**Picture 1: Communication port selection and baud rate changes**

1. Select COMM interface
2. Modify the current Baud Rate (19200 by default)

2.1 Select parameter 19200;

2.2 Select “Modify”

1. Modify Baud Rate of the module (19200 by default)

3.1 Modify parameter as 19200, can be arranged from 9600 to 115200

3.2 Send command. After modified, the parameter in 2.2 will be the parameter selected in 3.1

**Picture 2 Fingerprint adding**

1. Select command “User input”
2. Acquire twice: It is three times by default, but only need to acquire twice when select it

Upload eigenvalue: When select, it will acquire and upload at the same time; If not, only acquire, won’t upload;

ID number adds 1 automatically: When select, it will add 1 to User ID number; If not, won’t add 1, need to modify manually.

1. User ID, such as: 0102
2. User privilege: 1-3 such as Privilege 1
3. Send commands
4. Press the same finger on the sensor for 2-3 times
5. Add successfully
6. Eigenvalue upload
7. Save the uploaded eigenvalue as .fea document.

**Picture 3 Fingerprint 1:1 comparison**

1. Select command
2. Fill in the parameter, User ID:0002
3. Send command
4. Press finger
5. Compare the results

**Picture 4 Fingerprint 1:N comparison**

1. Select command
2. Send commands
3. Press finger
4. Compare the result: No.02 User

**Picture 5 Fingerprint image acquisition**

1. Select command
2. Send command
3. Press finger
4. Add successfully
5. Image data
6. Acquired fingerprint image

**Picture 6.1 Specified user characteristic values uploaded**

1. Select command
2. Fill in the parameters
3. Send command
4. Upload successfully
5. Current fingerprint eigenvalue data
6. Save eigenvalue

**Picture 6.2 Fingerprint characteristic value uploaded**

1. Select command
2. Send command
3. Press finger
4. Upload successfully
5. Display eigenvalue data
6. Save eigenvalue data

**Picture 7.1 Download the fingerprint to the module**

1. Select command
2. Select eigenvalue document needed, such as A2.Fea
3. Fill in saved User ID and privilege, such as No. 0003, the privilege is 1
4. Send command
5. Operate successfully

**Picture 7.2 Double fingerprint download & collecting fingerprints comparison**

1. Select command
2. Select eigenvalue document, such as A2.Fea and A2.Fea.Fea
3. Send command
4. Press finger, any fingerprint of A2.Fea and A2.Fea.Fea

Note: Two document name, and need to in the same directory

1. Compare the results

**Picture 8.1 Acquire module version number**

1. Select command
2. Send command
3. Report current version number

**Picture 8.2 Acquire module total capacity**

1. Select command
2. Choose “capacity”
3. Send command
4. Return total capacity of the module

**Picture 8.3 Acquire user information**

1. Select command
2. Send command
3. Current User ID and privilege

**Picture 8.4 Acquire total number of users**

1. Select command
2. Send command
3. Return: Total amount of the users is 3

**Picture 8.5 Module security level setting**

1. Select command
2. Fill in parameter modified into level, such as modify to level 3, that is 3,0
3. Send command
4. Return the level 5 before the modification

**Picture 9 Program upgrade**

1. Select document 28000 in the upgrade packet
2. Select document 38000 in the upgrade packet
3. Chick to download

Note:

1. Related upgrade documents and professional guidance are required for this upgrade operation.
2. Our company won't take responsibility and repair the module for reason of upgrade without permission or loss program in the module by upgrading incorrect document.