Software Configuration

7.1 Configuration Flow of Client Software

Follow the flow diagram below to configure on the client software.

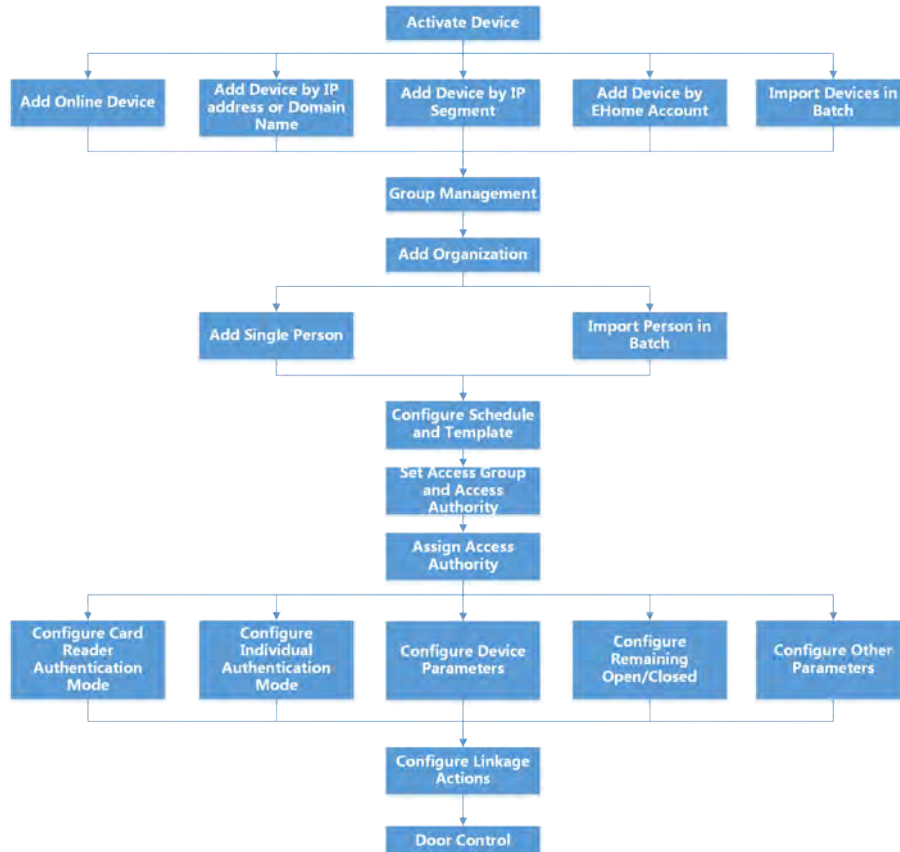


Figure 7-1 Flow Diagram of Configuration on Client Software

7.2 Device Management

The client supports managing access control devices and video intercom devices.

Example

You can control entrance & exit and manage attendance after adding access control devices to the client; you can perform video intercom with the indoor stations and door stations.

7.2.1 Add Device

The client provides three device adding modes including by IP/domain, IP segment, and ISUP protocol. The client also supports importing multiple devices in a batch when there are large amount of devices to be added.

Add Online Device

The active online devices in the same local subnet with the client software will be displayed on the **Online Device** area. You can click **Refresh Every 60s** to refresh the information of the online devices.

Add Single Online Device

You can add single online device to the client software.

Steps

1. Enter the Device Management module.
2. **Optional:** Click  on the right of **Device Management** and select **Device**.
3. Click **Online Device** to show the online device area.
The searched online devices are displayed in the list.
4. Select an online device from the **Online Device** area.



Note

For the inactive device, you need to create the password for it before you can add the device properly. For detailed steps, refer to **Activation**.

5. Click **Add** to open the device adding window.
6. Enter the required information.

Name

Enter a descriptive name for the device.

Address

The IP address of the device is obtained automatically in this adding mode.

Port

The port number is obtained automatically.

User Name

By default, the user name is admin.

Password

Enter the device password.



Caution

The password strength of the device can be automatically checked. We highly recommend you change the password of your own choosing (using a minimum of 8 characters, including at least three kinds of following categories: upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you change your password regularly, especially in the high security system, changing the password monthly or weekly can better protect your product.

Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.

-
7. **Optional:** Check **Synchronize Time** to synchronize the device time with the PC running the client after adding the device to the client.
 8. **Optional:** Check **Import to Group** to create a group by the device name.



Note

You can import all the channels of the device to the corresponding group by default.

-
9. Click **OK** to add the device.

Add Multiple Online Devices

You can add multiple online devices to the client software.

Steps

1. Enter the Device Management module.
2. Click  on the right of **Device Management** and select **Device**.
3. Click **Online Device** to show the online device area.

The searched online devices are displayed in the list.

4. Select multiple devices.



Note

For the inactive device, you need to create the password for it before you can add the device properly. For detailed steps, refer to **Activation**.

-
5. Click **Add** to open the device adding window.
 6. Enter the required information.

User Name

By default, the user name is admin.

Password

Enter the device password.



Caution

The password strength of the device can be automatically checked. We highly recommend you change the password of your own choosing (using a minimum of 8 characters, including at least three kinds of following categories: upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you change your password regularly, especially in the high security system, changing the password monthly or weekly can better protect your product.

Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.

7. **Optional:** Check **Synchronize Time** to synchronize the device time with the PC running the client after adding the devices to the client.
 8. **Optional:** Check **Import to Group** to create a group by the device name.
-



Note

You can import all the channels of the device to the corresponding group by default.

9. Click **OK** to add the devices.

Add Device by IP Address or Domain Name

If you know the IP address or domain name of the device to add, you can add devices to the client by specifying the IP address (or domain name), user name, password, etc.

Steps

1. Enter Device Management module.
2. Click **Device** tab on the top of the right panel.
The added devices are displayed on the right panel.
3. Click **Add** to open the Add window, and then select **IP/Domain** as the adding mode.
4. Enter the required information.

Name

Create a descriptive name for the device. For example, you can use a nickname that can show the location or feature of the device.

Address

The IP address or domain name of the device.

Port

The devices to add share the same port number. The default value is **8000**.

User Name

Enter the device user name. By default, the user name is **admin**.

Password

Enter the device password.



Caution

The password strength of the device can be automatically checked. We highly recommend you change the password of your own choosing (using a minimum of 8 characters, including at least three kinds of following categories: upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you change your password regularly, especially in the high security system, changing the password monthly or weekly can better protect your product.

Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.

-
5. **Optional:** Check **Transmission Encryption (TLS)** to enable transmission encryption using TLS (Transport Layer Security) protocol for security purpose.



Note

- This function should be supported by the device.
- If you have enabled Certificate Verification, you should click **Open Certificate Directory** to open the default folder, and copy the certificate file exported from the device to this default directory to strengthen the security. See for details about enabling certificate verification.
- You can log into the device to get the certificate file by web browser.

-
6. Check **Synchronize Time** to synchronize the device time with the PC running the client after adding the device to the client.
7. **Optional:** Check **Import to Group** to create a group by the device name, and import all the channels of the device to this group.

Example

For access control device, its access points, alarm inputs/outputs, and encoding channels (if exist) will be imported to this group.

8. Finish adding the device.
- Click **Add** to add the device and back to the device list page.
 - Click **Add and New** to save the settings and continue to add other device.

Add Devices by IP Segment

If the devices share the same port No., user name and password, and their IP addresses ranges in the same IP segment, you can add them to the client by specifying the start IP address and the end IP address, port No., user name, password, etc of the devices.

Steps

1. Enter the Device Management module.
2. Click **Device** tab on the top of the right panel.

The added devices are displayed on the right panel.

3. Click **Add** to open the Add window.
4. Select **IP Segment** as the adding mode.
5. Enter the required information.

Start IP

Enter a start IP address.

End IP

Enter an end IP address in the same network segment with the start IP.

Port

Enter the device port No. The default value is **8000**.

User Name

By default, the user name is **admin**.

Password

Enter the device password.



Caution

The password strength of the device can be automatically checked. We highly recommend you change the password of your own choosing (using a minimum of 8 characters, including at least three kinds of following categories: upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you change your password regularly, especially in the high security system, changing the password monthly or weekly can better protect your product.

Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.

6. **Optional:** Check **Transmission Encryption (TLS)** to enable transmission encryption using TLS (Transport Layer Security) protocol for security purpose .
-



Note

- This function should be supported by the device.
 - If you have enabled Certificate Verification, you should click **Open Certificate Folder** to open the default folder, and copy the certificate file exported from the device to this default directory to strengthen the security. See for details about enabling certificate verification.
 - You can log into the device to get the certificate file by web browser.
-

7. Check **Synchronize Time** to synchronize the device time with the PC running the client after adding the device to the client.
8. **Optional:** Check **Import to Group** to create a group by the device name, and import all the channels of the device to the group.
9. Finish adding the device.
 - Click **Add** to add the device and back to the device list page.
 - Click **Add and New** to save the settings and continue to add other device.

Import Devices in a Batch

You can add multiple devices to the client in a batch by entering the device parameters in a pre-defined CSV file.

Steps

1. Enter the Device Management module.
2. Click **Device** tab on the top of the right panel.
3. Click **Add** to open the Add window, and then select **Batch Import** as the adding mode.
4. Click **Export Template** and then save the pre-defined template (CSV file) on your PC.
5. Open the exported template file and enter the required information of the devices to be added on the corresponding column.



Note

For detailed description of the required fields, refer to the introductions in the template.

Adding Mode

Enter **0** or **1** or **2**.

Address

Edit the address of the device.

Port

Enter the device port number. The default port number is **8000**.

User Name

Enter the device user name. By default, the user name is **admin**.

Password

Enter the device password.



Caution

The password strength of the device can be automatically checked. We highly recommend you change the password of your own choosing (using a minimum of 8 characters, including at least three kinds of following categories: upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you change your password regularly, especially in the high security system, changing the password monthly or weekly can better protect your product.

Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.

Import to Group

Enter **1** to create a group by the device name. All the channels of the device will be imported to the corresponding group by default. Enter **0** to disable this function.

6. Click  and select the template file.

7. Click **Add** to import the devices.

7.2.2 Reset Device Password

If you forgot the password of the detected online devices, you can reset the device password via the client.

Steps

1. Enter Device Management page.
2. Click **Online Device** to show the online device area.
All the online devices sharing the same subnet will be displayed in the list.
3. Select the device from the list and click  on the Operation column.
4. Reset the device password.
 - Click **Generate** to pop up the QR Code window and click **Download** to save the QR code to your PC. You can also take a photo of the QR code to save it to your phone. Send the picture to our technical support.



Note

For the following operations for resetting the password, contact our technical support.



Caution

The password strength of the device can be automatically checked. We highly recommend you change the password of your own choosing (using a minimum of 8 characters, including at least three kinds of following categories: upper case letters, lower case letters, numbers, and special characters) in order to increase the security of your product. And we recommend you change your password regularly, especially in the high security system, changing the password monthly or weekly can better protect your product.

Proper configuration of all passwords and other security settings is the responsibility of the installer and/or end-user.

7.3 Group Management

The client provides groups to manage the added resources in different groups. You can group the resources into different groups according to the resources' locations.

Example

For example, on the 1st floor, there mounted 16 doors, 64 alarm inputs, and 16 alarm outputs. You can organize these resources into one group (named 1st Floor) for convenient management. You can control door status, and do some other operations of the devices after managing the resources by groups.

7.3.1 Add Group

You can add group to organize the added device for convenient management.

Steps

1. Enter the Device Management module.
2. Click **Device Management** → **Group** to enter the group management page.
3. Create a group.
 - Click **Add Group** and enter a group name as you want.
 - Click **Create Group by Device Name** and select an added device to create a new group by the name of the selected device.



Note

The resources (such as alarm inputs/outputs, access points, etc.) of this device will be imported to the group by default.

7.3.2 Import Resources to Group

You can import the device resources (such as alarm inputs/outputs, access points, etc.) to the added group in a batch.

Before You Start

Add a group for managing devices. Refer to **Add Group**.

Steps

1. Enter the Device Management module.
2. Click **Device Management** → **Group** to enter the group management page.
3. Select a group from the group list and select the resource type as **Access Point**, **Alarm Input**, **Alarm Output**, etc.
4. Click **Import**.
5. Select the thumbnails/names of the resources in the thumbnail/list view.



Note

You can click  or  to switch the resource display mode to thumbnail view or to list view.

6. Click **Import** to import the selected resources to the group.

7.3.3 Edit Resource Parameters

After importing the resources to the group, you can edit the resource parameters. For access point, you can edit the access point name. For alarm input, you can edit the alarm input name. Here we take access point as an example.

Before You Start

Import the resources to group.

Steps

1. Enter the Device Management module.
2. Click **Device Management** → **Group** to enter the group management page.
All the added groups are displayed on the left.
3. Select a group on the group list and click **Access Point**.
The access points imported to the group will display.
4. Click  in the Operation column to open the Edit Resource window.
5. Edit the resource name.
6. Click **OK** to save the new settings.

7.3.4 Remove Resources from Group

You can remove the added resources from the group.

Steps

1. Enter the Device Management module.
2. Click **Device Management** → **Group** to enter the group management page.
All the added groups are displayed on the left.
3. Click a group to show the resources added to this group.
4. Select the resource(s) and click **Delete** to remove the resource(s) from the group.

7.4 Person Management

You can add person information to the system for further operations such as access control, video intercom, time and attendance, etc. You can manage the added persons such as issuing cards to them in a batch, importing and exporting person information in a batch, etc.

7.4.1 Add Organization

You can add an organization and import person information to the organization for effective management of the persons. You can also add a subordinate organization for the added one.

Steps

1. Enter **Person** module.
2. Select a parent organization in the left column and click **Add** in the upper-left corner to add an organization.
3. Create a name for the added organization.

Note

Up to 10 levels of organizations can be added.

4. **Optional:** Perform the following operation(s).

Edit Organization

Hover the mouse on an added organization and click  to edit its name.

Delete Organization

Hover the mouse on an added organization and click  to delete it.

Note

- The lower-level organizations will be deleted as well if you delete an organization.
 - Make sure there is no person added under the organization, or the organization cannot be deleted.
-

Show Persons in Sub Organization

Check **Show Persons in Sub Organization** and select an organization to show persons in its sub organizations.

7.4.2 Configure Basic Information

You can add person to the client one by one and configure the person's basic information such as name, gender, email, phone number, etc.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person.
3. Click **Add** to open the adding person window.

The Person ID will be generated automatically.

4. Enter the basic information including person name, gender, telephone number, email address, validity period, etc.

Basic Information

* Person ID HZ000002

* Name

Gender ☒ Male ☐ Female

Email

Tel.

Validity Period (Access Control) 2020-07-16 00:00:00-2030-07-15 23:59:59 **Extend**

Remark

Add Face

Figure 7-2 Configure Basic Information



Note

Once validity period expired, the credentials and access control settings of the person will be invalid and the person will have no authorization to access the doors\floors. You can click **Extend** to extend the person's validity period for 1 month, 3 months, 6 months, or 1 year.

5. Confirm to add the person.
 - Click **Add** to add the person and close the Add Person window.
 - Click **Add and New** to add the person and continue to add other persons.

7.4.3 Issue a Card by Local Mode

If a card enrollment station is available, you can issue a card by local mode. To read the card number, you should connect the card enrollment station to the PC running the client by USB interface or COM, and place the card on the card enrollment station.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add** to enter Add Person panel.



Note

Enter the person's basic information first. For details about configuring person's basic information, refer to **Configure Basic Information**.

3. In the **Credential → Card** area, click +.
4. Click **Settings** to enter the Settings page.
5. Select **Local** as the card issuing mode.

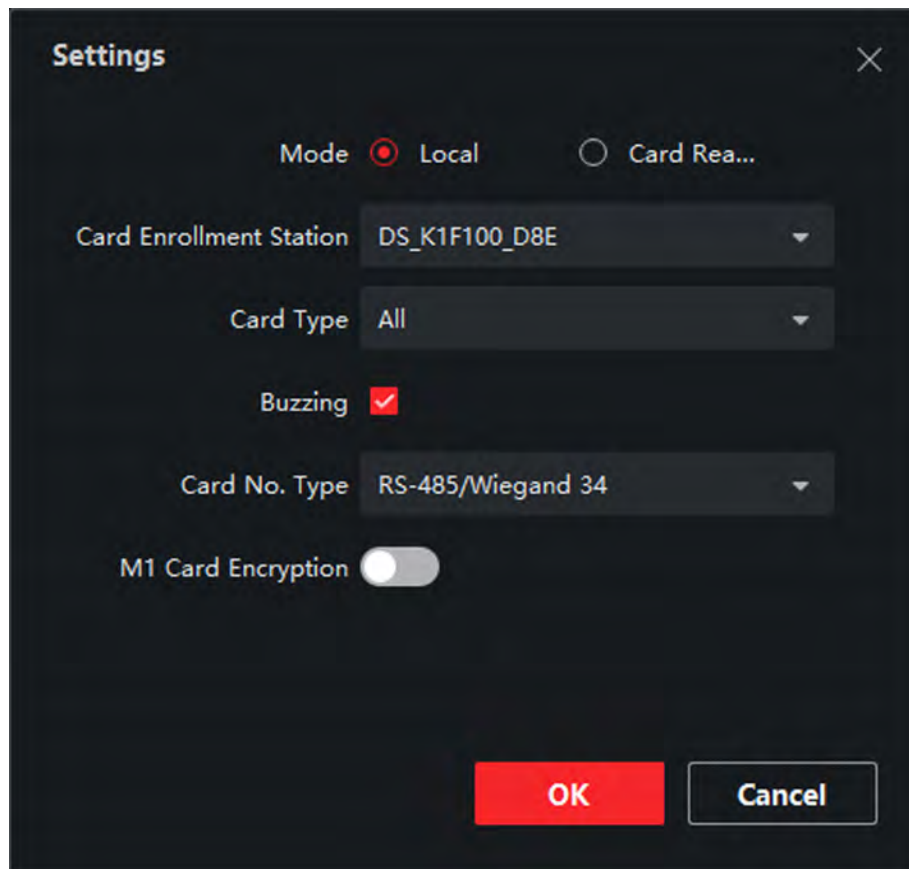


Figure 7-3 Issue a Card by Local Mode

6. Set other related parameters.

Card Enrollment Station

Select the model of the connected card enrollment station.



Note

Currently, the supported card enrollment station models include DS-K1F100-D8, DS-K1F100-M, DS-K1F100-D8E, and DS-K1F180-D8E.

Card Type

This field is only available when the model is DS-K1F100-D8E or DS-K1F180-D8E. Select the card type as EM card or Mifare card according to the actual card type.

Buzzing

Enable or disable the buzzing when the card number is read successfully.

Card No. Type

Select the type of the card number according to actual needs.

M1 Card Encryption

This field is only available when the model is DS-K1F100-D8, DS-K1F100-D8E, or DS-K1F180-D8E. If the card is M1 card, then you can enable the M1 Card Encryption function and select the sector of the card to encrypt.

7. Click **OK** to confirm the operation.
8. Place the card on the card enrollment station, and click **Read** to get the card number.
The card number will display in the Card No. field automatically.
9. Click **Add**.
The card will be issued to the person.

7.4.4 Upload a Face Photo from Local PC

When adding person, you can upload a face photo stored in local PC to the client as the person's profile.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add**.



Note

Enter the person's basic information first. For details about configuring person's basic information, refer to **Configure Basic Information**.

3. Click **Add Face** in the Basic Information panel.
4. Select **Upload**.
5. Select a picture from the PC running the client.



Note

The picture should be in JPG or JPEG format and smaller than 200 KB.

6. **Optional:** Enable **Verify by Device** to check whether the facial recognition device managed in the client can recognize the face in the photo.



Note

This function is hidden or shown according to the device capacity.

7. Confirm to add the person.
 - Click **Add** to add the person and close the Add Person window.
 - Click **Add and New** to add the person and continue to add other persons.

7.4.5 Take a Photo via Client

When adding a person, you can take a photo of the her/him via the client and set this photo as the person's profile.

Before You Start

Make sure PC running the client has a camera or you have connected other USB camera to the PC.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add** to enter Add Person window.

Note

Enter the person's basic information first. For details, refer to ***Configure Basic Information*** .

3. Click **Add Face** in the Basic Information area.
4. Select **Take Photo** to enter Take Photo window.
5. **Optional:** Enable **Verify by Device** to check whether the captured face photo can meet the uploading requirements.

Note

This function is hidden or shown according to the device capacity.

6. Take a photo.
 - 1) Face to the camera and make sure your face is in the middle of the collecting window.
 - 2) Click  to capture a face photo.
 - 3) **Optional:** Click  to capture again.
 - 4) Click **OK** to save the captured photo.

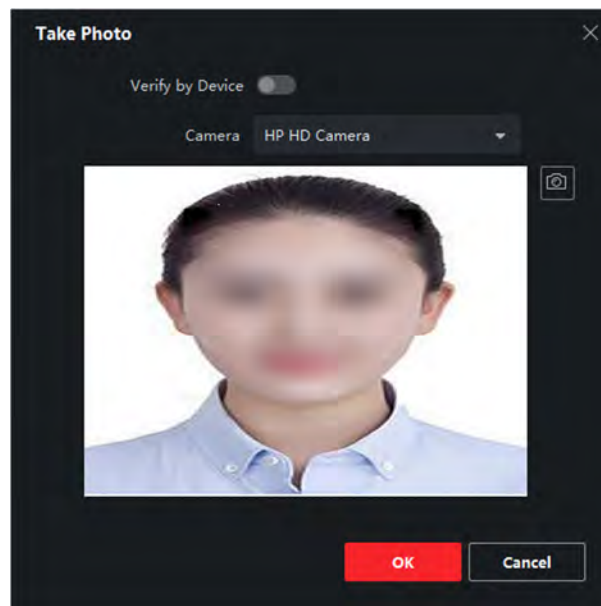


Figure 7-4 Take a Photo via Client

7. Confirm to add the person.
 - Click **Add** to add the person and close the Add Person window.
 - Click **Add and New** to add the person and continue to add other persons.

7.4.6 Collect Face via Access Control Device

When adding person, you can collect the person's face via access control device added to the client which supports facial recognition function.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add**.



Note

Enter the person's basic information first. For details about configuring person's basic information, refer to ***Configure Basic Information*** .

3. Click **Add Face** in the Basic Information panel.
4. Select **Remote Collection**.
5. Select an access control device which supports face recognition function from the drop-down list.
6. Collect face.
 - 1) Face to the camera of the selected access control device and make sure your face is in the middle of the collecting window.
 - 2) Click  to capture a photo.
 - 3) Click **OK** to save the captured photo.
7. Confirm to add the person.
 - Click **Add** to add the person and close the Add Person window.
 - Click **Add and New** to add the person and continue to add other persons .

7.4.7 Collect Fingerprint via Client

Collecting fingerprints locally means you can collect the fingerprint via the fingerprint recorder connected directly to the PC running the client. The fingerprints recorded can be used as credentials of the persons to access the authorized doors.

Before You Start

Connect the fingerprint recorder to the PC running the client.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add**.



Note

Enter the person's basic information first. For details about configuring person's basic information, refer to ***Configure Basic Information*** .

3. In the **Credential → Fingerprint** panel, click +.
4. In the pop-up window, select the collection mode as **Local**.

5. Select the model of the connected fingerprint recorder.



Note

If the fingerprint recorder is DS-K1F800-F, you can click **Settings** to select the COM the fingerprint recorder connects to.

6. Collect the fingerprint.
 - 1) Click **Start**.
 - 2) Place and lift your fingerprint on the fingerprint recorder to collect the fingerprint.
 - 3) Click **Add** to save the recorded fingerprint.
 7. Confirm to add the person.
 - Click **Add** to add the person and close the Add Person window.
 - Click **Add and New** to add the person and continue to add other persons.
-



Note

Once the fingerprint is added, the fingerprint type cannot be changed.

7.4.8 Configure Access Control Information

When adding a person, you can set her/his access control properties, such as setting the person as a visitor or a blacklist person, or as a super user who has super authorization.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add**.
3. In the **Access Control** area, set the person's access control properties.

Access Group

You can select one or more access groups for the person to give him/her the authorization to the selected access points. For details, refer to ***Set Access Group to Assign Access Authorization to Persons***.

Password

The person must enter the password after swiping the card or fingerprint when accessing. It cannot be used independently and should contain 4 to 8 digits.

Super User

If the person is set as a super user, he/she will have authorization to access all the doors/floors and will be exempted from remaining closed restrictions, all anti-passback rules, and first person authorization.

Extended Door Open Time

When the person accessing door, grant this person more time to pass through doors which have been configured with extended open duration. Use this function for the persons with reduced mobility.

For details about setting the door's open duration, refer to ***Configure Parameters for Door*** .

Add to Blacklist

Add the person to the blacklist and when the person tries to access doors/floors, an event will be triggered and send to the client to notify the security personnel.

Mark as Visitor

If the person is a visitor, set the maximum times of authentications, including access by card and fingerprint to limit the visitor's access times.



Note

The maximum times of authentications should be between 1 and 100.

Device Operator

For person with device operator role, he/she is authorized to operate on the access control devices.



Note

The Super User, Extended Door Open Time, Add to Blacklist, and Mark as Visitor functions cannot be enabled concurrently. For example, if one person is set as super user, you cannot enable extended door open time for her/him, add her/him to the blacklist, or set her/him as visitor.

4. Confirm to add the person.

- Click **Add** to add the person and close the Add Person window.
- Click **Add and New** to add the person and continue to add other persons.

7.4.9 Customize Person Information

You can customize the person properties which are not pre-defined in the client according to actual needs, e.g., place of birth. After customizing, when add a person, you can enter the custom information to make the person information complete.

Steps

1. Enter **Person** module.
2. Set the fields of custom information.
 - 1) Click **Custom Property**.
 - 2) Click **Add** to add a new property.
 - 3) Enter the property name.
 - 4) Click **OK**.
3. Set the custom information when adding a person.
 - 1) Select an organization in the organization list to add the person and click **Add**.



Note

Enter the person's basic information first. For details about configuring person's basic information, refer to ***Configure Basic Information***.

- 2) In the **Custom Information** panel, enter the person information.
- 3) Click **Add** to add the person and close the Add Person window, or click **Add and New** to add the person and continue to add other persons.

7.4.10 Configure Resident Information

If the person is resident, for video intercom purpose, you need to set the room number for her/him and bind an indoor station. After bound, you can call this person by calling the indoor station and perform video intercom with her/him.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add**.



Note

Enter the person's basic information first. For details about configuring person's basic information, refer to ***Configure Basic Information***.

3. In the **Resident Information** panel, select the indoor station to bind it to the person.



Note

If you select **Analog Indoor Station**, the **Door Station** field will display and you are required to select the door station to communicate with the analog indoor station.

4. Enter the floor No. and room No. of the person.
5. Confirm to add the person.
 - Click **Add** to add the person and close the Add Person window.
 - Click **Add and New** to add the person and continue to add other persons.

7.4.11 Configure Additional Information

When adding person, you can configure the additional information for the person, such as person's identity type, identity No., country, etc., according to actual needs.

Steps

1. Enter **Person** module.
2. Select an organization in the organization list to add the person and click **Add**.



Note

Enter the person's basic information first. For details about configuring person's basic information, refer to ***Configure Basic Information*** .

3. In the **Additional Information** panel, enter the additional information of the person, including person's ID type, ID No., job title, etc., according to actual needs.
4. Confirm to add the person.
 - Click **Add** to add the person and close the Add Person window.
 - Click **Add and New** to add the person and continue to add other persons .

7.4.12 Import and Export Person Identify Information

You can import the information and pictures of multiple persons to the client software in a batch. Meanwhile, you can also export the person information and pictures and save them in your PC.

7.4.13 Import Person Information

You can enter the information of multiple persons in a predefined template (a CSV file) to import the information to the client in a batch.

Steps

1. Enter the Person module.
 2. Select an added organization in the list, or click **Add** in the upper-left corner to add an organization and then select it.
 3. Click **Import** to open the Import panel.
 4. Select **Person Information** as the importing mode.
 5. Click **Download Template for Importing Person** to download the template.
 6. Enter the person information in the downloaded template.
-



Note

- If the person has multiple cards, separate the card No. with semicolon.
 - Items with asterisk are required.
 - By default, the Hire Date is the current date.
-

7. Click  to select the CSV file with person information.
 8. Click **Import** to start importing.
-



Note

- If a person No. already exists in the client's database, delete the existing information before importing.
 - You can import information of no more than 10,000 persons.
-

7.4.14 Import Person Pictures

After importing face pictures for the added persons to the client, the persons in the pictures can be identified by an added face recognition terminal. You can either import person pictures one by one, or import multiple pictures at a time according to your need.

Before You Start

Be sure to have imported person information to the client beforehand.

Steps

1. Enter the Person module.
2. Select an added organization in the list, or click **Add** in the upper-left corner to add an organization and then select it.
3. Click **Import** to open the Import panel and check **Face**.
4. **Optional:** Enable **Verify by Device** to check whether face recognition device managed in the client can recognize the face in the photo.
5. Click  to select a face picture file.



Note

- The (folder of) face pictures should be in ZIP format.
 - Each picture file should be in JPG format and should be no larger than 200 KB.
 - Each picture file should be named as "Person ID_Name". The Person ID should be the same with that of the imported person information.
-

6. Click **Import** to start importing.
The importing progress and result will be displayed.

7.4.15 Export Person Information

You can export the added persons' information to local PC as a CSV file.

Before You Start

Make sure you have added persons to an organization.

Steps

1. Enter the Person module.
2. **Optional:** Select an organization in the list.



Note

All persons' information will be exported if you do not select any organization.

3. Click **Export** to open the Export panel and check **Person Information** as the content to export.
4. Check desired items to export.
5. Click **Export** to save the exported CSV file in your PC.

7.4.16 Export Person Pictures

You can export face picture file of the added persons and save in your PC.

Before You Start

Make sure you have added persons and their face pictures to an organization.

Steps

1. Enter the Person module.
2. **Optional:** Select an organization in the list.



Note

All persons' face pictures will be exported if you do not select any organization.

3. Click **Export** to open the Export panel and check **Face** as the content to export.
4. Click **Export** to start exporting.



Note

- The exported file is in ZIP format.
 - The exported face picture is named as "Person ID_Name_0" ("0" is for a full-frontal face).
-

7.4.17 Get Person Information from Access Control Device

If the added access control device has been configured with person information (including person details, fingerprint, and issued card information), you can get the person information from the device and import them to the client for further operations.

Steps



Note

- If the person name stored in the device is empty, the person name will be filled with the issued card No. after importing to the client.
 - The gender of the persons will be **Male** by default.
 - If the card number or person ID (employee ID) stored on the device already exists in the client database, the person with this card number or person ID will not be imported to the client.
-

1. Enter **Person** module.
2. Select an organization to import the persons.
3. Click **Get from Device**.
4. Select the access control device from the drop-down list.
5. Click **Get** to start importing the person information to the client.

The person information, including person details, person's fingerprint information (if configured), and the linked cards (if configured), will be imported to the selected organization.

7.4.18 Move Persons to Another Organization

You can move the added persons to another organization if you need.

Before You Start

- Make sure you have added at least two organizations.
- Make sure you have imported person information.

Steps

1. Enter **Person** module.
2. Select an organization in the left panel.

The persons under the organization will be displayed in the right panel.

3. Select the person to move.
4. Click **Change Organization**.
5. Select the organization to move persons to.
6. Click **OK**.

7.4.19 Issue Cards to Persons in Batch

The client provides a convenient way to issue cards to multiple persons in a batch.

Steps

1. Enter **Person** module.
2. Click **Batch Issue Cards**.

All the added persons with no card issued will be displayed in the right panel.

3. **Optional:** Enter key words (name or person ID) in the input box to filter the person(s) that need issuing cards.
4. **Optional:** Click **Settings** to set the card issuing parameters. For details, refer to .
5. Click **Initialize** to initialize the card enrollment station or card reader to make it ready for issuing cards.
6. Click the **Card No.** column and enter the card number.
 - Place the card on the card enrollment station.
 - Swipe the card on the card reader.
 - Manually enter the card number and press the **Enter** key.

The person(s) in the list will be issued with card(s).

7.4.20 Report Card Loss

If the person lost his/her card, you can report the card loss so that the card's related access authorization will be inactive.

Steps

1. Enter **Person** module.

2. Select the person you want to report card loss for and click **Edit** to open the Edit Person window.
3. In the **Credential** → **Card** panel, click  on the added card to set this card as lost card.
After reporting card loss, the access authorization of this card will be invalid and inactive. Other person who gets this card cannot access the doors by swiping this lost card.
4. **Optional:** If the lost card is found, you can click  to cancel the loss.
After cancelling card loss, the access authorization of the person will be valid and active.
5. If the lost card is added in one access group and the access group is applied to the device already, after reporting card loss or cancelling card loss, a window will pop up to notify you to apply the changes to the device. After applying to device, these changes can take effect on the device.

7.4.21 Set Card Issuing Parameters

The client provides two modes for reading a card's number: via card enrollment station or via the card reader of the access control device. If a card enrollment station is available, connect it to the PC running the client by USB interface or COM, and place the card on the card enrollment to read the card number. If not, you can also swipe the card on the card reader of the added access control device to get the card number. As a result, before issuing a card to one person, you need to set the card issuing parameters including the issuing mode and related parameters.

When adding a card to one person, click **Settings** to open the Card Issuing Settings window.

Local Mode: Issue Card by Card Enrollment Station

Connect a card enrollment station to the PC running the client. You can place the card on the card enrollment station to get the card number.

Card Enrollment Station

Select the model of the connected card enrollment station



Note

Currently, the supported card enrollment station models include DS-K1F100-D8, DS-K1F100-M, DS-K1F100-D8E, and DS-K1F180-D8E.

Card Type

This field is only available when the model is DS-K1F100-D8E or DS-K1F180-D8E.

Select the card type as EM card or IC card according to the actual card type.

Serial Port

It is only available when the model is DS-K1F100-M.

Select the COM the card enrollment station connects to.

Buzzing

Enable or disable the buzzing when the card number is read successfully.

Card No. Type

Select the type of the card number according to actual needs.

M1 Card Encryption

This field is only available when the model is DS-K1F100-D8, DS-K1F100-D8E, or DS-K1F180-D8E.

If the card is M1 card, and if you need to enable the M1 Card Encryption function, you should enable this function and select the sector of the card to encrypt.

Remote Mode: Issue Card by Card Reader

Select an access control device added in the client and swipe the card on its card reader to read the card number.

7.5 Configure Schedule and Template

You can configure the template including holiday and week schedule. After setting the template, you can adopt the configured template to access groups when setting the access groups, so that the access group will take effect in the time durations of the template.



Note

For access group settings, refer to ***Set Access Group to Assign Access Authorization to Persons*** .

7.5.1 Add Holiday

You can create holidays and set the days in the holidays, including start date, end date, and holiday duration in one day.

Steps



Note

You can add up to 64 holidays in the software system.

1. Click **Access Control** → **Schedule** → **Holiday** to enter the Holiday page.
 2. Click **Add** on the left panel.
 3. Create a name for the holiday.
 4. **Optional:** Enter the descriptions or some notifications of this holiday in the Remark box.
 5. Add a holiday period to the holiday list and configure the holiday duration.
-



Note

Up to 16 holiday periods can be added to one holiday.

- 1) Click **Add** in the Holiday List field.
- 2) Drag the cursor to draw the time duration, which means in that duration of time, the configured access group is activated.

Note

Up to 8 time durations can be set to one holiday period.

3) **Optional:** Perform the following operations to edit the time durations.

- Move the cursor to the time duration and drag the time duration on the timeline bar to the desired position when the cursor turns to .
- Click the time duration and directly edit the start/end time in the appeared dialog.
- Move the cursor to the start or the end of time duration and drag to lengthen or shorten the time duration when the cursor turns to .

4) **Optional:** Select the time duration(s) that need to be deleted, and then click  in the Operation column to delete the selected time duration(s).

5) **Optional:** Click  in the Operation column to clear all the time duration(s) in the time bar.

6) **Optional:** Click  in the Operation column to delete this added holiday period from the holiday list.

6. Click **Save**.

7.5.2 Add Template

Template includes week schedule and holiday. You can set week schedule and assign the time duration of access authorization for different person or group. You can also select the added holiday(s) for the template.

Steps

Note

You can add up to 255 templates in the software system.

1. Click **Access Control → Schedule → Template** to enter the Template page.

Note

There are two default templates: All-Day Authorized and All-Day Denied, and they cannot be edited or deleted.

All-Day Authorized

The access authorization is valid in each day of the week and it has no holiday.

All-Day Denied

The access authorization is invalid in each day of the week and it has no holiday.

2. Click **Add** on the left panel to create a new template.

3. Create a name for the template.

4. Enter the descriptions or some notification of this template in the Remark box.

5. Edit the week schedule to apply it to the template.

1) Click **Week Schedule** tab on the lower panel.

2) Select a day of the week and draw time duration(s) on the timeline bar.



Note

Up to 8 time duration(s) can be set for each day in the week schedule.

3) **Optional:** Perform the following operations to edit the time durations.

- Move the cursor to the time duration and drag the time duration on the timeline bar to the desired position when the cursor turns to .
- Click the time duration and directly edit the start/end time in the appeared dialog.
- Move the cursor to the start or the end of time duration and drag to lengthen or shorten the time duration when the cursor turns to .

4) Repeat the two steps above to draw more time durations on the other days of the week.

6. Add a holiday to apply it to the template.



Note

Up to 4 holidays can be added to one template.

1) Click **Holiday** tab.

2) Select a holiday in the left list and it will be added to the selected list on the right panel.

3) **Optional:** Click **Add** to add a new holiday.



Note

For details about adding a holiday, refer to **Add Holiday**.

4) **Optional:** Select a selected holiday in the right list and click  to remove the selected one, or click **Clear** to clear all the selected holiday(s) in the right list.

7. Click **Save** to save the settings and finish adding the template.

7.6 Set Access Group to Assign Access Authorization to Persons

After adding the person and configuring the person's credentials, you can create the access groups to define which person(s) can get access to which door(s) and then apply the access group to the access control device to take effect.

Before You Start

- Add person to the client.
- Add access control device to the client and group access points. For details, refer to **Group Management**.
- Add template.

Steps

When the access group settings are changed, you need to apply the access groups to the devices again to take effect. The access group changes include changes of template, access group settings, person's access group settings, and related person details (including card number, fingerprint, face picture, linkage between card number and fingerprint, linkage between card number and fingerprint, card password, card effective period, etc).

1. Click **Access Control** → **Authorization** → **Access Group** to enter the Access Group interface.

2. Click **Add** to open the Add window.
3. In the **Name** text field, create a name for the access group as you want.
4. Select a template for the access group.



Note

You should configure the template before access group settings. Refer to **Configure Schedule and Template** for details.

5. In the left list of the Select Person field, select person(s) to assign access authority.
6. In the left list of the Select Access Point field, select door(s), door station(s) or floor(s) for the selected persons to access.
7. Click **Save**.

You can view the selected person(s) and the selected access point(s) on the right side of the interface.

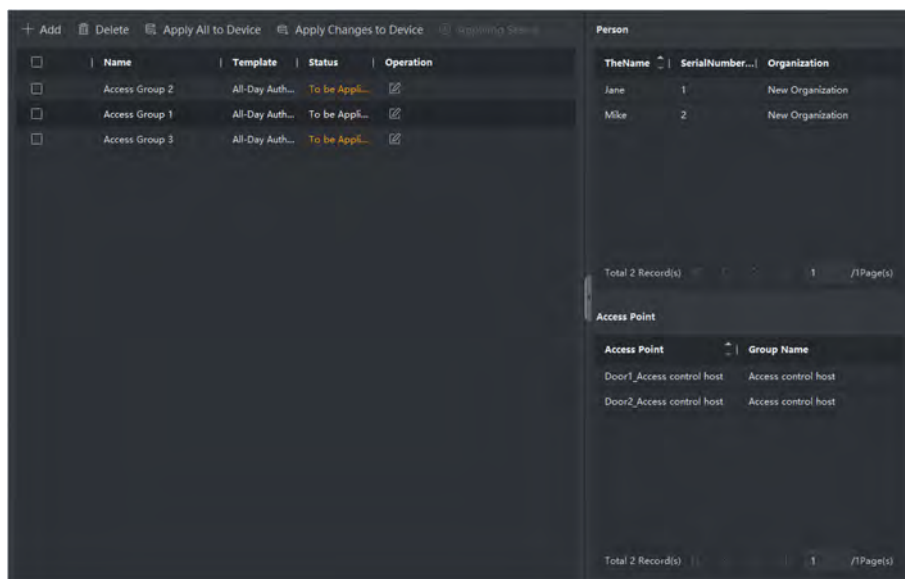


Figure 7-5 Display the Selected Person(s) and Access Point(s)

8. After adding the access groups, you need to apply them to the access control device to take effect.
 - 1) Select the access group(s) to apply to the access control device.
 - 2) Click **Apply All to Devices** start applying all the selected access group(s) to the access control device or door station.
 - 3) Click **Apply All to Devices** or **Apply Changes to Devices**.

Apply All to Devices

This operation will clear all the existed access groups of the selected devices and then apply the new access group to the device.

Apply Changes to Devices

This operation will not clear the existed access groups of the selected devices and only apply the changed part of the selected access group(s) to the device(s).

- 4) View the applying status in the Status column or click **Applying Status** to view all the applied access group(s).

 Note

You can check **Display Failure Only** to filter the applying results.

The selected persons in the applied access groups will have the authorization to enter/exit the selected doors/door stations with their linked card(s) or fingerprints.

9. **Optional:** Click  to edit the access group if necessary.

 Note

If you change the persons' access information or other related information, you will view the prompt **Access Group to Be Applied** on the right corner of the client.

You can click the prompt to apply the changed data to the device. You can select either **Apply Now** or **Apply Later**.

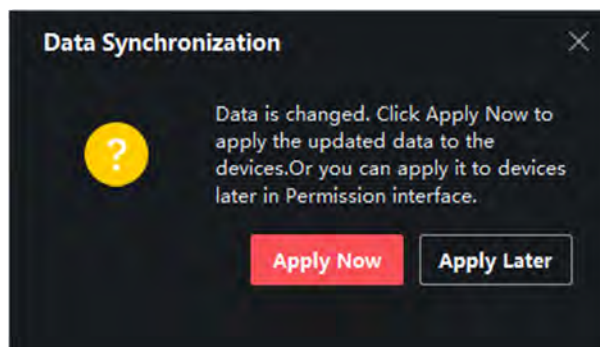


Figure 7-7 Data Synchronization

7.7 Configure Advanced Functions

You can configure the advanced functions of access control to meet some special requirements in different scene.

 Note

- For the card related functions(the type of access control card), only the card(s) with access group applied will be listed when adding cards.
 - The advanced functions should be supported by the device.
 - Hover the cursor on the Advanced Function, and then Click  to customize the advanced function(s) to be displayed.
-

7.7.1 Configure Device Parameters

After adding the access control device, you can configure the parameters of access control device (access controller), access control points (door or floor), alarm inputs, alarm outputs, card readers and lane controller.

Configure Parameters for Access Control Device

After adding the access control device, you can configure its parameters.

Steps

1. Click **Access Control** → **Advanced Function** → **Device Parameter** .



Note

If you can find Device Parameter in the Advanced Function list, Hover the cursor on the Advanced Function, and then Click  to select the Device Parameter to be displayed.

2. Select an access device to show its parameters on the right page.
3. Turn the switch to ON to enable the corresponding functions.



Note

- The displayed parameters may vary for different access control devices.
- Some of the following parameters are not listed in the Basic Information page, click **More** to edit the parameters.

RS-485 Comm. Redundancy

You should enable this function if you wire the RS-485 card reader to the access control device redundantly.

Enable NFC Card

If enable the function, the device can recognize the NFC card. You can present NFC card on the device.

Enable M1 Card

If enable the function, the device can recognize the M1 card. You can present M1 card on the device.

Enable EM Card

If enable the function, the device can recognize the EM card. You can present EM card on the device.

Enable CPU Card

Reserved. If enable the function, the device can recognize the CPU card. You can present CPU card on the device.

Enable ID Card

Reserved. If enable the function, the device can recognize the ID card. You can present ID card on the device.

4. Click **OK**.
5. **Optional:** Click **Copy to**, and then select the access control device(s) to copy the parameters in the page to the selected device(s).

Configure Parameters for Door

After adding the access control device, you can configure its access point door parameters.

Steps

1. Click **Access Control → Advanced Function → Device Parameter**.
2. Select an access control device on the left panel, and then click  to show the doors or floors of the selected device.
3. Select a door or floor to show its parameters on the right page.
4. Edit the door or floor parameters.



Note

- The displayed parameters may vary for different access control devices.
 - Some of the following parameters are not listed in the Basic Information page, click **More** to edit the parameters.
-

Name

Edit the card reader name as desired.

Exit Button Type

You can set the exit button as remaining closed or remaining open. Usually, it is remaining open.

Door Locked Time

After swiping the normal card and relay action, the timer for locking the door starts working.

Door Left Open Timeout Alarm

The alarm can be triggered if the door has not been closed in a configured time period. If it is set as 0, no alarm will be triggered.

Duress Code

The door can open by inputting the duress code when there is duress. At the same time, the client can report the duress event.

Super Password

The specific person can open the door by inputting the super password.

Dismiss Code

Create a dismiss code which can be used to stop the buzzer of the card reader (by entering the dismiss code on the keypad).



Note

- The duress code, super code, and dismiss code should be different.
 - The duress code, super password, and the dismiss code should be different from the authentication password.
 - The length of duress code, super password, and the dismiss code is according the device, usually it should contains 4 to 8 digits.
-

5. Click **OK**.

6. **Optional:** Click **Copy to** , and then select the door(s) to copy the parameters in the page to the selected doors(s).



Note

The door's status duration settings will be copied to the selected door(s) as well.

Configure Parameters for Card Reader

After adding the access control device, you can configure its card reader parameters.

Steps

1. Click **Access Control** → **Advanced Function** → **Device Parameter** .
 2. In the device list on the left, click  to expand the door, select a card reader and you can edit the card reader's parameters on the right.
 3. Edit the card reader basic parameters in the Basic Information page.
-



Note

The displayed parameters may vary for different access control devices. There are part of parameters listed as follows. Refer to the user manual of the device for more details.

Name

Edit the card reader name as desired.

Minimum Card Swiping Interval

If the interval between card swiping of the same card is less than the set value, the card swiping is invalid. You can set it as 0 to 255.

Alarm of Max. Failed Attempts

Enable to report alarm when the card reading attempts reach the set value.

Card Reader Type/Card Reader Description

Get card reader type and description. They are read-only.

4. **Optional:** Some of the following parameters are not listed in the Basic Information page, click **More** to edit the parameters.

Enable Card Reader

If enabling the function, user can present card on the card reader. If disabling the function, the card reader for entrance cannot be used.

OK LED Polarity/Error LED Polarity/Buzzer Polarity

Set OK LED Polarity/Error LED Polarity/Buzzer LED Polarity of main board according to the card reader parameters. Generally, adopts the default settings.

Buzzing Time

Set the card reader buzzing time. The available time ranges from 0 to 5,999s. 0 represents continuous buzzing.

Max. Interval When Entering PWD

When you inputting the password on the card reader, if the interval between pressing two digits is larger than the set value, the digits you pressed before will be cleared automatically.

Tampering Detection

Enable the anti-tamper detection for the card reader.

Communicate with Controller Every

When the access control device cannot connect with the card reader for longer than the set time, the card reader will turn offline automatically.

Fingerprint Recognition Level

Select the fingerprint recognition level in the drop-down list.

5. Click **OK**.

6. **Optional:** Click **Copy to**, and then select the card reader(s) to copy the parameters in the page to the selected card reader(s).

Configure Parameters for Alarm Output

After adding the access control device, if the device links to alarm outputs, you can configure the parameters.

Before You Start

Add access control device to the client, and make sure the device supports alarm output.

Steps

1. Click **Access Control** → **Advanced Function** → **Device Parameter** to enter access control parameter configuration page.
2. In the device list on the left, click  to expand the door, select an alarm input and you can edit the alarm input's parameters on the right.
3. Set the alarm output parameters.

Name

Edit the card reader name as desired.

Alarm Output Active Time

How long the alarm output will last after triggered.

4. Click **OK**.
5. **Optional:** Set the switch on the upper right corner to **ON** to trigger the alarm output.

Configure Parameters for Lane Controller

After adding the lane controller to the client, you can configure its parameters for passing through the lane.

Steps

1. Click **Access Control** → **Advanced Function** → **Device Parameter** to enter Parameter Settings page.
2. In the device list on the left, select a lane controller and you can edit the lane controller's parameters on the right.
3. Edit the parameters.

Passing Mode

Select the controller which will control the barrier status of the device.

- If you select **According to DIP Settings**, the device will follow the device's DIP settings to control the barrier. The settings on the software will be invalid.
- If you select **According to Door's Schedule Settings**, the device will follow the schedule settings of the software to control the barrier. The DIP settings of the device will be invalid.

Audible Prompt Duration

Set how long the audio will last, which is played when an alarm is triggered .



Note

0 refers to the alarm audio will be played until the alarm is ended.

Temperature Unit

Select the temperature unit that displayed in the device status.

Lightboard Brightness

Set the strip light brightness.

4. Click **OK**.

7.7.2 Configure Remaining Open/Closed

You can set the status of the door as open or closed. For example, you can set the door remaining closed in the holiday, and set the door remaining open in the specified period of the work day.

Before You Start

Add the access control devices to the system.

Steps

1. Click **Access Control** → **Advanced Function** → **Remain Open/Closed** to enter the Remain Open/Closed page.
2. Select the door that need to be configured on the left panel.
3. To set the door status during the work day, click the **Week Schedule** and perform the following operations.
 - 1) Click **Remain Open** or **Remain Closed**.
 - 2) Drag the cursor to draw the time duration, which means in that duration of time, the configured access group is activated.



Note

Up to 8 time durations can be set to each day in the week schedule.

- 3) **Optional:** Perform the following operations to edit the time durations.
 - Move the cursor to the time duration and drag the time duration on the timeline bar to the desired position when the cursor turns to .
 - Click the time duration and directly edit the start/end time in the appeared dialog.
 - Move the cursor to the start or the end of time duration and drag to lengthen or shorten the time duration when the cursor turns to .
- 4) Click **Save**.

Related Operations

- | | |
|---------------------------|---|
| Copy to Whole Week | Select one duration on the time bar, click Copy to Whole Week to copy all the duration settings on this time bar to other week days. |
| Delete Selected | Select one duration on the time bar, click Delete Selected to delete this duration. |
| Clear | Click Clear to clear all the duration settings in the week schedule. |

4. To set the door status during the holiday, click the **Holiday** and perform the following operations.
 - 1) Click **Remain Open** or **Remain Closed**.
 - 2) Click **Add**.
 - 3) Enter the start date and end date.
 - 4) Drag the cursor to draw the time duration, which means in that duration of time, the configured access group is activated.



Note

Up to 8 time durations can be set to one holiday period.

- 5) Perform the following operations to edit the time durations.
 - Move the cursor to the time duration and drag the time duration on the timeline bar to the desired position when the cursor turns to .
 - Click the time duration and directly edit the start/end time in the appeared dialog.
 - Move the cursor to the start or the end of time duration and drag to lengthen or shorten the time duration when the cursor turns to .

- 6) **Optional:** Select the time duration(s) that need to be deleted, and then click  in the Operation column to delete the selected time duration(s).
 - 7) **Optional:** Click  in the Operation column to clear all the time duration(s) in the time bar.
 - 8) **Optional:** Click  in the Operation column to delete this added holiday period from the holiday list.
 - 9) Click **Save**.
5. **Optional:** Click **Copy to** to copy the door status settings of this door to other door(s).

7.7.3 Configure Multi-Factor Authentication

You can manage the persons by group and set the authentication for multiple persons of one access control point (door).

Before You Start

Set access group and apply the access group to the access control device. For details, refer to **Set Access Group to Assign Access Authorization to Persons**.

Perform this task when you want to set authentications for multiple cards of one access control point (door).

Steps

1. Click **Access Control → Advanced Function → Multi-Factor Auth**.
2. Select an access control device in device list on the left panel.
3. Add a person/card group for the access control device.
 - 1) Click **Add** on the right panel.
 - 2) Create a name for the group as desired.
 - 3) Specify the start time and end time of the effective period for the person/card group.
 - 4) Select members(s) and card(s) in the Available list, and the selected member(s) and card(s) will be added to the Selected list.



Note

Make sure you have issue card to the person.

Make sure you have set access group and apply the access group to the access control device successfully.

-
- 5) Click **Save**.
 - 6) **Optional:** Select the person/card group(s), and then click **Delete** to delete it(them).
 - 7) **Optional:** Select the person/card group(s), and then click **Apply** to re-apply access group that failed to be applied previously to the access control device.
4. Select an access control point (door) of selected device on the left panel.
5. Enter the maximum interval when entering password.
6. Add an authentication group for the selected access control point.
- 1) Click **Add** on the Authentication Groups panel.
 - 2) Select a configured template as the authentication template from the drop-down list.

Note

For setting the template, refer to ***Configure Schedule and Template***.

- 3) Select the authentication type as **Local Authentication**, **Local Authentication and Remotely Open Door**, or **Local Authentication and Super Password** from the drop-down list.

Local Authentication

Authentication by the access control device.

Local Authentication and Remotely Open Door

Authentication by the access control device and by the client. When the person swipes the card on the device, a window will pop up. You can unlock the door via the client.

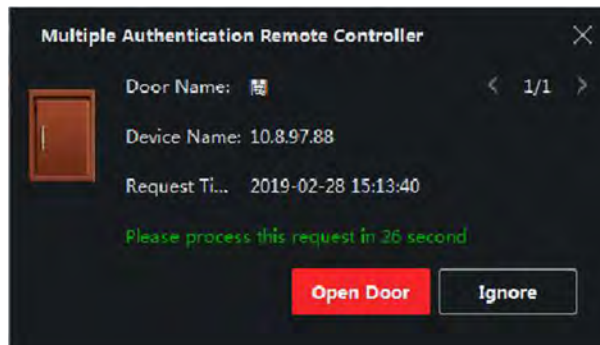


Figure 7-8 Remotely Open Door

Note

You can check **Offline Authentication** to enable the super password authentication when the access control device is disconnected with the client.

Local Authentication and Super Password

Authentication by the access control device and by the super password.

- 4) Select the added person/card group in the left list below and it will be added to the Selected list on the right as the authentication group.
- 5) Click the added authentication group in the right list to set authentication times in the Auth Times column.

Note

- The authentication times should be larger than 0 and smaller than the added personnel quantity in the personnel group.
- The maximum value of authentication times is 16.

- 6) Click **Save**.



Note

- For each access control point (door), up to four authentication groups can be added.
 - For the authentication group of which authentication type is **Local Authentication**, up to 8 person/card groups can be added to the authentication group.
 - For the authentication group of which authentication type is **Local Authentication and Super Password** or **Local Authentication and Remotely Open Door**, up to 7 person/card groups can be added to the authentication group.
-

7. Click **Save**.

7.7.4 Configure Custom Wiegand Rule

Based on the knowledge of uploading rule for the third party Wiegand, you can set multiple customized Wiegand rules to communicate between the device and the third party card readers.

Before You Start

Wire the third party card readers to the device.

Steps



Note

- By default, the device disables the custom wiegand function. If the device enables the custom Wiegand function, all wiegand interfaces in the device will use the customized wiegand protocol.
 - Up to 5 custom Wiegands can be set.
 - For details about the custom Wiegand, see Custom Wiegand Rule Descriptions.
-

1. Click **Access Control** → **Advanced Function** → **Custom Wiegand** to enter the Custom Wiegand page.
 2. Select a custom Wiegand on the left.
 3. Create a Wiegand name.
-



Note

Up to 32 characters are allowed in the custom Wiegand name.

4. Click **Select Device** to select the access control device for setting the custom wiegand.
 5. Set the parity mode according to the property of the third party card reader.
-



Note

- Up to 80 bits are allowed in the total length.
 - The odd parity start bit, the odd parity length, the even parity start bit and the even parity length range from 1 to 80 bit.
 - The start bit of the card ID, the manufacturer code, the site code, and the OEM should range from 1 to 80 bit.
-

6. Set output transformation rule.

- 1) Click **Set Rule** to open the Set Output Transformation Rules window.

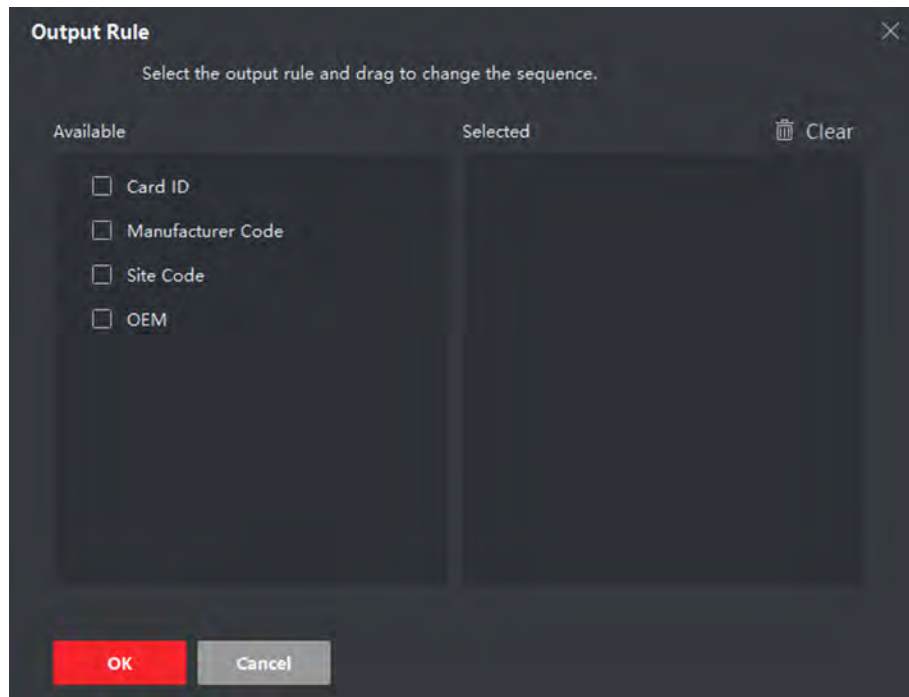


Figure 7-9 Set Output Transformation Rule

- 2) Select rules on the left list.

The selected rules will be added to the right list.

- 3) **Optional:** Drag the rules to change the rule order.

- 4) Click **OK**.

- 5) In the Custom Wiegand tab, set the rule's start bit, length, and the decimal digit.

7. Click **Save**.

7.7.5 Configure Card Reader Authentication Mode and Schedule

You can set the passing rules for the card reader of the access control device according to your actual needs.

Steps

1. Click **Access Control** → **Advanced Function** → **Authentication** to enter the authentication mode configuration page.
2. Select a card reader on the left to configure.
3. Set card reader authentication mode.
 - 1) Click **Configuration**.

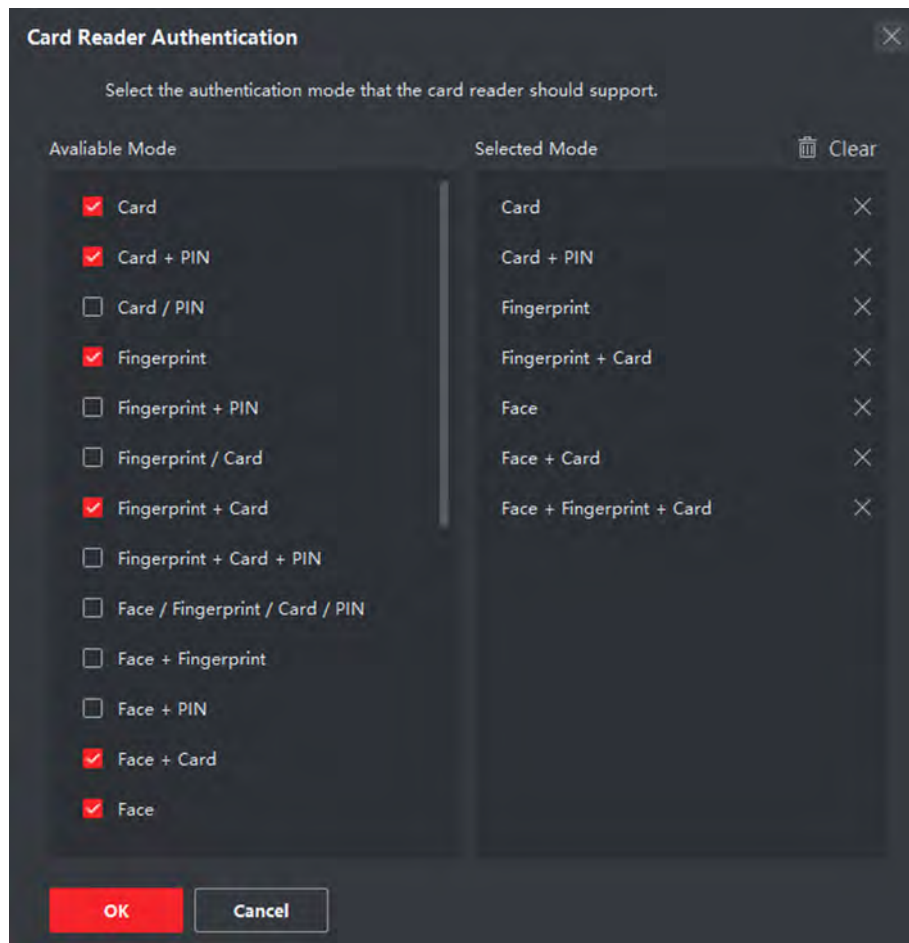


Figure 7-10 Select Card Reader Authentication Mode

 Note

PIN refers to the PIN code set to open the door. Refer to ***Configure Access Control Information***.

- 2) Check the modes in the Available Mode list and they will be added to the selected modes list.
- 3) Click **OK**.

After selecting the modes, the selected modes will display as icons with different color.

4. Click the icon to select a card reader authentication mode, and drag the cursor to draw a color bar on the schedule, which means in that period of time, the card reader authentication is valid.
5. Repeat the above step to set other time periods.

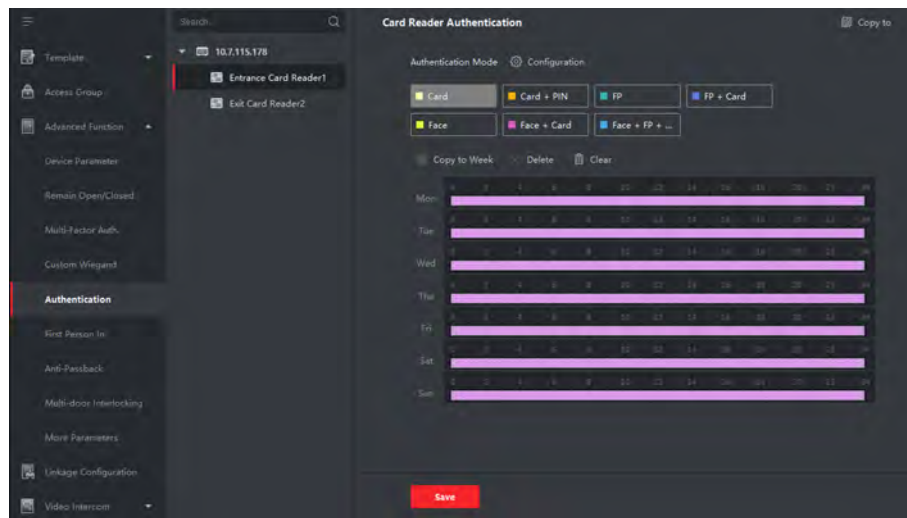


Figure 7-11 Set Authentication Modes for Card Readers

6. **Optional:** Select a configured day and click **Copy to Week** to copy the same settings to the whole week.
7. **Optional:** Click **Copy to** to copy the settings to other card readers.
8. Click **Save**.

7.7.6 Configure First Person In

You can set multiple first persons for one access control point. After the first person is authorized, it allows multiple persons access the door or other authentication actions.

Before You Start

- Add access control device to the client, and make sure the device supports the first person in function.
- Add person and assign access authorization to designed person. For details, refer to **Person Management** and **Set Access Group to Assign Access Authorization to Persons**.

Steps

1. Click **Access Control** → **Advanced Function** → **First Person In** to enter the First Person In page.
2. Select an access control device in the list on the left panel.
3. Select the current mode as **Enable Remaining Open after First Person**, **Disable Remaining Open after First Person**, or **Authorization by First Person** from the drop-down list for each access control point of the selected device.

Enable Remaining Open after First Person

The door remains open for the configured time duration after the first person is authorized until the remain open duration ends. If you select this mode, you should set the remain open duration.



The remain open duration should be between 0 and 1440 minutes. By default, the remain open duration is 10 minutes.

Disable Remaining Open after First Person

Disable the function of first person in, namely normal authentication.

Authorization by First Person

All authentications (except for the authentications of super card, super password, duress card, and duress code) are allowed only after the first person authorization.



You can authenticate by the first person again to disable the first person mode.

4. Click **Add** on the First Person List panel.
5. Select person(s) in the left list and the person(s) will be add to the selected persons as the first person(s) of the doors.
The added first person(s) will list in the First Person List
6. **Optional:** Select a first person from the list and click **Delete** to remove the person from the first person list.
7. Click **Save**.

7.7.7 Configure Anti-Passback

You can set to only pass the access control point according to the specified path and only one person could pass the access control point after swiping the card.

Before You Start

Enable the anti-passing back function of the access control device.

Perform this task when you want to configure the anti-passing back for the access control device.

Steps



Either the anti-passing back or multi-door interlocking function can be configured for an access control device at the same time. For the configuration of multi-door interlocking, refer to .

1. Click **Access Control** → **Advanced Function** → **Anti-Passback** to enter the Anti-Passpack Settings page.
2. Select an access control device on the left panel.
3. Select a card reader as the beginning of the path in the **First Card Reader** field.
4. Click  of the selected first card reader in the **Card Reader Afterward** column to open the select card reader dialog.
5. Select the afterward card readers for the first card reader.



Note

Up to four afterward card readers can be added as afterward card readers for one card reader.

6. Click **OK** in the dialog to save the selections.
7. Click **Save** in the Anti-Passback Settings page to save the settings and take effect.

Example

Set Card Swiping Path

If you select Reader In_01 as the beginning, and select Reader In_02, Reader Out_04 as the linked card readers. Then you can only get through the access control point by swiping the card in the order as Reader In_01, Reader In_02 and Reader Out_04.

7.7.8 Configure Device Parameters

After adding the access control device, you can set its parameters such as network parameters.

Set RS-485 Parameters

You can set the access control device's RS-485 parameters including the baud rate, data bit, the stop bit, parity type, flow control type, communication mode, work mode, and connection mode.

Steps



Note

The RS-485 Settings should be supported by the device.

1. Enter the Access Control module.
2. On the navigation bar on the left, enter **Advanced Function → More Parameters**.
3. Select an access control device in the device list and click **RS-485** to enter the RS-485 Settings page.
4. Select the serial port number from the drop-down list to set the RS-485 parameters.
5. Set the serial number, peripheral, authentication center, baud rate, data bit, the stop bit, parity type, communication mode, working mode, and connection mode in the drop-down list.
6. Click **Save**.
 - The configured parameters will be applied to the device automatically.
 - When you change the working mode or connection mode, the device will reboot automatically.

Enable M1 Card Encryption

M1 card encryption can improve the security level of authentication.

Steps



The function should be supported by the access control device and the card reader.

1. Enter the Access Control module.
 2. On the navigation bar on the left, enter **Advanced Function → More Parameters**.
 3. Select an access control device in the device list and click **M1 Card Encryption** to enter the M1 Card Encryption page.
 4. Set the switch to on to enable the M1 card encryption function.
 5. Set the sector ID.
-



- The sector ID ranges from 1 to 100.
 - By default, Sector 13 is encrypted. It is recommended to encrypt sector 13.
-

6. Click **Save** to save the settings.

7.8 Configure Linkage Actions for Access Control

You can configure different linkage actions for the event detected by the access control device. After that, linkage actions will be triggered once the event happens. This mechanism is used for notifying the security personnel the event, or triggering automatic access control in real time.

Two types of linkage actions are supported:

- **Client Actions:** When the event is detected, it will trigger the actions on the client, such as the client making an audible warning..
- **Device Actions:** When the event is detected, it will trigger the actions of a specific device, such as buzzing of a card reader and, opening/closing of a door, ..

7.8.1 Configure Client Actions for Access Event

Even if you are far away from an access point, you can still know what happens and how urgent the event is by configuring linked actions of access event on the client. You will be notified on the client once an event is triggered, so that you can response to the event instantly. You can also configure client actions of access points in a batch at a time.

Steps



The linkage actions here refer to the linkage of the client software's own actions such as audible warning, email linkage, etc.

1. Click **Event Management → Access Control Event**.

The added access control devices will display in the device list.

2. Select a resource (including device, alarm input, door/elevator, and card reader) from the device list.

The event types which the selected resource supports will display.

3. Select the event(s) and click **Edit Priority** to define the priority for the event(s), which can be used to filter events in the Event Center.
4. Set the linkage actions of the event.
 - 1) Select the event(s) and click **Edit Linkage** to set the client actions when the events triggered.

Audible Warning

The client software gives an audible warning when alarm is triggered. You can select the alarm sound for audible warning.



Note

For setting the alarm sound, please refer to *Set Alarm Sound* in the user manual of client software..

Send Email

Send an email notification of the alarm information to one or more receivers.

For details about setting email parameters, refer to *Set Email Parameters* in the user manual of client software..

- 2) Click **OK**.
5. Enable the event so that when the event is detected, an event will be sent to the client and the linkage actions will be triggered.
6. **Optional:** Click **Copy to...** to copy the event settings to other access control device, alarm input, door, or card reader.

7.8.2 Configure Device Actions for Access Event

You can set the access control device's linkage actions for the access control device's triggered event. After that, when an event is triggered, it can trigger the alarm output, buzzer on access controller, and other actions.

Steps



Note

The linkage actions should be supported by the device.

1. Click **Access Control → Linkage Configuration**.
2. Select the access control device from the list on the left.
3. Click **Add** to add a new linkage.
4. Select **Event Linkage** as the event source.
5. select the event type and detailed event to set the linkage.
6. In the Linkage Target area, set the property target to enable this action.

Buzzer on Controller

The audible warning of access control device will be triggered.

Capture

An event-related picture will be captured when the selected event happens.

Recording

An event-related picture will be captured when the selected event happens.



Note

The device should support recording.

Buzzer on Reader

The audible warning of card reader will be triggered.

Alarm Output

The alarm output will be triggered for notification when the selected event happens

Alarm Input

Arm or disarm the alarm input.



Note

The device should support alarm input function.

Access Point

The door status of open, close, remain open, or remain close will be triggered.



Note

The target door and the source door cannot be the same one.

Audio Play

The audio prompt will be triggered. And the select audio index related audio content will be played according to the configured play mode.

7. Click **Save**.

8. **Optional:** After adding the device linkage, you can do one or more of the followings:

Edit Linkage Settings	Select the configured linkage settings in the device list and you can edit its event source parameters, including event source and linkage target.
Delete Linkage Settings	Select the configured linkage settings in the device list and click Delete to delete it.

7.8.3 Configure Device Actions for Card Swiping

You enable access control device's linkage actions (such as disarming a zone and triggering audio prompt) for the swiping of a specific card. In this way, you can monitor the card holder's behaviors and whereabouts.

Steps



Note

It should be supported by the device.

1. Click **Access Control** → **Linkage Configuration**.
2. Select the access control device from the list on the left.
3. Click **Add** to add a new linkage.
4. Select **Card Linkage** as the event source.
5. Enter the card number or select the card from the drop-down list.
6. Select the card reader where the card swipes.
7. In the Linkage Target area, set the property target to enable this action.

Buzzer on Controller

The audible warning of access control device will be triggered.

Buzzer on Reader

The audible warning of card reader will be triggered.

Capture

An event-related picture will be captured when the selected event happens.

Recording

An event-related picture will be captured when the selected event happens.



Note

The device should support recording.

Alarm Output

The alarm output will be triggered for notification.

Alarm Input

Arm or disarm the alarm input.



Note

The device should support alarm input function.

Access Point

The door status of open, close, remain open, or remain closed will be triggered.

Audio Play

The audio prompt will be triggered. And the select audio index related audio content will be played according to the configured play mode.

8. Click **Save.**

When the card (configured in Step 5) swipes on the card reader (configured in Step 6), it can trigger the linked actions (configured in step 7).

9. Optional: After adding the device linkage, you can do one or more of the followings:

Delete Linkage Settings	Select the configured linkage settings in the device list and click Delete to delete it.
Edit Linkage Settings	Select the configured linkage settings in the device list and you can edit its event source parameters, including event source and linkage target.

7.9 Door Control

In Monitoring module, you can view the real-time status of the doors managed by the added access control device. You can also control the doors such as open/close the door, or remain the door open/closed via the client remotely. The real-time access event are displayed in this module. You can view the access details and person details.



Note

For the user with door control permission, the user can enter the Monitoring module and control the door. Or the icons used for control will not show. For setting the user permission, refer to ***Person Management*** .

7.9.1 Control Door Status

You can control the status for a single door, including opening door, closing door, remaining the door open, and remaining the door closed.

Steps

1. Click **Monitoring** to enter the status monitoring page.
2. Select an access point group on the upper-right corner.



Note

For managing the access point group, refer to *Group Management* in the user manual of the client software.

The doors in the selected access control group will display.

3. Click a door icon to select a door, or press **Ctrl** and select multiple doors.
4. Click the following buttons to control the door.

Open Door

When the door is locked, unlock it and it will be open for once. After the open duration, the door will be closed and locked again automatically.

Close Door

When the door is unlocked, lock it and it will be closed. The person who has the access authorization can access the door with credentials.

Remain Open

The door will be unlocked (no matter closed or open). All the persons can access the door with no credentials required.

Remain Closed

The door will be closed and locked. No person can access the door even if he/she has the authorized credentials, except the super users.

Capture

Capture a picture manually.



Note

The **Capture** button is available when the device supports capture function. The picture is saved in the PC running the client. For setting the saving path, refer to *Set File Saving Path* in the user manual of the client software.

Result

The icon of the doors will change in real-time according to the operation if the operation is succeeded.

7.9.2 Check Real-Time Access Records

The real-time access records can be displayed in the client, including card swiping records, face recognition records, skin-surface temperature information, etc. Also, you can view the person information and view the picture captured during access.

Before You Start

You have added person(s) and access control device(s) to the client. For details, refer to **Person Management** and **Add Device**.

Steps

1. Click **Monitoring** to enter monitoring module.

Real-time access records are displayed on the bottom of the page. You can view record details, including card No., person name, event time, door location, temperature, authentication type etc.

Event Type

Access Event

Other

Event Status

Normal

Exception

Show Latest Event

Enable Abnormal Temperature Prompt

Card No.	Person Name	Event Time	Door Location	Temperature	Abnormal Temperature	Authentication Type
2020-05-15 17:03:44		Door1	35.8°C	No	Card/Face	
2020-05-15 17:03:41		Door1	35.8°C	No	Card/Face	
2020-05-15 17:03:39		Door1	35.8°C	No	Card/Face	
2020-05-15 17:03:39		101-Door1				

Person

Linked Capture Picture



Figure 7-12 Real-time Access Records



Note

You can right click the column name of access event table to show or hide the column according to actual needs.

- 2. **Optional:** Select an access point group from the drop-down list in the upper-right corner to show the real time access records of the selected group.
- 3. **Optional:** Check the event type and event status.
The detected events of checked type and status will be displayed in the list below.
- 4. **Optional:** Check **Show Latest Event** to view the latest access record.
The record list will be listed reverse chronologically.
- 5. **Optional:** Check **Enable Abnormal Temperature Prompt** to enable abnormal skin-surface temperature prompt.



Note

When enabled, if there is abnormal temperature information, an Abnormal Temperature window pops up when you enter Monitoring module, displaying person's picture, skin-surface temperature, card No., person name, etc.

- 6. **Optional:** Click an event to view person pictures (including captured picture and profile).



Note

In **Linked Capture Picture** field, you can double click the captured picture to view an enlarged picture.

- 7. **Optional:** Click  to view surveillance details (including person's detailed information and the captured picture).



Note

In the pop-up window, you can click  to view surveillance details in full screen.

7.10 Event Center

The event information (for example, device offline) received by the client displays. In the Event Center, you can check the detailed information of the real-time and historical events, view the event linked video, handle the events, and so on.

Before the client can receive the event information from the device, you need to enable the events of the resource and arm the device first. For details, refer to ***Enable Receiving Event from Devices***.

7.10.1 Enable Receiving Event from Devices

Before the client software can receive event notifications from the device, you need to arm the device first.

Steps

1. Click  → **Tool** → **Device Arming Control** to open Device Arming Control page.
All the added devices appear on this page.
2. In the Auto-Arming column, turn on the switch to enable auto-arming.

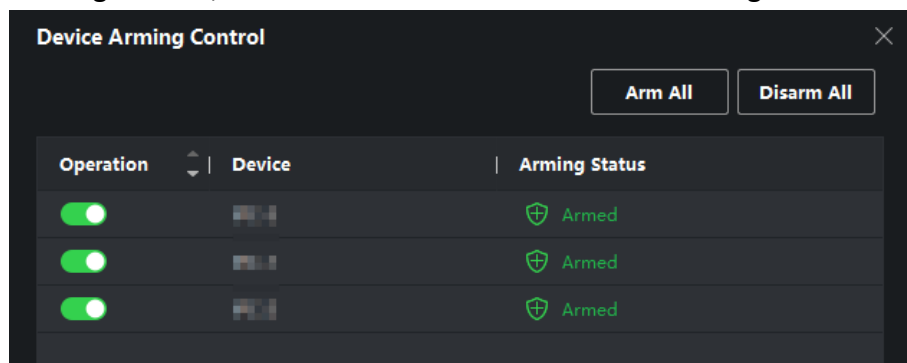


Figure 7-13 Arm Device

After turned on, the device(s) will be armed. And notifications about the events triggered by the armed device(s) will be automatically sent to the client software in real-time.

7.10.2 View Real-Time Events

The real-time event information received by the client of the connected resources are displayed. You can check the real-time event information, including event source, event time, priority, etc.

Before You Start

Enable receiving events from devices before the client can receive event from the device, see ***Enable Receiving Event from Devices*** for details.

Steps

1. Click **Event Center** → **Real-time Event** to enter the real-time event page and you can view the real-time events received by the client.

Event Time

For encoding device, event time is the client time when it receives the event. For other device types, event time is the time when the event is triggered.

Priority

Priority represents the emergency degree of the event.

2. Filter the events.

Filter by Device Type and (or) Priority

Select device type(s) and (or) priorities to filter events.

Filter by Keywords

Enter the keywords to filter the events.

3. **Optional:** Right-click the table header of the event list to customize the event related items to be displayed in the event list.
4. Select an event in the event list to view the event details.
5. **Optional:** Perform the following operations if necessary.

Handle Single Event

Click **Handle** to enter the processing suggestion, and then click **OK**.



Note

After an event is handled, the **Handle** button will become **Add Remark**. Click **Add Remark** to add more remarks for this handled event.

Handle Events in a Batch

Select events that need to be processed, and then click **Handle in Batch**. Enter the processing suggestion, and then click **OK**.

Enable/Disable Alarm Audio

Click **Audio On/Mute** to enable/disable the audio of the event.

Select the Latest Event Automatically

Check **Auto-Select Latest Event** to select the latest event automatically and the event information details is displayed.

Clear Events

Click **Clear** to clear the all the events in the event list.

Send Email

Select an event and then click **Send Email**, and the information details of this event will be sent by email.



Note

You should configure the email parameters first, see for details.

Auto-Play Video

Check **Auto-Play Video** to automatically play video when displaying event details.

Enlarge Video or Picture	• Double click the video image to view video in a larger window. • Put the cursor on the picture, and click  to view picture in a larger window.
Download Captured Picture	Hover the cursor on the captured picture, and click the download icon on the lower right corner of the picture to download it to the local PC.
Download Event Triggered Video	Hover the cursor on the recorded video, click  to download the video (30s before the event happens) triggered by the event.

7.10.3 Search Historical Events

In the Event Search module of the event center page, you can search the historical events via time, device type, and other conditions according to the specified device type, and then process the events.

Before You Start

Enable receiving events from devices before the client can receive event information from the device, see *Enable Receiving Event from Devices* for details.

Steps

1. Click **Event Center** → **Event Search** to enter the event search page.
2. Set the filter conditions to display the required events only.

Time

The time when the event starts.

Search by

Device

Search the events by device or the device's resource channels. If searched by device, you need to set the followings:

- **Include Sub-Node:** Search the events of the device and all resource channels.
- **Device Type:** The device type which events you want to search.

Group

Search the events by resource channels in the group.



Note

- For video intercom device, you need to select searching scope: All and Locking Log.
 - For access control device, you can click **Show More** to set more conditions: status, event type, card reader type, person name, card No., and organization.
-

Priority

The priority including low, medium, high and uncategorized which indicates the emergency degree of the event.

Status

The handling status of the event.

- 3. Click **Search** to search the events according the conditions you set.
- 4. **Optional:** Right-click the table header of the event list to customize the event related items to be displayed in the event list.

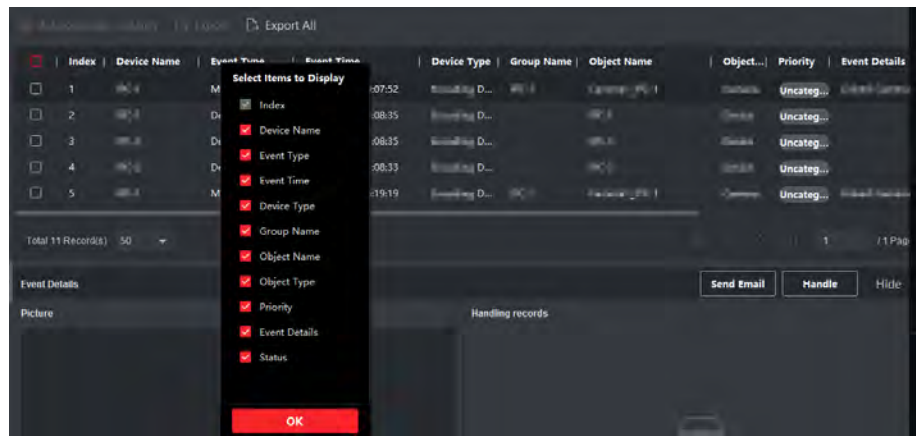


Figure 7-14 Customize Event Related Items to Display

- 5. **Optional:** Perform one of the following operations.

Handle a Single Event

Handle single event: Select one event that need to be processed, and then click **Handle** in the event information details page, and enter the processing suggestion.



Note

After an event is handled, the **Handle** button will become **Add Remark**, click **Add Remark** to add more remarks for this handled event.

Batch Handle Events

Handle events in a batch: Select the events which need to be processed, and then click **Handle in Batch**, and enter the processing suggestion.



Note

After an event is handled, the **Handle** button will become **Add Remark**, click **Add Remark** to add more remarks for this handled event.

Send Email

Select an event and then click **Send Email**, and the information details of this event will be sent by email.



Note

You should configure the email parameters first, see for details.

Export Event Information

Click **Export** to export the event log or event pictures to the local PC in CSV format. You can set the saving path manually.

Download Event Related Picture	Hover the cursor on the related picture, and then click the download icon on the upper-right corner of the picture to download it to the local PC. You can set the saving path manually.
---	--

7.11 Remote Configuration via Client Software

Configure device parameters remotely.

7.11.1 Check Device Information

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.
2. Click  to enter the remote configuration page.
3. Click **System** → **Device Information** and view the device basic information and the device version information.

7.11.2 Edit Device Name

Click **Maintenance and Management** → **Device** to enter the device list.

Click  to enter the remote configuration page.

Click **System** → **General** to configure the device name and overwrite record files parameter.

Click **Save**.

7.11.3 Edit Time

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.
2. Click  to enter the remote configuration page.
3. Click **System** → **Time** to configure the time zone.
4. **Optional:** Check **Enable NTP** and set the NTP server address, the NTP port, and the synchronization interval.
5. **Optional:** Check **Enable DST** and set the DST start time, end time and the bias.
6. Click **Save**.

7.11.4 Set System Maintenance

You can reboot the device remotely, restore the device to default settings, etc.

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.
2. Click  to enter the remote configuration page.

3. Click **System** → **System Maintenance** .

4. Maintain the device.

Reboot

The device starts rebooting.

Restore Default Settings

Restore the device settings to the default ones, excluding the IP address.

Restore All

Restore the device parameters to the default ones. The device should be activated after restoring.

5. Remotely upgrade the device.

1) In the Remote Upgrade part, select an upgrade type.



Note

- You need to set the device ID before upgrading if you select Controller Upgrade File as the remote upgrade type.
- Only the card reader that connected via RS-485 protocol supports upgrading.

2) Click ... to select an upgrade file.

3) Click **Upgrade** to start upgrading.



Note

Do not power off during the upgrading.

7.11.5 Manage Network User

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.

2. Click  to enter the remote configuration page.

3. Click **System** → **User** → **Network User** .

4. Click **Add** to add the user.

5. **Optional:** Select a user in the user list and click **Edit** to edit the user.

You are able to edit the user password, the IP address, the MAC address and the user permission.

6. Click **OK**.

7.11.6 Manage Keyfob User

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.

2. Click  to enter the remote configuration page.

3. Click **System** → **User** → **Keyfob User** .

4. Click **Add** to add the user.
5. Check **Enable** in the pop-up window and set the keyfob's serial No.
6. **Optional:** Enable the Remain Open Status of the turnstile.



Note

If enabling this function, after the keyfob is matching completed, you can set the barrier as remaining open by using the keyfob.

7. Set the door open direction
8. Click **OK**.



Note

Up to 32 keyfob users can be added.

7.11.7 Set Security

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.
2. Click  to enter the remote configuration page.
3. Click **System** → **Security**.
4. Select the encryption mode in the drop-down list.
5. You can select **Compatible Mode** or **Encryption Mode**.

Compatible Mode

The user information verification is compatible with the old client software version when logging in.

Encryption Mode

High security level during the user information verification when logging in.

6. Click **Save**.

7.11.8 Configure Screen Parameters

The device can connect to a text screen. You can set the display parameters on this page.

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.
2. Click  to enter the remote configuration page.
3. Click **System** → **Screen Configuration**.
4. Set the screen parameters.



Note

For better performance, it is suggested to use the default parameters.

Screen Position

Select the screen's position on the device. If select **Exit** from the drop-down list, the screen will be installed at the exit position of the device.

Screen Model

Select the screen model from the drop-down list.

Font Size

Select the text font size in the screen.

Text Orientation

Select the text orientation on the screen.

Line Spacing

Set the space between two lines.

Word Spacing

Set the space between two words.

Initial Position

Set the first character's position displayed on the screen.

5. Click **Save**.

7.11.9 Configure Screen Parameters

You can set the people counting's parameters and after the configuration

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.
2. Click  to enter the remote configuration page.
3. Click **System** → **People Counting**.
4. Set the people counting parameters.

Clear Counted Number

Click **Clear** and the counted people number will be restored to zero.

Device People Counting

Click **Enable** or **Disable** to enable or disable the people counting function.

Offline People Counting

Click **Enable** or **Disable** to enable or disable function of the offline people counting on the client.

If enabling the function and if the device is offline, the device will continue counting the people and the number will be stored in the device. When the device is online, the client will read the updated number from the device automatically.

People Counting Type

You can select from **Invalid**, **By IR Detection**, and **By Authentication Number**.

None

The device will not count people. If the device people counting function is enabled, the people counting function is still disabled.

By IR Detection

The device will count the people who passing through the device depending on the IR detection.

By Authentication Number

The device will count the people who authenticating on the device.

The failed authentication will also count as once.

5. Click **Save**.

7.11.10 Configure Advanced Network

Click **Maintenance and Management** → **Device** to enter the device list.

Click  to enter the remote configuration page.

Click **Network** → **Advanced Settings** and you can configure the DNS IP address 1 and the DNS IP address.

Click **Save** to save the settings.

7.11.11 Configure Audio File

You can relate the audio file to the corresponding playing scene. You can also export the audio file from the system and import the audio file from the local.

Steps

1. Click **Maintenance and Management** → **Device** to enter the device list.
2. Click  to enter the remote configuration page.
3. Click **Other** → **Audio File**.



Note

By default, the system contains the audio content. For details about the index related audio content, see ***Table of Audio Index Related Content***.

4. Select the index (the playing content) corresponded play scene.
5. **Optional:** Input the descriptions of the play scene.
6. Click **Save Parameters** to save the relationship between the index (the playing content) and the play scene.
7. **Optional:** Click **Export** to export the default audio file to the local computer.
8. **Optional:** Click ... and select audio file from the local computer. Click **Import** to import the file to the device.



Note

- The imported audio file should be in MEM format.
 - For details about converting other format of the audio file to MEM format, see the audio conversion manual.
 - If you use the third part software to create or edit an audio file, the volume of the audio file should be no less than 0×68 . If the volume is less than the value, it will exceed the loudspeaker's power consumption, so that damage the loudspeaker.
-

7.11.12 View Relay Status

Click **Maintenance and Management** → **Device** to enter the device list.

Click  to enter the remote configuration page.

Click **Status** → **Relay** and you can view the relay status.

Appendix A. Tips When Collecting/Comparing Face Picture

The position when collecting or comparing face picture is as below:

Expression

- Keep your expression naturally when collecting or comparing face pictures, just like the expression in the picture below.



- Do not wear hat, sunglasses, or other accessories that can affect the facial recognition function.
- Do not make your hair cover your eyes, ears, etc. and heavy makeup is not allowed.

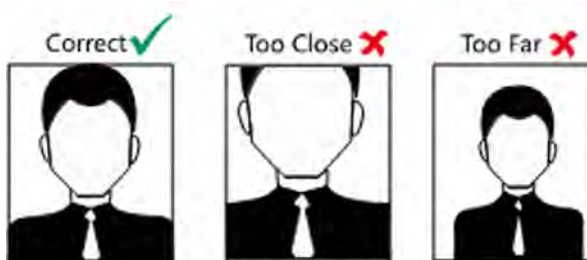
Posture

In order to get a good quality and accurate face picture, position your face looking at the camera when collecting or comparing face pictures.



Size

Make sure your face is in the middle of the collecting window.



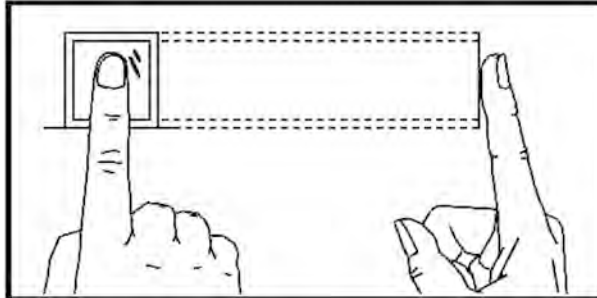
Appendix B. Tips for Scanning Fingerprint

Recommended Finger

Forefinger, middle finger or the third finger.

Correct Scanning

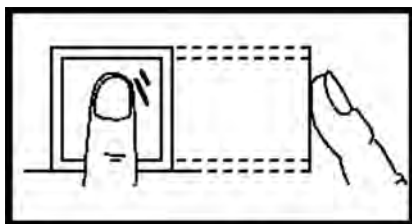
The figure displayed below is the correct way to scan your finger:



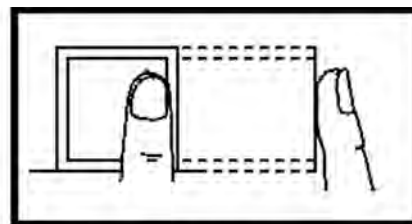
You should press your finger on the scanner horizontally. The center of your scanned finger should align with the scanner center.

Incorrect Scanning

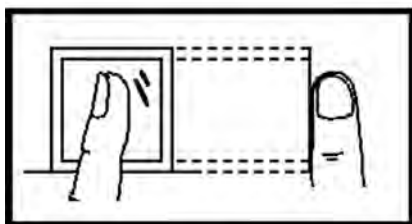
The figures of scanning fingerprint displayed below are incorrect:



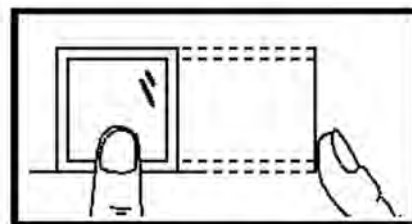
Vertical



Edge I



Side



Edge II

Environment

The scanner should avoid direct sun light, high temperature, humid conditions and rain. When it is dry, the scanner may not recognize your fingerprint successfully. You can blow your finger and scan again.

Others

If your fingerprint is shallow, or it is hard to scan your fingerprint, we recommend you to use other authentication methods.

If you have injuries on the scanned finger, the scanner may not recognize. You can change another finger and try again.

Appendix C. DIP Switch Description

The DIP switch is on the master lane control board. No.1 to No 8 is from the low bit to the high bit.



When the switch is towards ON, it means the switch is enabled, otherwise, the switch is off. If you set the DIP switch like the figure displayed below, its binary value is 00001100, and its decimal value is 12.



Appendix D. Event and Alarm Type

Event	Alarm Type
Passing Timeout	None

Appendix E. Table of Audio Index Related Content

Index	Content
1	Authenticated.
2	Card No. does not exist.
3	Card No. and fingerprint mismatch.
4	Passing timeout.
5	No permissions.
6	Authentication time out.
7	Authentication failed.
8	Expired card.

Appendix F. Communication Matrix and Device Command

Communication Matrix

Scan the following QR code to get the device communication matrix.

Note that the matrix contains all communication ports of Hikvision access control and video intercom devices.



Figure F-1 QR Code of Communication Matrix

Device Command

Scan the following QR code to get the device common serial port commands.

Note that the command list contains all commonly used serial ports commands for all Hikvision access control and video intercom devices.



Figure F-2 Device Command



See Far, Go Further