7-STAR

F18 fingerprint reader fingerprint access control to exit and enter the full access control door system with software

F18

Fingerprint Standalone Access Control

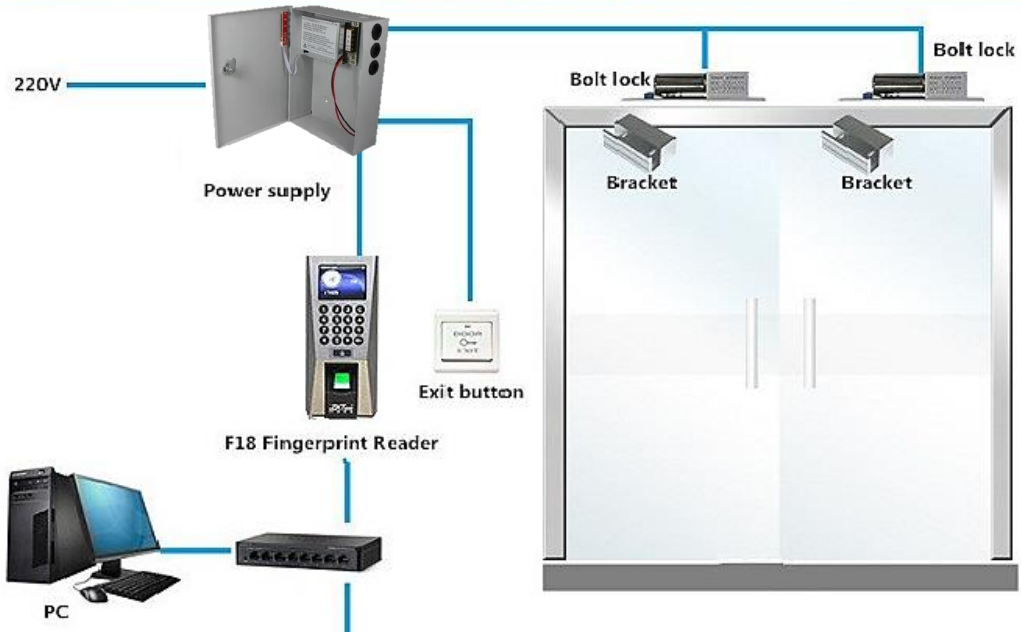
F18 is an innovative biometric fingerprint reader for access control application, offering unparalleled performance by using an advanced algorithm for reliability, precision and excellent matching speed. The F18 features the fastest commercial-based fingerprint matching algorithm and ZK high-performance, high-image quality infrared detection fingerprint sensor. The device offers flexibility to be installed standalone or with any third party access control panels that support standard Wiegand signal. All the operation can be done on the TFT-LCD color screen. The fingerprint image will be displayed on it. That will guide user to put finger on proper position and increase recognition rate. TCP/IP and RS485 are available that the device can be used in different network.

Features

- ***TFT-LCD color screen***
  - Audio-visual indication for acceptance and rejection of valid/invalid fingerprints
  - More simple and convenient operation
- ***Slim and elegant design***
  - Streamlined and slim design for narrow spaces
- ***Fast and accurate fingerprint algorithm***
  - User recognition in 1 second
  - Store 3,000 fingerprint templates and 30,000 transactions
- ***Easy installation and connectivity***
  - Wiegand input & output
  - Network interface by TCP/IP or RS485
- ***Full access control features***
  - Webserver
  - Anti-passback
  - Access control interface for 3rd party electric lock, door sensor, exit button, alarm
- ***Easy operation and management***
  - Work with computer
  - Buzzer, 4×4 keypads and doorbell
  - Built-in serial and Ethernet ports
  - Built-in USB port allows for manual data transfer

7-STAR


Latest Fingerprint Algorithm Access Control
Big capacity
Low FAR
High Speed
Fingerprint
TCP/IP
Linux
Linux System
Alarm
Color
TFT
screen
Color Screen
U-Disk


220V
Power supply
Bolt lock
Bolt lock
Bracket
Bracket
Exit button
F18 Fingerprint Reader
PC

7-STAR

Introduction:

F18 is an innovative biometric fingerprint reader for access control applications, offering unparalleled performance using an advanced algorithm for reliability, precision and excellent matching speed. The F18 features the fastest commercial-based fingerprint matching algorithm and high-performance, high-image quality optical fingerprint sensor. The device offers the flexibility to be installed standalone or with any third party panel that supports 26-bit Wiegand. All the operation can be done on the TFT-LCD. The fingerprint image will display on the screen . That will guide the user to put the finger on to proper position and increase the recognition rate.

TCP/IP and RS485 are available that the device can be used in different network.

7-STAR


User Mng
Comm.
System
Date/Time
PenDrive
Auto Test
Record
Sys Info
1
2
3
C
4
5
6
7
8
9
0
M/OK

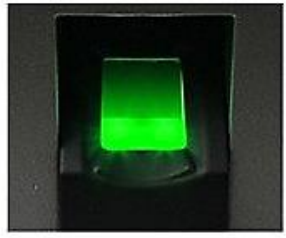
7-STAR

7-STAR

LED indicator

Manual Screen

Keypad



Fingerprint Sensor

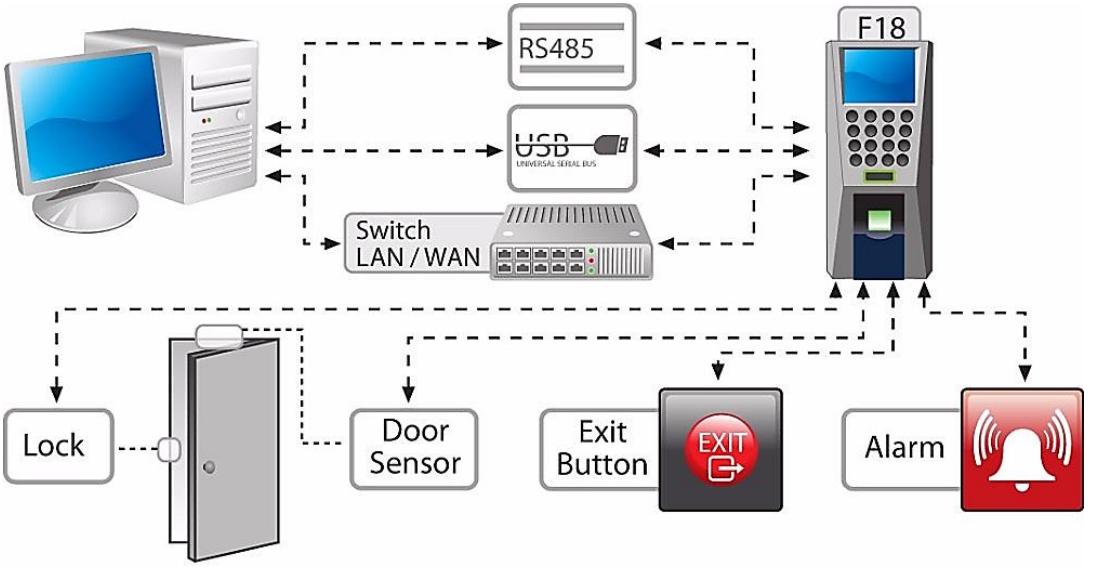
USB port

Doorbell

Speaker

7-STAR

7-STAR


RS485
USB
UNIVERSAL SERIAL BUS
Switch
LAN / WAN
F18
Lock
Door
Sensor
Exit
Button
EXIT
Alarm

7-STAR

F 18

Standalone Fingerprint Reader Controller

Modern standalone fingerprint controller with color display

Biometric Performance:

Reliable, durable and highly accurate ZK fingerprint sensor with latest fingerprint matching algorithm which provides less than 1.5 second user recognition.

Communication:

Weigand output for connecting to access control panel and Ethernet port for fast and reliable communication with the computer

Easy Operation and Management:

Works without computer. Complete setup and programming can be done via keypads and embedded firmware. Audio-Visual Indication for acceptance and rejection of valid/invalid fingerprints, cards and passwords.

Options:

Internal Proximity Card or Mifare Card reader allows dual factor authentication for access control.

Full Access Control Built In:

Relay Outputs for electric lock and alarm. Inputs fordoor status sensor and request to exit hardware. Supports multipletimezones and personnel groups for programming valid entry zones.

Capacity:

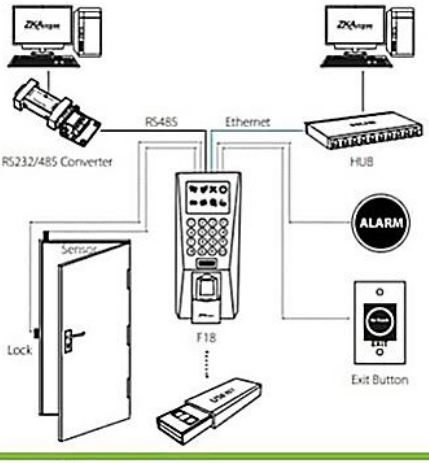
Can store up to 3,000 templates and 30,000 transactions. The data can be backed up to a USB flash drive and can also be transferred to another reader in the absence of computer connectivity.

For Software Developers:

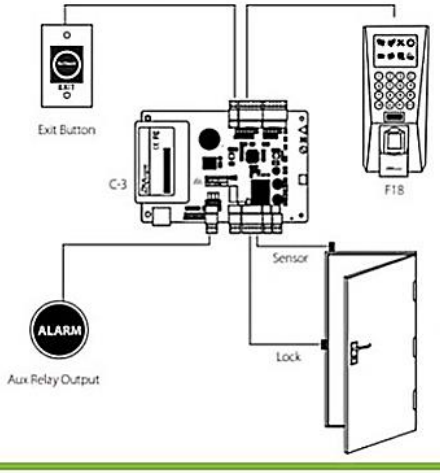
Free SDK and development tools are available for developers/partners who wish to integrate F18 with any application which requires verifying people. Custom development is also available for OEM partners upon request.

7-STAR

Standalone Installation



Installation with Access Control Panel



Specifications

Capacity
Fingerprint: 3,000 templates
Transactions: 30,000

Display
3.5in TFT LCD Color Display

Communication
Ethernet, Weigand Input and Output, RS485, USB Host

Access Control Interface
3rd party electric lock, Door sensor, Exit button, Alarm, Door bell

Power
12V DC, 3A

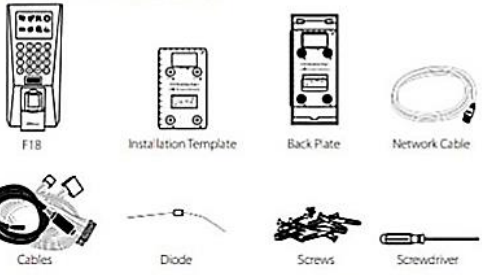
Environment
Operating Temperature: 32º to 113º F (0º to 45º C)
Operating Humidity: 20% to 80%

Supported Options
ID Card, Mifare Card

Dimensions
Height: 7.20in (18.3cm)
Length: 3.15in (8.0 cm)
Width: 1.65in (4.2 cm)
Weight: 0.90lbs (0.41kg)

Part Numbers
F18

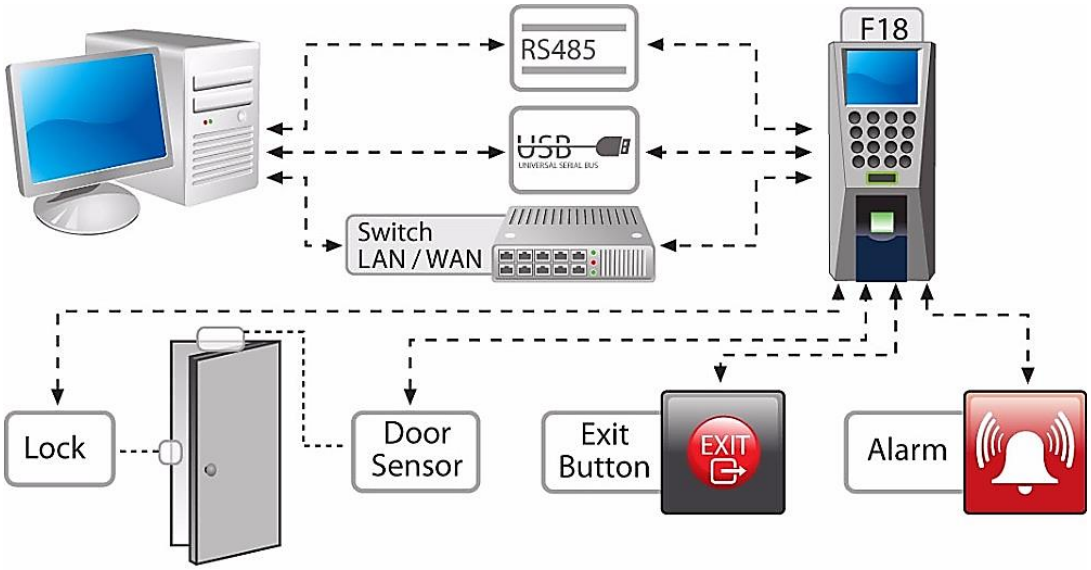
What's in the Box



CE FC RoHS

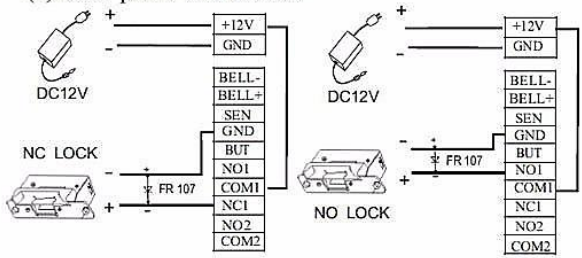
Design and Specifications subject to change without notice

7-STAR



3. Lock Connection

(1) Share power with the lock:

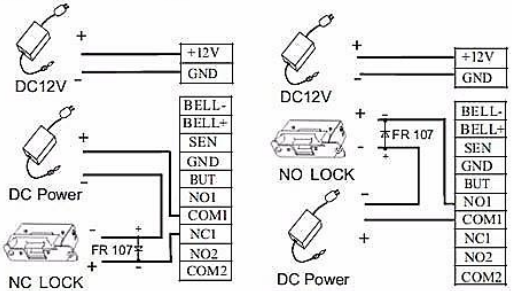


Device shares power with the lock:

U_{LOCK}=12V, $I\text{-}I_{LOCK}$>1A··· ①

And the distance between the lock and the device is equal or less than 10 meters.

(2) Does not share power with the lock:



Does not shares power with the lock:

A. U_{LOCK}=12V $I\text{-}I_{LOCK}\leqslant$1A;

B. $U_{LOCK}\neq$12V;

C. The distance between the lock and the device is more than 10 meters.

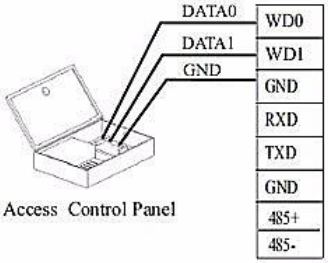
(1) The system supports NO LOCK and NC LOCK. For example the NO LOCK (normally open at power on) is connected with 'NO' and 'COM' terminals, and the NC LOCK(normally close at power on) is connected with 'NC'and 'COM' terminals.

(2) When the Electrical Lock is connected to the Access control System, you need to parallel one FR107 diode (equipped in the package) to prevent the self-inductance EMF affecting the system, **do not reverse the polarities.**

7-STAR

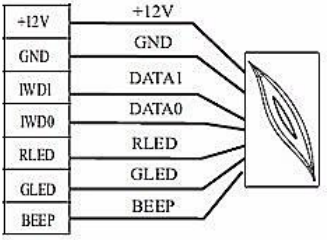
6. Wiegand Output

The device supports standard Wiegand 26 / Wiegand 34 output, so you can connect it with most of the access control devices by now.



7. Wiegand Input

The device has the function of Wiegand signal input. It supports to connect with an independent card reader. They are installed each side of the door, to control the lock and access together.

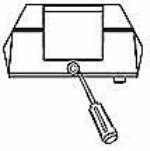


(1) Please keep the distance between the device and access control or card reader less than 90 meters (Please use Wiegand signal extender in long distance or interference environment).

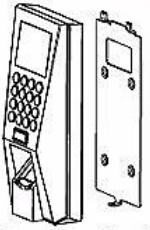
(2) To keep the stability of Wiegand signal, connect the device and the access control or card reader in same 'GND' in any case.

1. Equipment Installation

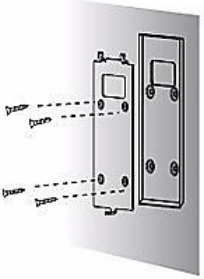
(1) Post the mounting template on the wall. Drill the holes according to the marks on the template (holes for screws and wiring).



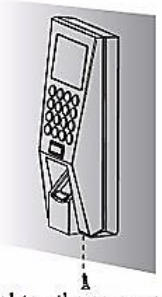
(2) Remove the screw on the bottom of device.



(3) Take away the back plate.

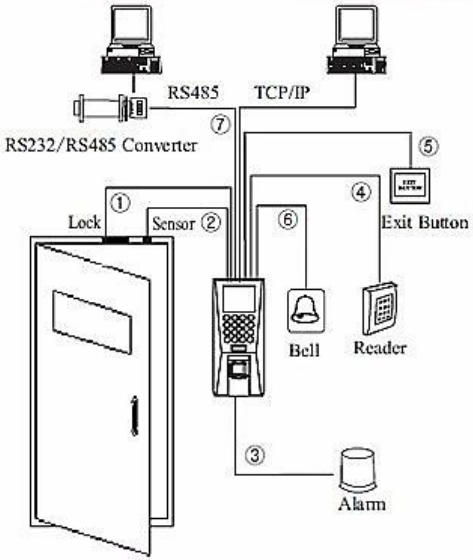


(4) Fix the plastic pad and the back plate on the wall according to the mounting paper.



(5) Tighten the screw on the bottom, fix the device to the back plate.

2. Structure and Function



Access Control System Function

(1) If a registered user verified, the device will export the signal to unlock the door.

(2) Door sensor will detect the on-off state If the door is unexpected opened or improperly closed, the alarm signal (digital value) will be triggered.

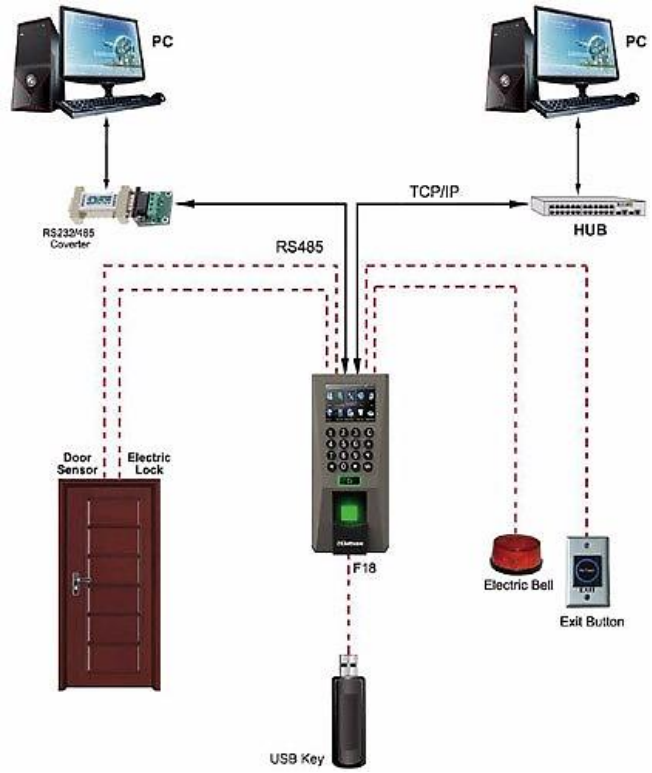
(3) If the device is removed illegally, it will output an alarm signal.

(4) External card reader is supported.

(5) External exit button is supported, it is convenient to open the door inside.

(6) External door bell is supported.

(7) Supports RS485, TCP/IP modes to connect with PC. One PC can manage multiple devices.



7-STAR

Features:
Fingerprint reader with durable and highly accurate optical sensor
1 touch a-second user recognition
Stores 3,000 templates,100,000 transactions
Reads Fingerprint and/or Card
Optional integrated smart card reader
Built-in Serial and Ethernet ports
Tamper-proofs switch and alarm outputs
Request-to-exit and alarm contacts
Audio-Visual indications for acceptance and rejection of valid/invalid fingers

Specifications:
Fingerprint Capacity:3000 templates
ID/IC card Capacity:Optional
Transaction Capacity:100,000
Sensor: Optical Sensor
Algorithm Version: Finger v10.0
Communication:RS232/485, TCP/IP, USB-host
Access Control Interface for:3rd party electric lock, door sensor, exit button, alarm, Door Bell
Wiegand Signal: Output and Input
Display:TFT LCD Screen
Standard function:Webserver, DLST
Optional function:MF card
Power Supply:12V DC
Operating Temperature:0 C- 45C
Operating Humidity:20%-80%
Operating Temperature:0 C- 45C
Operating Humidity:20%-80%