



GTW-RFCD

Guard Tour Patrol System

Patrol Beacon Tool Operation Guide

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Documentation Information

This section describes the conventions and revision history of this document.

Documentation Conventions

Icon Conventions

Icon	Description
 Tip	Indicates information that can help you make better use of your product.
 Note	Indicates references that can further describe the related topics.
 Caution	Indicates situations that could cause data loss or equipment damage.
 Warning	Indicates situations that could cause minor personal injury.
 Danger	Indicates situations that could cause major personal injury or even death.

Notation Conventions

Item	Description
“ ”	The quotation marks enclose the name of a software interface element. For example, click “OK”.
【】	The text in boldface denotes the name of a hardware button. For example, press the 【PTT】 key.
->	The symbol directs you to access a multi-level menu. For example, to select “New” from the “File” menu, we will describe it as follows: “File -> New”.

Revision History

Version	Release Date	Description
V2.0.00	2016-9-25	Initial release.

1. Program Update

1.1 Communication Status



4 连接电脑 Select menu 4 Computer of the main interface of the patrol beacon tool, then the tool enters into the communication status, and waits for the command sent by the computer communication software.



1.2 Communication Wire Connection

Insert the two ends of the USB antenna into the patrol beacon tool and computer.



1.3 Drive Installation

The first time connect to the computer, it would show hardware and request drive installation. The installation method is the same with general USB installation method. For 32-bit system, the drive can be installed directly. For 64-bit system, drive installation requests digital signature or disable digital signature. See the drive package for more details.



1.4 Using Communication Software

Locate the CLComm file as shown in the figure below.



Double click the CLComm, find the software upgrade path as shown in the figure. Click the file named Program.rom, and then click Download.



Using communication software can synchronize the computer files with patrol beacon tool files. The program can be provided from us, or developed by yourself.

1.5 Running Program



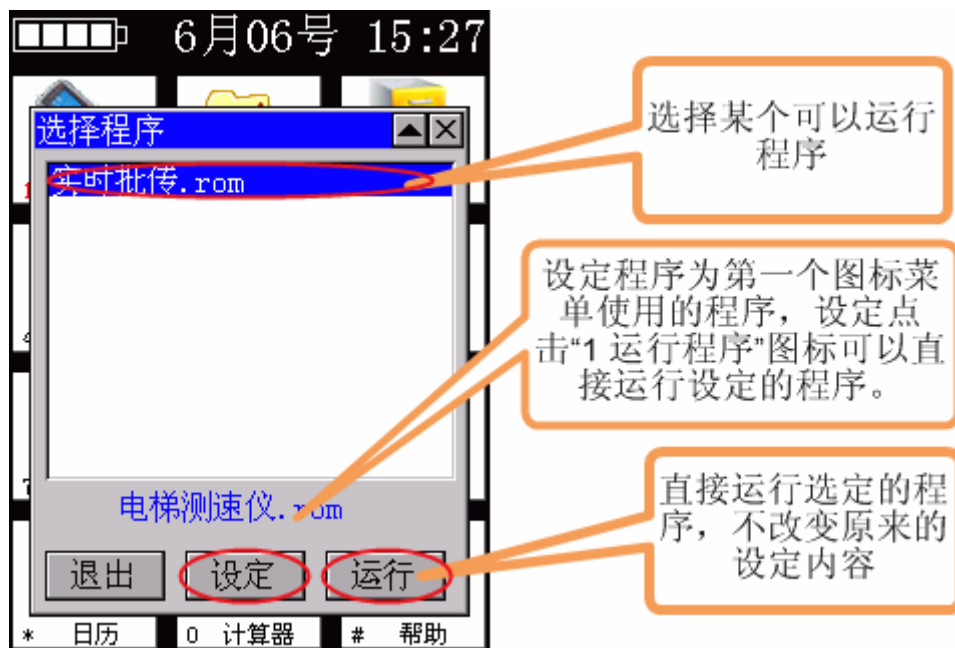
If the needed program has been installed, click **1. 运行程序** to run directly. Or you can click **2. 选择程序** to set up. See the details below.



1.6 Specific Program Running Setting



Click the second menu 2 选择程序 , and select the program that you need to run. Click the running button at the lower right for program running. After the specific program setting, you can run the program in the first icon menu.



1.7 Automatic Running Setting

In the system setting page, select operation page, check the automatic running function. If you want to

go back to the main program interface, you can hold down the Ent button and don't loosen it, and then click the reset key with green tip.



2. Beacon Tool Setting

2.1 Beacon Setting

The beacon tool can be powered on through the green button at lower left. Enter the main interface and click beacon for setting, the process is as followed:

1、 Select the ID for setting in ID column, click Connect.

2、 New ID number: all the ID numbers of beacons need to be modified. The number increase continuously from 1 to 2000.

3、 Power: the power of beacon is adjustable according to the actual need.

4、 Sleep time: 2 seconds by default. The beacon will awake and broadcast its ID one time every 2 seconds.

5、 Connection cycle: 20 seconds by default and can be set as needed.

Click Write Parameter finishing parameters setting. Click Exit Setting for another beacon setting.

Note: The ID number and the installation path shall be recorded into the system.

Note: The communication overlapping area of beacons is forbidden when employing beacons.

Chart: Beacon power setting and coverage distance comparison table.

Output Power	Communication Distance	Note
4dbm	44m—45m	
0 dbm	37m—40m	
-4 dbm	23m—30m	
-8 dbm	22m—27m	
-12 dbm	7m—10m	
-16 dbm	4m—7m	
-20 dbm	2m—3m	
-30 dbm	0. 2m—0. 3m	

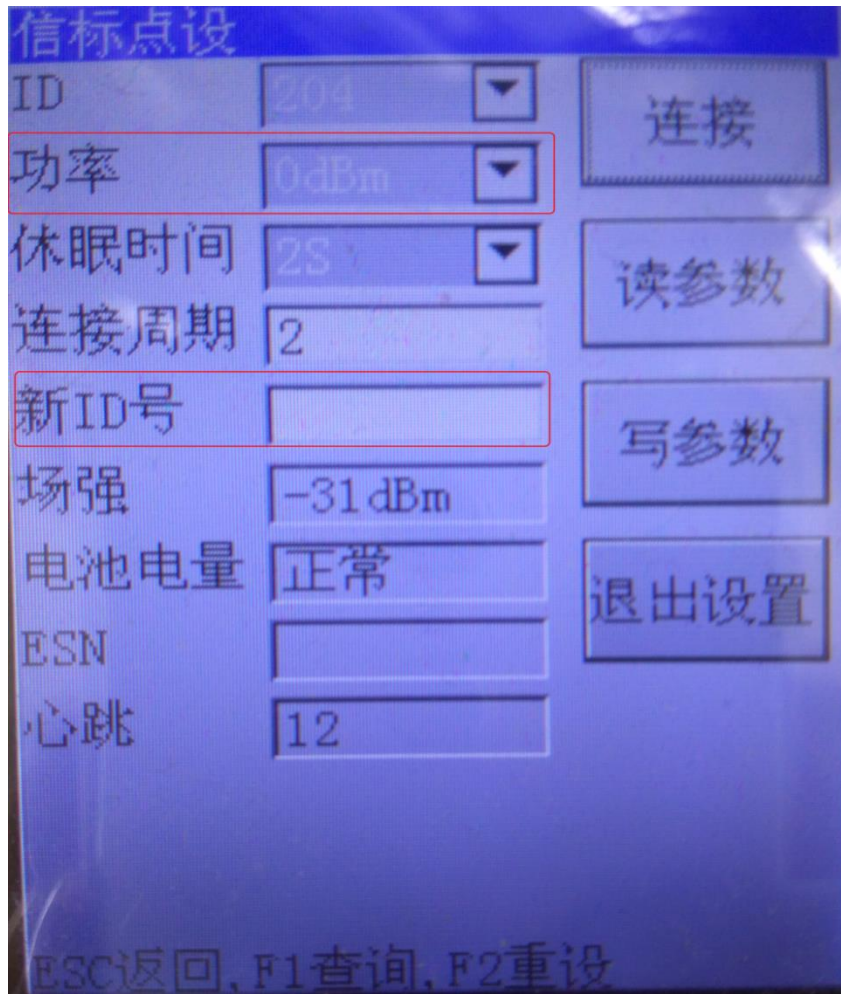


Fig. Beacon parameters setting

2.2 Convention Radio Setting

- 1、Boot beacon tool, enter the “Convention Radio” page
- 2、Boot the radio (the radio will only connect with beacon tool during the boot process)

Parameters modified as followed:

- 1、Grouping plan: according with system grouping plan.
- 2、Channel number: 15
- 3、Center ID: 5000, ID number for message link machine.

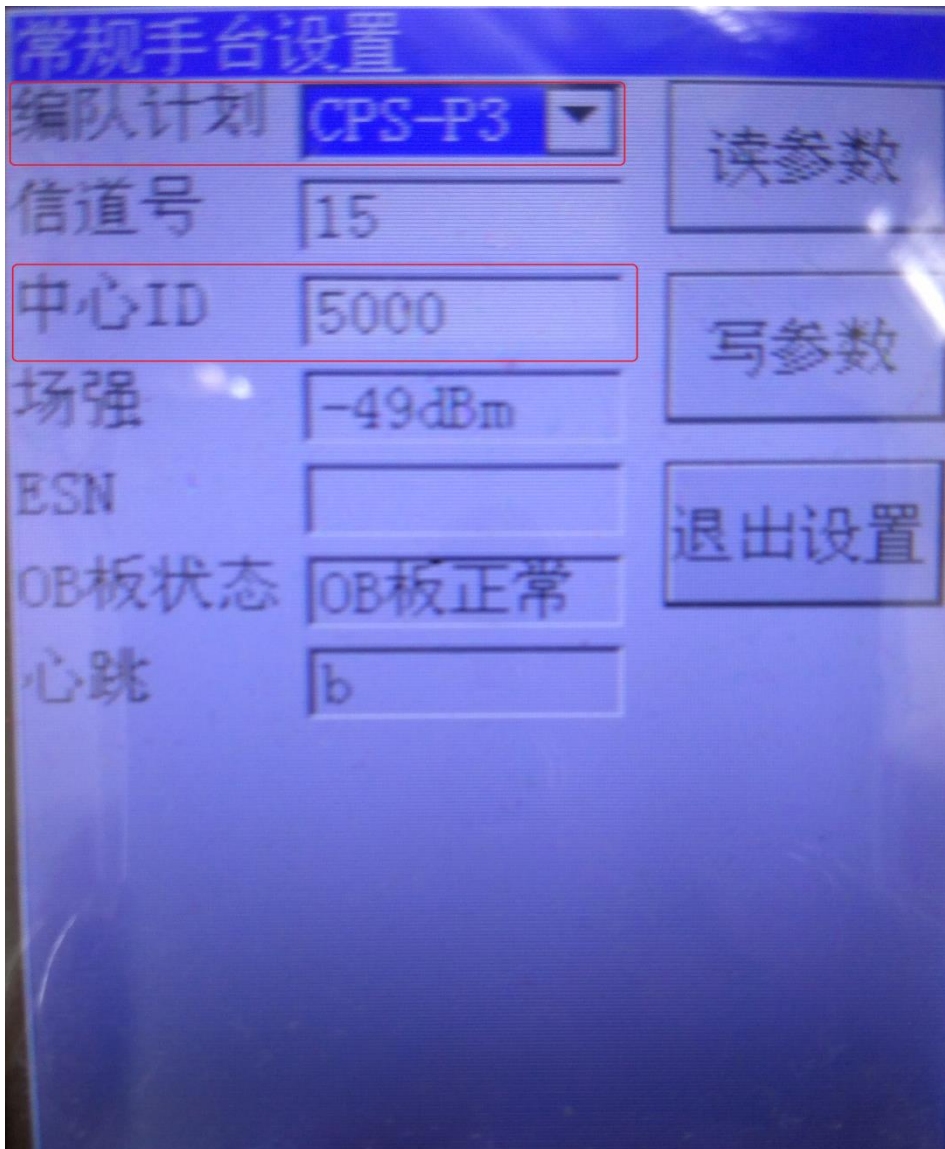


Fig. Conventional Radio Parameters Setting

2.3 Trunking Radio Setting

Note: patrol system installation and PDT specific call number setting must be complete before radio setting

Boot the beacon tool through the green button at lower left, click *patrol radio* after entering the main interface for settings. The process as followed:

Boot the radio (the radio will only connect with beacon tool during the boot process)

Parameters modified as followed:

- 1、 Grouping plan: accorded with system grouping plan. CPS-3 for PDT trunking system at home, and DMR for DMR trunking system abroad.
- 2、 initial state: 32 by default (accorded with patrol system server parameters).

3、ending state: 82 by default (accorded with patrol system server parameters).

4、Replacement number: 5 by default. Modification can be made as needed.

5、Center ID: the number is not open in the system, and the 200 consecutive number after that needs to be non-open (the center ID must be accorded with the parameters of patrol system server and base station, and the ScoutNumMin value).

After modifying all the parameters, click *write parameters* finishing the radio parameters setting, and then click “Exiting Setting”.

Turn on another radio for settings.

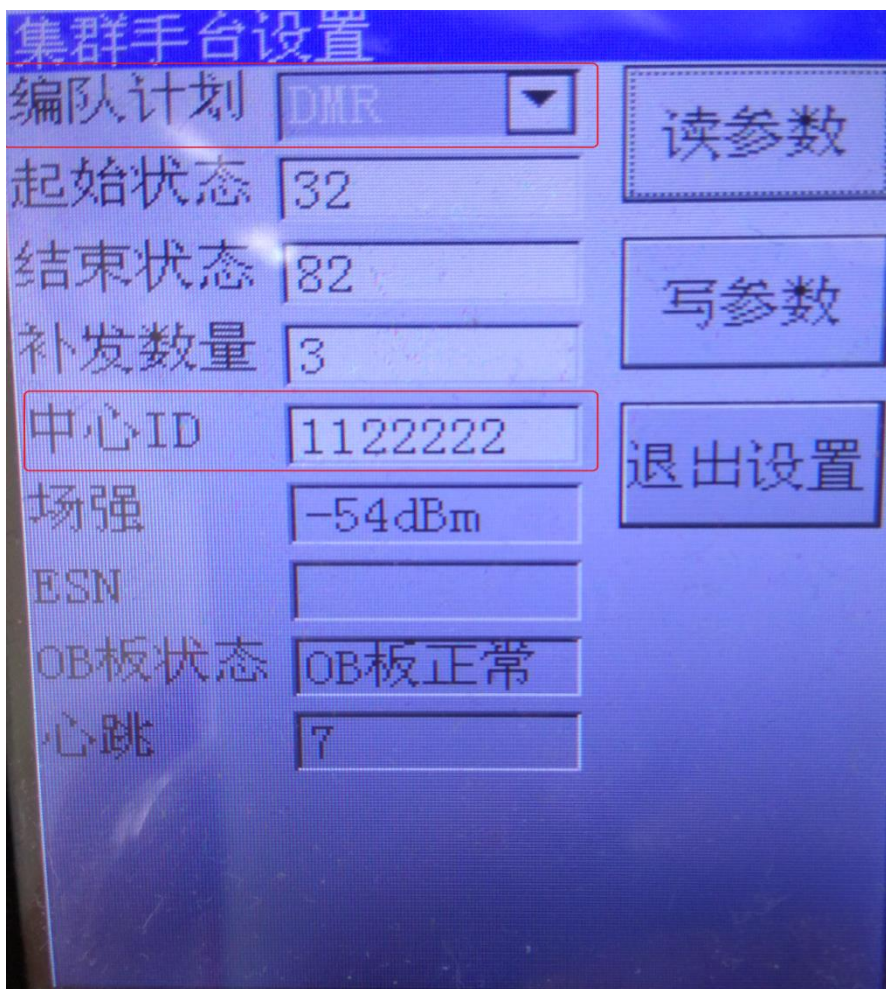


Fig. Trunking Radio Parameters Setting

3. FCC STATEMENT

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

- (1) This device may not cause harmful interference, and
- (2) this device must accept any interference received, including interference that may cause undesired operation.

NOTE 1: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

NOTE 2: Any changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

4. IC STATEMENT

This device complies with Industry Canada licence-exempt RSS standard(s): Operation is subject to the following Two conditions:(1) this device may not cause interference, and (2) this device must accept any interference, including interference that may cause undesired operation of the device.

Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes : (1) l'appareil ne doit pas produire de brouillage, et (2) l'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.