



ARDWOLF

FINGERPRINT DOOR LOCK

A20

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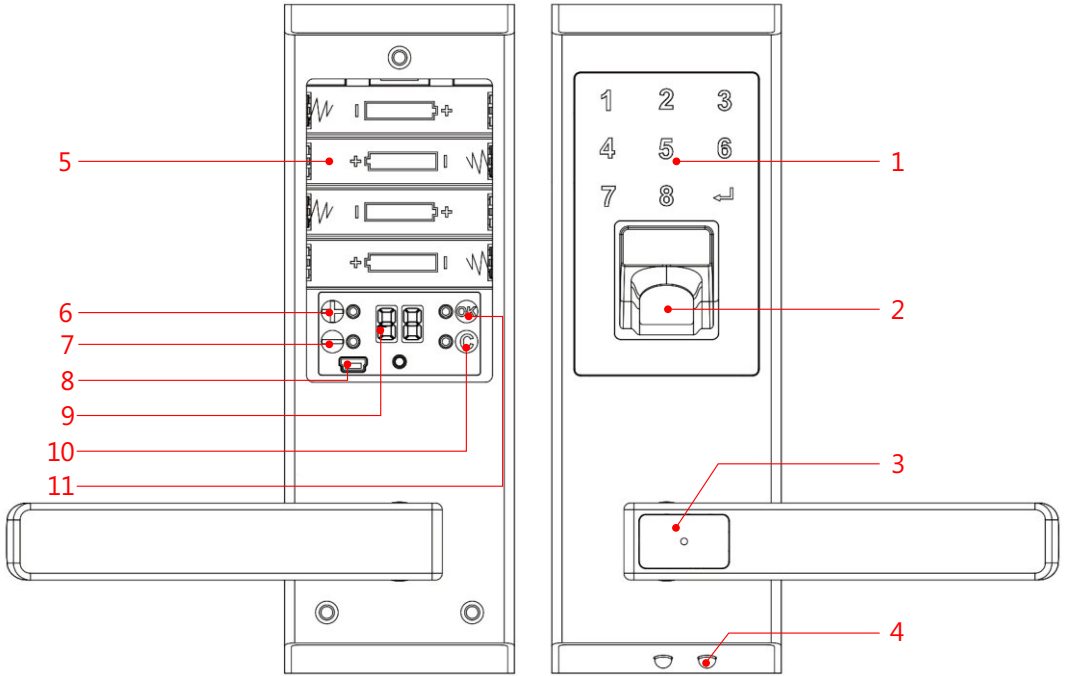
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You can download the softwares for the lock on the link as following:

www.ardwolf.com/download/A20.zip

More support please contact us: service@ardwolf.com

Product Guide




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Product Guide



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Brief Introduction

- 1 There are 99 users available in the lock, which are divided by 2 levels:
 - a) **Master Level:** Besides unlocking the lock, the master user can add and delete other users. The ID range is from "96" to "99".
 - b) **Normal Level:** This level of users only can unlock the lock, which cannot set up the lock or modify the other users. The ID range is from "01" to "95".
 - 2 There are 2 modes available in the lock, which are "**Security Mode**" and "**Normal Mode**":
 - a) **Security Mode:** when there is master user registered in the lock, the lock will be changed to Security Mode automatically. If people want to set up the lock like adding new users, deleting users, they have to wait for the authorization of master users before operation.
 - b) **Normal mode:** when there is no master user registered in the lock, the lock is under normal mode. In this case, anyone can set up the lock, like adding new users, deleting users and so on.
-  ***It is suggested to keep the lock under Security Mode for a better security.***
- 3 Each ID only can be registered with one unlocking method: Fingerprint or Password. The same fingerprint and same password cannot be registered in different ID.
 - 4 For password user, the password has to be 8 digits' combination between "1" to "8".
 - 5 New lock under factory default (no users are registered in the lock) can be unlocked by any fingerprint and password (password has to be 8 digits). The ID will be shown as "00".

Code Definition on Nixie Tube

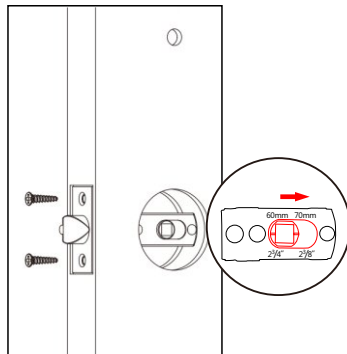
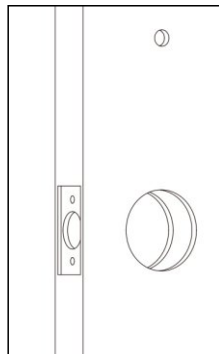
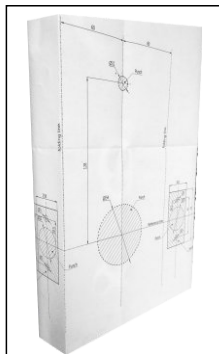
There are 2 nixie tubes in the battery case after take out the battery cover, which helps you to understand the lock states.

"AD"	the lock requires master user authorization.
"AL"	delete all users in the lock (when the lock is under delete user operation)
"FP"	delete user by inputting fingerprint or password directly (when the lock is under delete user operation)
"ID"	delete user by selecting ID (when the lock is under delete user operation)
"NU"	the lock is under passage mode state.

Installation



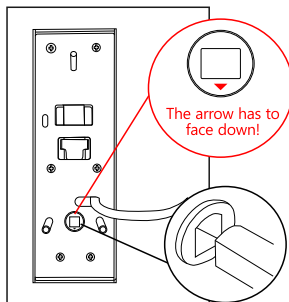
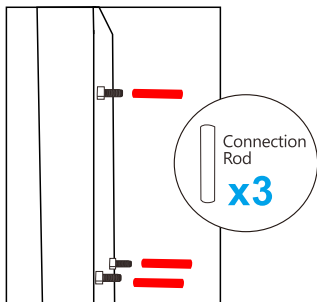
Nine times out of ten, an error is the result of an improper installation and/or wiring by the user. If you're not feeling particularly tech savvy, let a professional put it in.



1. Place the template on the door to make the holes, and then drill holes for installation.


2. Determine the backset for your door.

3. Install the latch, and fasten with screws, if a 70mm backset is required, move the hole to the right side.

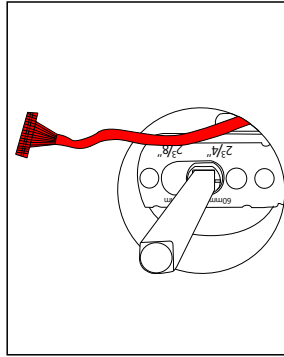
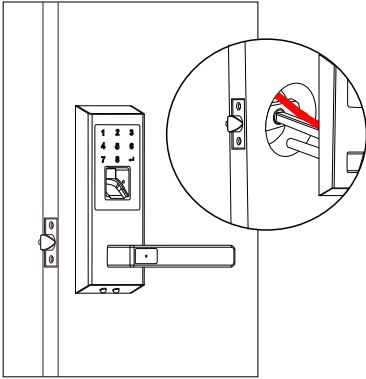


4. Install the connection rods on the front panel.

5. Insert the spindle into the hole on the front panel.

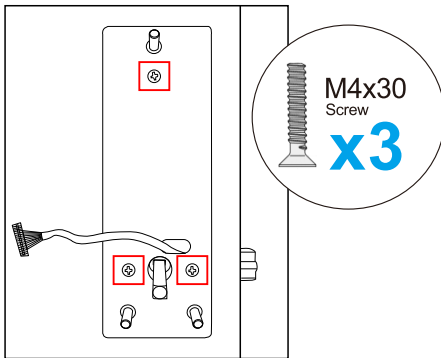
 **There is an arrow symbol on the hole, make sure the arrow is facing down.**

Installation



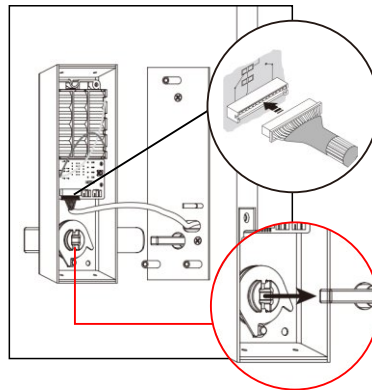
6. Install the front panel on the door.

⚠ The cable goes on the top of the latch.



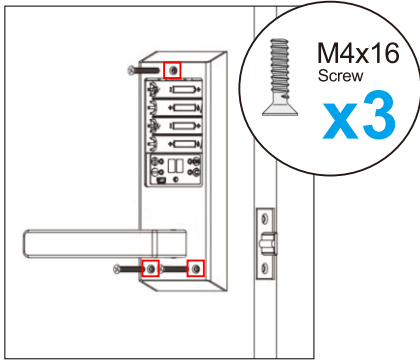
7. Install the base mounting plate on the door, and fasten with screws (M4x30)

⚠ The cable goes out from the hold marked on the picture.

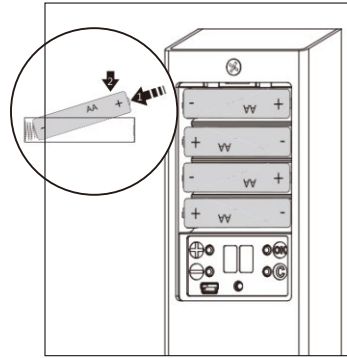


8. Connect the cable to the inside panel, and the spindle goes into the hole in the inside handle.

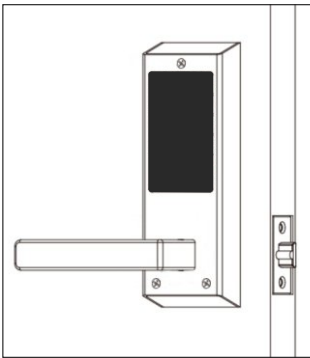
Installation



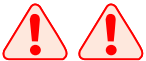
9. Install the inside panel on the mounting plate, and fasten with screw (M4x16)



10. Install the batteries



11. Replace the battery case cover and fasten with screw.

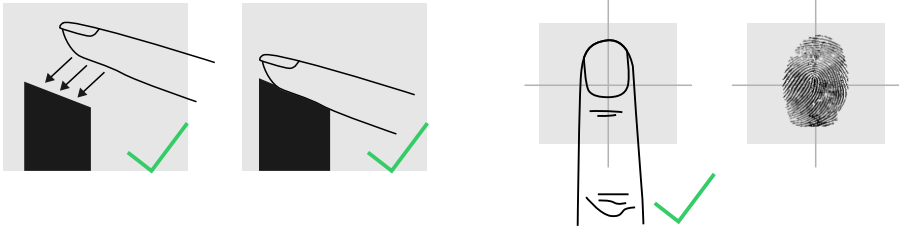


Once finishing the installation, please try to unlock the lock to make sure the installation is successful.

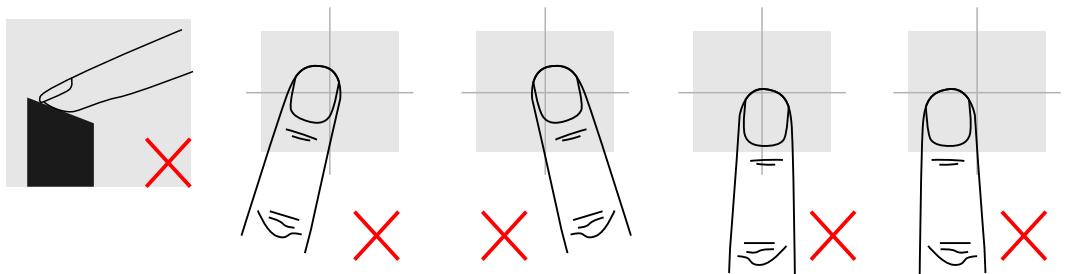
Operation

1 Some Suggestions to Help Capturing the Fingerprint

When placing the finger on the sensor, please make sure the "core" of fingerprint is staying in the main area of sensor directly with a little bit pressure. Like the pictures show as following:



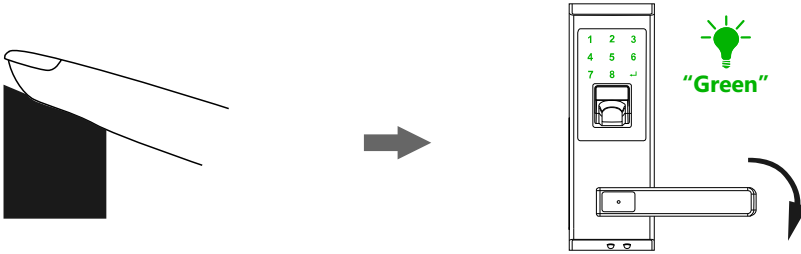
The sensor may not capture the correct fingerprint image if you take the following operations.



It is suggested to register the thumb, first finger, and middle finger for better fingerprint images.

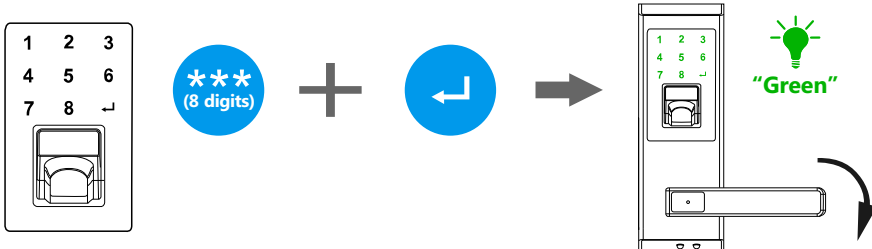
2 Fingerprint Unlocking

Place the finger on the sensor, the lock will be activated automatically and started to capture the fingerprint image for identification. Once the identification is passed, the keypad shows "Green" light with sounds, then you can press down the handle for unlocking.



3 Password Unlocking

Touch the keypad to activate the lock, then input the password (8 digits) with pressing "↵" to finish. If the password is correct, the keypad shows "Green" light with sounds, then you can press down the handle for unlocking.



When inputting a wrong password for 3 times, the lock will be locked for 5 minutes. During the 5 minutes, the lock cannot be activated and all operations are not available. After that, the lock returns to normal state.

Random Password Protection

For a better security protection to the password user, the lock is designed with a random password protection. You can add any digits before and after the real password.

For example, the password is "1234-5678", you can unlock the lock by inputting the password as following:

1:

2:

3:



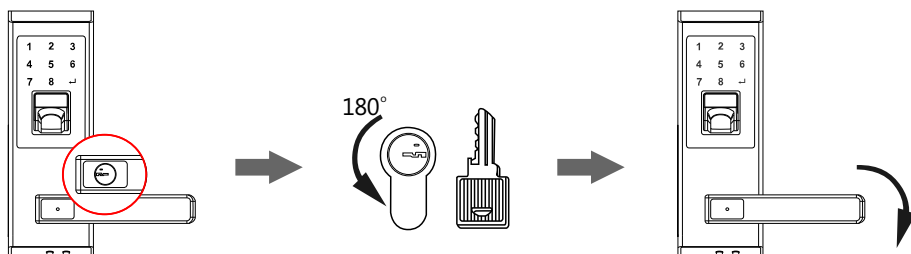
1. The lock allows you to input a password with maximum 17 digits which include the real password (8 digits)

2. If you input the password with 17 digits including the real password, the lock will unlock automatically without pressing "↵" to confirm.

4 Mechanical Key Unlocking

When there is problem with electronic part, and the batteries run out of power, using mechanical key is the way to unlock the lock.

Take out the cylinder cover on the outside handle with a tiny tool from the small hole in the middle of cover, then insert the key and turn the key 180 degree. After that, press down the handle for unlocking.



! The mechanical key can't unlock the lock directly.

5 Add Users under Normal Mode



1. Activate the lock by pressing any key on the lock;

2. Press "+" key to enter registration state;

3. Press "+" and "-" key to select the ID, then press "OK" to confirm;



OR



4. Fingerprint User: Place the finger on the sensor in 2 times; (Register Success: the keypad shows "Green" light with sound; Register Fail: the keypad shows "Red" light with sound);

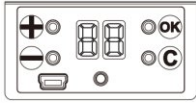
5. Password User: input the password in 2 times; (Register Success: the keypad shows "Green" light with sound; Register Fail: the keypad shows "Red" light with sound);

6. The lock will show the next ID for registering another user, repeat the steps above if there are other users need to be registered. If not, you can press "C" to exit.



Once finishing the user's registration, please try to unlock the lock to make sure the user registration is successful.

6 Add Master User under Normal Mode



1. Activate the lock by pressing any key on the lock;

2. Press and hold "+" key for 3 seconds to enter master user registration state; (the ID shows "96")

3. Press "+" and "-" key to select the ID, then press "OK" to confirm;



OR



4. Fingerprint User: Place the finger on the sensor in 2 times; (Register Success: the keypad shows "Green" light with sound; Register Fail: the keypad shows "Red" light with sound);

5. Password User: input the password in 2 times; (Register Success: the keypad shows "Green" light with sound; Register Fail: the keypad shows "Red" light with sound);

6. The lock will show the next ID for registering another user, repeat the steps above if there are other users need to be registered. If not, you can press "C" to exit.

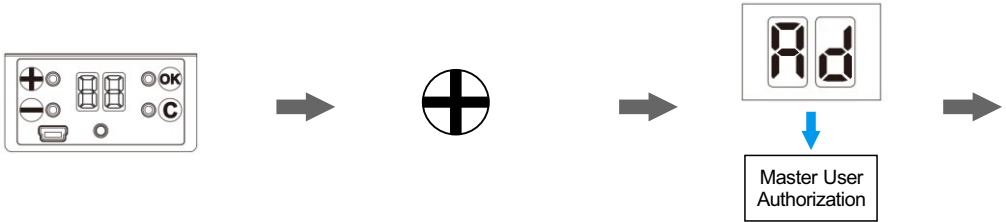


1. Once finishing the user's registration, please try to unlock the lock to make sure the user registration is successful.



2. When there is master user registered in the lock, the lock will switch to "Security Mode" automatically.

7 Add Normal User under Security Mode



1. Activate the lock by pressing any key on the lock;

2. Press "+" key to enter user registration state;

3. Place the master user for authorization; (the nixie tubes show "AD" for master user authorization)



4. Press "+" and "-" key to select the ID, then press "OK" to confirm;

5. Fingerprint User: Place the finger on the sensor in 2 times; (Register Success: the keypad shows "Green" light with sound; Register Fail: the keypad shows "Red" light with sound);

6. Password User: input the password in 2 times; (Register Success: the keypad shows "Green" light with sound; Register Fail: the keypad shows "Red" light with sound);

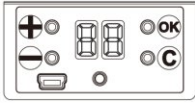


6. The lock will show the next ID for registering another user, repeat the steps above if there are other users need to be registered. If not, you can press "C" to exit.



Once finishing the user's registration, please try to unlock the lock to make sure the user registration is successful.

8 Delete Normal User under Normal Mode



1. Activate the lock by pressing any key on the lock;

2. Press "-" key to enter user deletion state;



4. Press "C" to exit

3. Press "+" and "-" to select the way to delete the user, then press "OK" to confirm;

FP: input the fingerprint/password you want to delete twice, then the lock will delete that user;

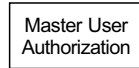
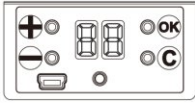
AL: if you want to delete all normal users, select this way and the lock will delete all users;

ID: select the user ID you want to delete, then press "OK" to confirm, the lock will delete that user



Once finish the user deletion, please try to use that user to unlock and make sure the deletion is successful.

9 Delete Master User under Security Mode



1. Activate the lock by pressing any key on the lock;

2. Press and hold “-” key to enter master user deletion state;

3. Place the master user for authorization; (the nixie tubes show “AD” for master user authorization)



5. Press “C” to exit

4. Press “+” and “-” to select the way to delete the user, then press “OK” to confirm;

FP: input the fingerprint/password you want to delete twice, then the lock will delete that user;

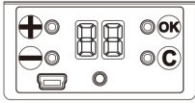
AL: if you want to delete all master users, select this way and the lock will delete all users;

ID: select the user ID you want to delete, then press “OK” to confirm, the lock will delete that user



Once finish the user deletion, please try to use that user to unlock and make sure the deletion is successful.

10 Delete Normal User under Security Mode



1. Activate the lock by pressing any key on the lock;

2. Press "-" key to enter user deletion state;

3. Place the master user authorization; (the nixie tubes show "AD" for master user authorization);



4. Press "+" and "-" to select the way to delete the user, then press "OK" to confirm;

5. Press "C" to exit

FP: input the fingerprint/password you want to delete twice, then the lock will delete that user;

AL: if you want to delete all master users, select this way and the lock will delete all users;

ID: select the user ID you want to delete, then press "OK" to confirm, the lock will delete that user

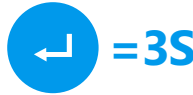
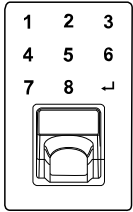


Once finish the user deletion, please try to use that user to unlock and make sure the deletion is successful.

11 Passage Mode

When the lock is required to unlock frequently, set the lock to passage mode can let the people unlock the lock without any identification.

Enable the passage mode



1.Unlock the lock with any registered user

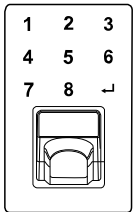
2.When the keypad shows "green" light with sound, press the "↪" key for 3 seconds.

3.Release the "↪" key when hearing "beep-beep" sound, and the lock is under passage mode.



When the lock is under passage mode, you can just press down the handle to unlock like a normal lock.

Disable the passage mode



1.Touch the keypad to activate the lock

2.When the keypad shows "green" light with sound, press the "↪" key for 3 seconds.

3.Release the "↪" key when hearing "beep-bee" sound, and the motor drives. The lock exits the passage mode.

12 Restore the Lock

When the lock has problems and you can try to restore the lock to solve the problems.



1.The restore key is on the back of interior panel, which is in white color. Press the key for 3 seconds.

2.Release the key when hearing “beep” sound, then the lock will restored to factory default.

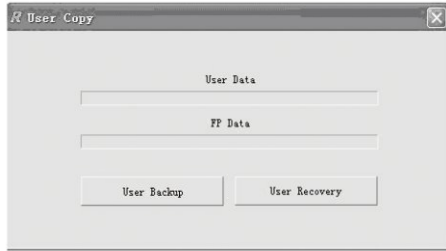
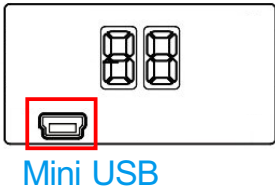


Once restore the lock, all users including normal users and master users will be deleted.

13 Software – User Copy

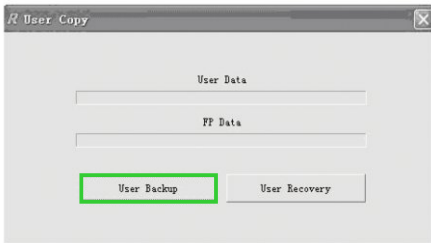
With the software “User Copy”, you can backup and recover the user data to the lock. The software only works with Microsoft Windows XP, 7, 8, and 10 systems.

User data back up



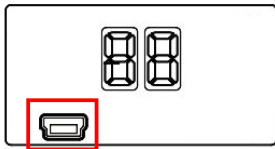
1. Connect the lock to the computer through the USB cable. The nixie tubes show "CO" if the connection is successful.

2. Open the software "User Copy";

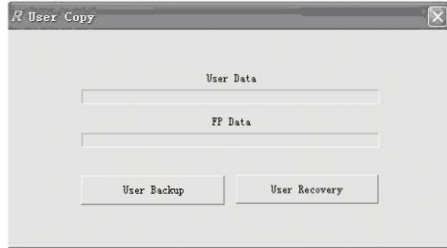


3. Click "User Backup" and select the direction to save the file, then the user data will be transferred to the computer.

User data recovery

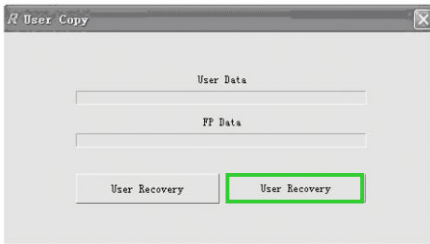


Mini USB



1. Connect the lock to the computer through the USB cable. The nixie tubes show "CO" if the connection is successful.

2. Open the software "User Copy";



3. Click "User Recovery" and select the file in the computer, then the user data will be transferred to the lock.



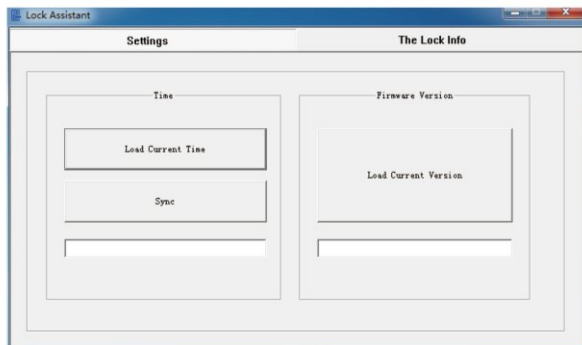
1. The users in the lock will be recovered to the users saved in the file.



2. When the lock is in "Security Mode", it needs master user authorization before operations. The nixie tubes show "AD" for the master user authorization.

14 Software – Lock Assistant

With the “Lock Assistant” software, you can set up the lock and download the unlock records. The software only works with Microsoft Windows XP, 7, 8, and 10 systems.



Setting

This option helps you to check the firmware version in the lock, and set up the time in the lock.

Load Current Time:

The software will transfer the time in the lock and display in the software;

Sync:

The software will transfer the time in the computer to the lock and update the time.

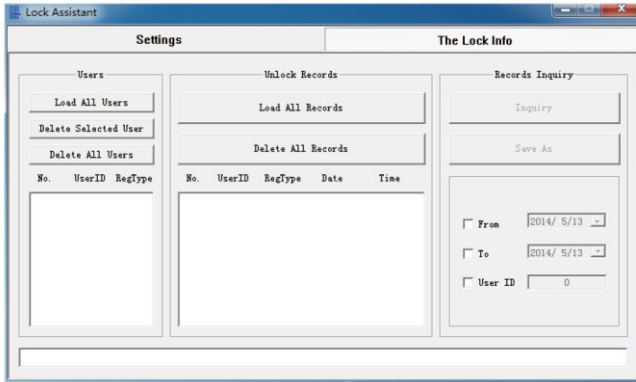
Load Current Version:

The software will transfer the firmware version in the lock and display in the software;

The Lock Info:

This option helps you to download the user data and unlock records to the computer.

Users



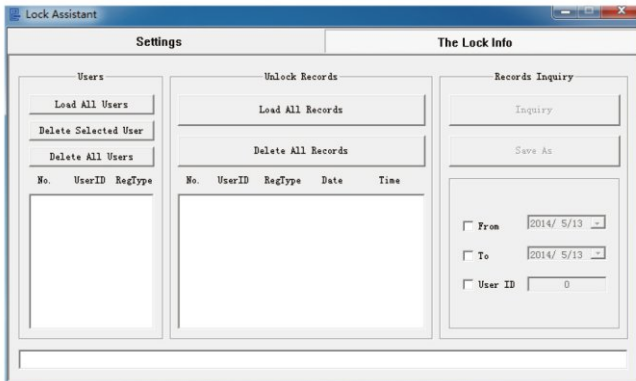
Load all users: download all users in the lock to the computers;

Delete Selected User: delete the user;

Delete All Users: delete all users in the lock, including the normal users and master users.

 **All user data is only stored in this software.**

Unlock Records



Load all records: download all unlock records in the lock to the computer;

Delete All Records: clear all unlock records in the lock;

 **The unlock records are only stored in the software.**

Records Inquiry

If you want to track the unlock records for a single user, select the data and the ID, then the unlock records will be shown in the software.

15 Frequently Asked Questions (FAQs) and Troubleshooting

Q: How long can the lock operate with a set of batteries?

A: The lock can work about 5,000 to 6,000 cycles. If the power is under 4.6V, the keypad will show "Red" light with short "beep - beep" sound every time when it is activated. Then you can understand this is time to change new batteries.

Q: If the lock runs out of power, how can I unlock the lock?

A: There are 2 ways for unlocking:

1. Take out the cylinder cover and insert the mechanical key for unlocking.

You can check the operations in the user manual for option "Mechanical Key Unlocking".

2. Take a 9V battery and connect to the 9V emergency power port under the exterior panel.

Hold the battery and provide power the lock, then you can unlock the lock as usual.

Q: When I place the finger on the sensor, nothing happen in the lock.

A: You can check whether the batteries are out of power, and the batteries are installed in wrong directions. In additional, the lock cable has a loose connection may be the reason for this problem.

Q: I cannot register a user in the lock.

A: First you need to check what mode the lock is under (Normal mode/Security mode). For Security mode, the lock needs the master user authorization before operations.

The nixie tubes show "AD" and wait for the authorization. For Normal mode, check what are the nixie tubes showing, if a ID is flashing, press "Ok" to confirm the ID and then you can operate to next step.

Q: I can unlock the lock anytime without identification.

A: Check whether the lock is under "Passage Mode". Touch the keypad and if the keypad shows "Green" light with sound, it means the lock is under passage mode. You can find the operations in the manual option "Passage Mode" for the details.

Q: The mechanical key cannot unlock the lock.

A: You cannot use the mechanical key to unlock. The correct operation is inserting the key into the cylinder, and turns 180 degree, press down the handle to unlock.

Q: I operate the lock normally and it is working well. After some days, the lock has problem and I cannot do anything.

A: Try to take out the batteries to make the lock stays without power for 5 minutes, then install the batteries again and check. If the lock still has problem, try to restore the lock to factory default and register users again.

Q: For a new lock, all people can unlock the lock without identification.

A: The new lock is under factory default. When you activate the lock, the lock will has "beep – beep" sound and the keypad shows "Red" light before the fingerprint sensor is on. In this case, anyone place the finger on the sensor and input a 8 digits code can unlock the lock.

Q: How can I download the unlock records?

A: Connect the lock with a computer through USB cable, and then open the software "Lock Assistant" to download the unlock records. You can check in the manual option 'Software – Lock Assistant" for details.

Q: Every time when I activate the lock, the lock has sounds but I can unlock.

A: The lock is under low battery power state. Please replace new batteries to the lock as soon as possible.