1 Overview

2 Installation of Wall-mount

Before the installation, please connect the cables to the connectors. (Recommended installation height: 1.1m)

1) Post the installation template on the wall and drill. 2) Fix back plate to the wall. 3) Mount the device on the back plate. 4) Secure the device and back plate.

3 Cautions

1) Power cable is connected after other wirings, and shut down the power firstly, when making some necessary checking.
2) We recommend that use the DC12V/3A power supply.
3) Please read the terminals description carefully and wiring by rule strictly.
4) Please connect the GND before other wirings especially under the serious electrostatic environment.
5) Do not install the device in a place subject to direct sunlight, humidity or dust.

### 4 Wiring Diagram

![Wiring Diagram](image)

### 5 Door Bell & Door Sensor & Exit Button & Alarm Connection

<table>
<thead>
<tr>
<th>Description</th>
<th>Color</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alarm</td>
<td>AL+</td>
</tr>
<tr>
<td>Alarm</td>
<td>AL-</td>
</tr>
<tr>
<td>Normal Close</td>
<td>NC1</td>
</tr>
<tr>
<td>COMM</td>
<td>COM1</td>
</tr>
<tr>
<td>Normal Open</td>
<td>NO1</td>
</tr>
<tr>
<td>Button</td>
<td>BUT</td>
</tr>
<tr>
<td>Ground</td>
<td>GND</td>
</tr>
<tr>
<td>Sensor</td>
<td>SEN</td>
</tr>
<tr>
<td>Bell</td>
<td>BELL+</td>
</tr>
<tr>
<td>Bell</td>
<td>BELL-</td>
</tr>
<tr>
<td>Ground</td>
<td>GND</td>
</tr>
<tr>
<td>Auxiliary</td>
<td>AUX</td>
</tr>
</tbody>
</table>
6 485 Reader Connection

How to enable 485 Reader Function?
2. Setting 485 Reader verification mode: Press M/OK > Access Control > Access Control Options > Verify mode by RS485, to choose verification mode.

7 Wiegand Card Reader Connection

<table>
<thead>
<tr>
<th>Description</th>
<th>Color</th>
</tr>
</thead>
<tbody>
<tr>
<td>Power Out</td>
<td>+12V</td>
</tr>
<tr>
<td>Ground</td>
<td>GND</td>
</tr>
<tr>
<td>Wiegand In</td>
<td>IWD0</td>
</tr>
<tr>
<td>Wiegand In</td>
<td>IWD1</td>
</tr>
<tr>
<td>Red LED</td>
<td>RLED</td>
</tr>
<tr>
<td>Green LED</td>
<td>GLED</td>
</tr>
<tr>
<td>Beep</td>
<td>BEEP</td>
</tr>
</tbody>
</table>
1. The device supports "Dry Mode" and "Wet Mode" by setting the jumper. The factory default jumper setting is set as "Dry Mode", that is, shorten 1-2 and 3-4.

2. If there is no enough power supply under the working circumstance, "Wet Mode" can also be used, namely, shorten 2-3 and 4-5.

3. If you want to switch "Dry Mode" to "Wet Mode", you must take off the jumpers and plug them.

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12V ± 10%, at least 500mA.
To share the power with other devices, use a power supply with higher current ratings.

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**8 Power Connection**

**Description** | **Color**
--- | ---
Ground | GND | Black
Power In | +12V | Red

**9 Printer Connection**

**10 Communication with PC Via Ethernet Cable**

To connect device with a PC directly, connect both devices with a straight network cable. Such as the following figure.

IP Address: 192.168.1.201
Subnet Mask: 255.255.255.0

IP Address: 192.168.1.130
Subnet Mask: 255.255.255.0

**11 Lock Relay Connection**

1. The device supports "Dry Mode" and "Wet Mode" by setting the jumper. The factory default jumper setting is set as "Dry Mode", that is, shorten 1-2 and 3-4.

2. If there is no enough power supply under the working circumstance, "Wet Mode" can also be used, namely, shorten 2-3 and 4-5.

3. If you want to switch "Dry Mode" to "Wet Mode", you must take off the jumpers and plug them.
Press M/OK > Comm. > Ethernet to enter the Ethernet interface.

The Parameters below are the factory default values. Please adjust them according to the actual network.

IP Address: 192.168.1.201
Subnet Mask: 255.255.255.0
Gateway: 0.0.0.0
DNS: 0.0.0.0
TCP COMM. Port: 4370
DHCP: Dynamic Host Configuration Protocol, which is to dynamically allocate IP addresses for clients via server. If DHCP is enabled, IP cannot be set manually.
Display in Status Bar: To set whether to display the network icon on the status bar.

Press M/OK > System > Date Time to enter the Date Time interface.

Press M/OK > User Mgt. > New User to enter the New User interface.
The setting include entering a name, modifying user roles (Super Admin / Normal User), enrolling fingerprint/palm/badge number ★ /password, modifying access control role.
Adding a Super Admin: Select Super Admin in User Role to add a super admin.
Adding a Normal User: Select Normal User in User Role to add a normal user.

Press M/OK > User Mgt. > System > Date Time to enter the Date Time interface.

Press M/OK > System > Date Time to enter the Date Time interface.

Press M/OK > System > Date Time to enter the Date Time interface.

Press M/OK > Comm. > Ethernet to enter the Ethernet interface.

The Parameters below are the factory default values. Please adjust them according to the actual network.

IP Address: 192.168.1.201
Subnet Mask: 255.255.255.0
Gateway: 0.0.0.0
DNS: 0.0.0.0
TCP COMM. Port: 4370
DHCP: Dynamic Host Configuration Protocol, which is to dynamically allocate IP addresses for clients via server. If DHCP is enabled, IP cannot be set manually.
Display in Status Bar: To set whether to display the network icon on the status bar.
Press M/OK > Access Control > Access Control Options > Auxiliary input configuration.

Auxiliary Output/Lock open Time: It is defined as the time interval between the lock receiving signals and automatically closing under Normal Closed mode.

Auxiliary Output Types
Trigger Door open: The lock will turn to Normally Open after the device receives signals.
Trigger Alarm: The alarm will be triggered after the device receives signals.
Trigger Door open and Alarm: The lock will turn to Normal Open and the alarm will be triggered after the device receives signals.
17 Disabled Slide Show

Press M/OK > Personalize > User Interface, set Idle Time To Slide Show(s) to be None, or set Slide Show Interval(s) to be disabled.

18 Trouble shooting

1) Fingerprint can not be read or it takes too long.
   - Check whether a finger or fingerprint sensor is stained with sweat, water, or dust.
   - Retry after wiping off finger and fingerprint sensor with dry paper tissue or a mildly wet cloth.
   - If a fingerprint is too dry, blow on the finger and retry.
2) Fingerprint is verified but authorization keeps failing.
   - Check whether the user is restricted by door zone or time zone.
3) Authorized but door does not open.
   - Check the user role is permissible.
   - Check the lock connection is corrected.
4) When the device is tampered, the device will send a signal to the speaker then the icon is displayed on the top right corner and the speaker is ringing. Only the [Speaker Alarm] (Access Control > Access Control Options > Speaker Alarm) is [ON] can user heard the ringing.
   - Please install the device properly.