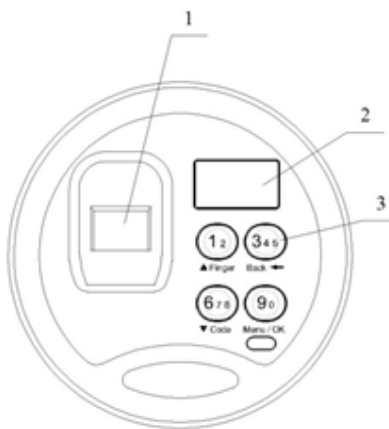


ScanLogic Optical Operating Instructions



Part Number: FPC-0601A



1. Optical Fingerprint Reader
2. LCD Screen
3. Digital Pad

Important:

- **For indoor use only.**
- **Use one 9V alkaline battery. Manufacturer recommends to use Duracell™ or Energizer® Alkaline batteries.**

Always use an alkaline battery for high quality performance.

- **Battery Low Voltage: $5.4 \pm 0.2V$.** The display will alert low battery when battery voltage reaches $5.4 \pm 0.2V$. **PLEASE REPLACE THE BATTERY IMMEDIATELY.**

Note: The voltage is checked during fingerprint verification. If the battery is low, nearing $5.4 \pm 0.2V$, the EntryPad will not allow functions other than unlock. (*Operations, such as enrolling, deleting or time-delay setting, are not permitted until the battery is changed*).

Security level classification

Level 1: EntryPad can be operated by a code.

Level 2: EntryPad must be operated by a fingerprint and its bound code.

Level 3: EntryPad must be operated by a fingerprint or a code.

Note: *Factory default security level is Level 3.*

For safety and security, all codes will be automatically deleted when security level is changed. ID No. 01 code will be default code 1234567890.

As is the case with all biometric safe locks, the UL listing requires operation in Security Level 2 only.

Battery Replacement Instructions

- 1) In the back of EntryPad you will see one 9 V alkaline battery. Take the battery out of the battery compartment. Gently pull on the battery until it drops out.
- 2) Gently remove the connector by unsnapping it from the two terminals on the top of the battery.

Never Pull on the Battery Leads.

- 3) Connect a new 9 V alkaline battery to the battery clip.
- 4) Put the battery and the leads completely back into the battery compartment.

For installation and wiring refer to the installation instructions.

About Default Codes:

The ScanLogic Optical has 1 default code 1234567890. However upon enrollment and use of the first fingerprint (ID01), this default code is deleted. It is important to set a new code relative to this fingerprint.

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1. Lock Set Up

- In the back of EntryPad, you'll find a battery compartment. Install a brand new 9V alkaline battery. It is recommended to use Duracell or Energizer standard alkaline batteries.

2. Opening the Safe Lock System

The safe lock system is shipped in Security Level 3. This means that it can be opened with either an enrolled fingerprint or a valid user code.

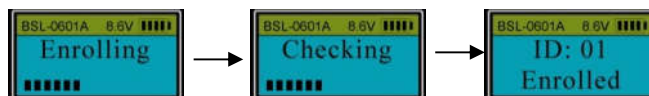
To open the safe lock using the default code, follow these steps:

- Press the button on the EntryPad above the word "Code" (It is the button marked "6 7 8"). This indicates to the safe lock system, that a valid code will be entered in order to operate the safe lock.
- Now enter the default Administrator Code - which is 1234567890
 - **Important** – The ScanLogic Optical has a Multi-Numeric EntryPad which means that a single key on the EntryPad can represent more than one number. In order to enter a "5", press the button marked "345" just once. Likewise to enter a "7", press the button marked "678" just once.
- The lock opens; and after 6 seconds automatically relocks.

To open the lock with a fingerprint, a fingerprint must first be enrolled. See #3 below.

3. Enrolling the first fingerprint (Level 3: FPrint or Code)

- Place your finger on the Optical Fingerprint Reader.
- The LCD screen will show "Start Enrolling First User".
- Hold your finger on the Optical Fingerprint reader through the following display screens:



- This first fingerprint is now enrolled as User ID01. This Administrative (or Manager) Fingerprint is used to access all programming including subsequent fingerprint enrollment.

Note: The default password, 1234567890, will be deleted automatically after the first fingerprint is enrolled and unlocked successfully. Be sure to set a code for User ID01 – See #7- Set/Change User Code.

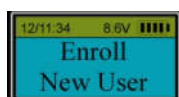
4. Open the Lock using an Enrolled Fingerprint

To open the lock using an Enrolled Fingerprint follow these steps:

- Place your finger on the Optical Fingerprint Reader and hold.
- The LCD screen will display:
 - “Verifying”
 - “IDXX Verified” – indicating the ID number of this user
 - “Door Open 06 seconds”
 - The Lock can now be opened

5. Enroll the second fingerprint (Level 3)

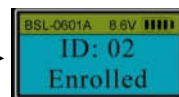
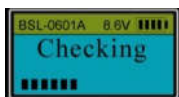
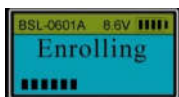
- Unlock the safe lock system with the first enrolled fingerprint.
- After the successful verification, the screen will show “Select Menu”.
- Press “▲” or “▼” to scroll to “Enroll New User”.



Press “Menu/OK” again.



Place your finger (different from the first one) on the fingerprint reader window and hold for the enrollment process to complete.

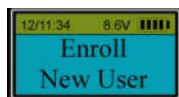


- The second fingerprint, with an ID No. 02, is now enrolled.

Note: ID No. 01 and ID No. 02 are administrators and can be used to perform programming and to enroll additional fingerprints.

6. Enroll additional fingerprints (Level 3)

- Unlock the safe lock system with an administrator's fingerprint (ID No. 01 or 02).
- After successful verification, the screen will show “Select Menu”.
- Press “▲” or “▼” to scroll to “Enroll New User”.

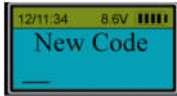


Press “Menu/OK” again.

- Place another finger on the fingerprint reader window and hold for the enrollment process to complete.
- The additional fingerprint is now enrolled as the next available User ID#

7. Set/Change User Code (Level 3)

- Unlock the safe lock system with an administrator's fingerprint (ID No. 01 or 02).
- After successful verification, the screen will show "Select Menu".
- Press "▲" or "▼" to scroll to "Set/Change User Code"
- Press "Menu/Ok".



Enter a code (10 digits).



Enter the same code again.

- Now the new code is set or changed successfully.

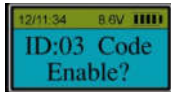
Note:

- Administrators' code can be set or changed using the method described above.
Non-administrators' codes (ID03-ID30) must be enabled by the administrator first, then, the user can set or change their own code.

8. Enable and Set User Code (Level 3)

This programming step is necessary to allow a User to have code access in addition to fingerprint access.

- Unlock the system with an administrator's fingerprint (ID No. 01 or 02).
- The LCD will display "Select Menu"
- Press "▲" or "▼" to scroll to "Enable User code", press "Menu/Ok".



Press "▲" or "▼" to select the ID No. to be enabled.



Press "Menu/Ok"

- In the example, the User ID No.3 code is enabled and is ready to be programmed.

To Program or "Set" the User Code:

- Unlock the safe lock system with the fingerprint of ID No.03.
- The LCD will display "Select Menu"
- Press "▲" or "▼" to scroll to "Set/Change User Code".

- Press “Menu/Ok”.



Enter a new code (10 digits).



Enter the same code again.

- The LCD will display ID:03 Code Saved.
- ID03 Code can now be used to unlock the safe lock system.

9. Disable User Code (Level 3)

This programming step is necessary to disable a User's code access. It does not delete the User's enrolled fingerprint.

- Unlock the system with an administrator's fingerprint (ID No. 01 or 02).
- The LCD will display “Select Menu”
- Press “▲” or “▼” to scroll to “Disable User Code”
- Press “Menu/Ok”.



Press “▲” or “▼” to select the user ID need to be disabled.

Press “Menu/Ok”

The code of ID No.3 is disabled.

Note: This function simply disables the user's code. It does not disable or delete the enrolled fingerprint associated with this ID#. To delete a fingerprint see #17 – Delete User.

10. Disable User (Level 3)

This programming step is necessary to disable a User's access rights both fingerprint and code. It does not however delete the fingerprint or code but temporarily disables the fingerprint and code. To delete a fingerprint see 17. Delete User

- Unlock the system with an administrator's fingerprint (ID No. 01 or 02).
- The LCD will display “Select Menu”
- Press “▲” or “▼” to scroll to “Disable User”.



Press “▲” or “▼” to select the ID No. to disable (e.g. ID 03).

Press “Menu/OK”.

Both the code and fingerprint enrolled as ID03 are now disabled.

Note: Administrators cannot be disabled.

11. Enable User (Level 3)

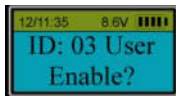
This programming step is necessary to enable a User's access rights - both fingerprint and code. This step would be performed after a User has been "Disabled" – See #9 Disable User.

- Unlock the system with an administrator's fingerprint (ID No. 01 or 02).
- The LCD will display "Select Menu"
- Press "▲" or "▼" to scroll to "Enable User".

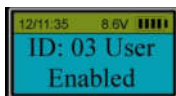


Press "Menu/OK".

Press "▲" or "▼" to select the ID No. to enable (e.g. ID 03).



Press "Menu/OK".



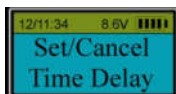
Now the No. 03 user is enabled.

12. Set time delay (Level 3)

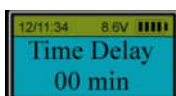
Time Delay is security protocol used to deter burglary. Provided the prospective burglar has knowledge that a Time delay safe is in use, the likelihood of burglary is greatly reduced.

Time Delay is a feature that requires the User present an enrolled fingerprint or enter a valid code, wait a prescribed period of time, and then present an enrolled fingerprint or enter a valid user code again to gain access.

- Unlock the system with an administrator's fingerprint (ID No. 01 or 02).
- The LCD will display "Select Menu"
- Press "▲" or "▼" to scroll to "Set/Cancel Time Delay".



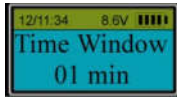
Press "Menu/OK".



Press "▲" or "▼" to set time delay (00 to 99 min).

Press "Menu/OK".

The system will now prompt you to enter the Time Window value (in minutes)



Press “▲” or “▼” to select Time Window (01 to 15 min).

Press “Menu/OK”.

The Time Delay feature has now been set successfully.

Notes related to Time Delay operations:

- During Time Delay period, programming operations (such as enrolling, deleting users etc.) can be accomplished. The lock however will remain locked.
- Time Delay Override: User ID01 and 02 are Time Delay Override Codes. These codes can be used to override the time delay and gain access immediately.
- After the original time delay is re-programmed, the new time delay setting will go into effect after the first successful unlock cycle.

13. Time Delay - Unlock with an enrolled fingerprint (Level 3)

In order to unlock a safe lock that has been programmed with Time Delay, follow these steps:

- Place an enrolled finger on the fingerprint reader to verify.
- The fingerprint will be verified and then the LCD will display “Time Delay Start”

For example:

Time Delay is set 10 minutes and Time Window 5 minutes.

- Place an enrolled finger (ID: 03) on the fingerprint reader window and hold until the LCD shows:



- The EntryPad will start counting up.
- The LCD screen flashes with the elapsed time every 15 seconds.
- When Time Delay finishes counting, two beeps will sound and the LCD screen will show:



- The EntryPad will start counting down.
- The LCD screen flashes with remaining time every 15 seconds.
- Since the Time Window has been set as 5 minutes in this example, a valid

fingerprint or code must be presented during the 5 minute Time Window to unlock the EntryPad.

- The LCD will display:



- If an enrolled fingerprint is not presented and verified during the Time Window period, the safe lock will remain locked. The Time Window will continue to countdown and until the end, and then the LCD will show:



Note:

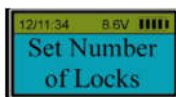
User ID01 and 02 are Time Delay Override (TDO) codes. This means that these Users can bypass or override any Time Delay settings, and the lock will open immediately..

14. Time Delay - Unlock with a User Code (Level 3)

Follow the same procedure as above, but instead of presenting an enrolled fingerprint enter a valid User code. Remember to press the button marked “Code” to indicate that you will be entering a code

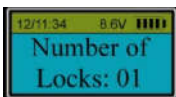
15. Set number of locks (Level 3)

Unlock with an administrator’s fingerprint (ID No. 01 or 02).When the LCD shows “Select Menu”, press “▲” or “▼” to select “Set number of locks”.



Press “Menu/OK”.

Enter Mfc. code. 9316961396



Press “▲” or “▼” to set number of locks.

The default number of lock is 01.

If setting the number of locks to be 02, 03 or 04, after the EntryPad verifies user successfully, push “12” to unlock Lock 1, or push “345” to unlock Lock 2, or push “678” to unlock Lock 3, or push “90” to unlock Lock 4.

If setting the number of locks to be 01, after the EntryPad verifies user successfully, the

lock will open directly.

Note: If Security Level is changed or system is recovered, the number of locks will remain.

16. Authorize access to locks (Level 3)

Unlock with an administrator's fingerprint (ID No. 01 or 02). When the LCD screen shows "Select Menu", press "▲" or "▼" to select "Authorize Locks".



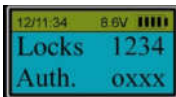
Press "Menu/OK".



Press "▲" or "▼" to set the first ID in the group of users to be authorized. Press "Menu/OK".



Press "▲" or "▼" to set the last ID in the group the users to be authorized. For example, to authorize users with ID No. from 03 to 05, press "Menu/OK".



"Lock 1234" indicates the number of the available locks.

"Auth. oxxx" indicates which lock(s) have been authorized to open by the group. Letter "o" means the group is authorized to open the lock.

Letter "x" means the group is not authorized.

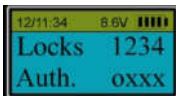
When one letter flashes, press "▲" or "▼" to set "o" or "x".

If you set this option incorrectly, press the "Back" button, the left letter will flash again and it can be reset.

Note: Administrators (ID No. 01 and 02) can open all locks.

For example, to authorize users with ID No. 03, 04 and 05 to be able to open only Lock 2:

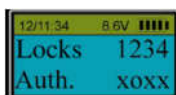
When the LCD screen shows:



The first letter "x" is flashing. Press "▲" or "▼" to toggle this letter to "x". Press "Menu/OK".

The second letter will flash. Press "▲" or "▼" to toggle this letter to "o". Press "Menu/OK".

Press "Menu/OK" twice to confirm the condition of Lock 3 and 4.



The authorization has been set successfully. Users with ID No. 03, 04 and 05 can open only Lock 2.

17. Delete One User (Level 3)

Unlock with an administrator's fingerprint (ID No. 01 or 02). When the LCD screen shows "Select Menu", press "▲" or "▼" to select "Delete One User".



Press "Menu/OK". Press "▲" or "▼" to select the ID No. to delete (e.g. ID 03).



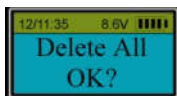
Press "Menu/OK".



Now No. 03 user is deleted.

18. Delete All Users (Level 3)

Unlock with an administrator's fingerprint (ID No. 01 or 02). When the LCD screen shows "Select Menu", press "▲" or "▼" to select "Delete All Users".

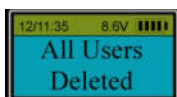


Press "Menu/OK" again.

The EntryPad starts deleting users from ID No. 01 to ID No. 30.



.....

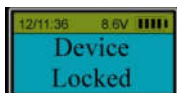


Note: After deleting all users, all the enrolled fingerprints and codes are deleted completely.

The Administrators Code is reset to 1234567890

19. Wrong entry penalty (Level 3)

Four (4) consecutive invalid code entries initiate a 4-minute penalty time. The LCD will show:



The EntryPad is shut down and no operation is permitted.

Then, the EntryPad will start counting down with the LCD flashing the remaining time every 15 seconds. For example:



After the count down is finished, the EntryPad is ready to use again.

Note: Two more consecutive invalid codes will restart an additional 4 minutes delay period. An attempt to unlock by an enrolled fingerprint will not terminate the delay period. Incorrect fingerprint entries will not initiate penalty time.

20. Set Security Level

The ScanLogic Optical has 3 security modes as follows:

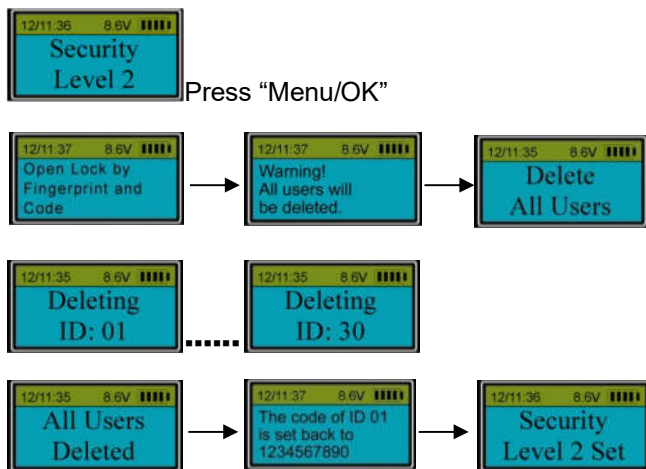
Level 1: EntryPad can be operated by a code.

Level 2: EntryPad must be operated by a fingerprint and its bound code.

Level 3: EntryPad must be operated by a fingerprint or a code.

Unlock with an administrator's fingerprint (ID No. 01 or 02). When the LCD screen shows "Select Menu", press "▲" or "▼" to select the security level you require.

For example, to set the Security Level to Level 2, find and select Security Level 2.



Follow the same steps to set to Level 1.

Note:

After Security Level is changed, the number of locks will not be changed.

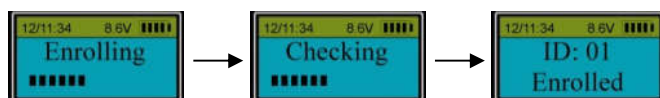
When security level is changed, all fingerprints and codes will be deleted.

The code of ID No.01 will be 1234567890.

21. Enroll the first fingerprint and its bound code (Level 2)

In Security Level 2, the system will guide you through the fingerprint enrollment process immediately followed by the code setting process.

Place your finger on the fingerprint reader window and hold.



The first fingerprint with an ID No. 01 is enrolled.



Enter a code (10 digits).



Enter the same code again.

When the screen shows “ID 01 Code Saved”, the first fingerprint and its bound code with ID No. 01 are enrolled successfully.

Note: The default password (1234567890) will be deleted automatically after the first fingerprint and code are enrolled successfully.

22. Enroll the second or additional fingerprints and bound code (Level 2)

Unlock with an administrator’s fingerprint and code .When the LCD screen shows “Select Menu”, press “▲” or “▼” to select Enroll New User.

Follow the same steps as to enroll the first administrator’s fingerprint and code to complete the enrollment.

23. Set/Change the first code (Level 1)

Unlock with the default code (1234567890). When the LCD screen shows “Select Menu”, Press “▲” or “▼” to select “Set/Change User Code”, enter the 10-digit new code.

Note: Follow the same steps to change any valid code.

24. Enroll the second or additional codes (Level 1)

Unlock with the code of ID 01, When the LCD screen shows “Select Menu”, press “▲” or “▼” to select “Enroll New User” , Press “▲” or “▼” to select ID No. and set new codes .

25. Disable / Enable User (Level 1 & 2)

Unlock by an administrator (ID 01 or ID 02) .When the LCD screen shows “Select Menu”, Follow the steps on Pages 6-7 to disable or enable a user.

26. Set time delay (Level 1 & 2)

Unlock by an administrator (ID 01 or ID 02). When the LCD screen shows “Select Menu”, Follow the steps on Pages 10—12 to set time delay.

27. Unlock with an enrolled user (Level 1 & 2)

Place an enrolled finger on the reader window and/or enter an enrolled code. Refer to example on Page 3.

28. Set number of locks (Level 1 & 2)

Unlock by an administrator (ID 01 or ID 02). When the LCD screen shows “Select Menu”, press “▲” or “▼” to select “Set number of locks” and follow the steps on Page 10.

29. Authorize access to locks (Level 1 & 2)

Follow the steps on page 10.

30. Delete one user / all users (Level 1 & 2)

Follow the steps on page 11-12.

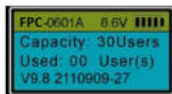
31. Wrong entry penalty (Level 1 & 2)

Follow the steps on page 12.

32. System info.

Press “Menu/OK”. The screen will show “Select Menu”. Press “▲” or “▼” to select “System INFO.”

Press “Menu/OK” and the LCD will show:



This indicates that up to 30 users can be enrolled in the EntryPad and there is no user enrolled currently. The EntryPad firmware version is V9.82110909-27.

33. Specifications:

- Fingerprint Sensor: 500 DPI optical sensor
- Verification Time: < 1 second
- Registration Capacity: 30 fingerprints + 30 codes
- FRR (False Rejection Rate): <0.1%
- FAR (False Acceptance Rate): <0.0001%
- Code length: 10 digits
- Static current: < 50μA (Typical)
- Power supply: one standard 9V Alkaline battery
- Battery Life Span: About 1 year
- Batter Low Voltage: 5.4± 0.2V
- Working Temperature: 0°C ~ + 49°C
- Fingerprint Reader Dimension:
 - 6" (L) x 2-12/16" (W) x 1-11/16" (T)
- Working Humidity (Max): 90%

SecuRam Systems, Inc. U.S.A.