

HT580 User Reference Guide

Version 1.0



NOTICE

1. Li-Ion Battery Pack

The HT580 Portable Terminal and the Li-Ion Battery Pack are packaged separately. You will have to install the Battery Pack when you receive your terminal. Please ensure that the Li-Ion Battery Pack is properly installed and fully charged prior to initial use of the HT580.

2. USB Driver Installation

The HT580's USB driver is located on the CD included in this package. To activate USB, please install the driver first.

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Chapter 1: Introduction

1.1 Overview

Thank you for choosing the HT580 from Unitech Electronic Co. Ltd. This Portable Data Collection Terminal is one of the most user-friendly handheld terminals on the market - perfect for small retailers. Developed under the C language, the HT580's proprietary Operating System is capable of helping you develop and run application programs specifically designed by you for your own unique business. Weighing only 150g (5.3 oz), the light weight of the HT580 is ideal for the long work days typical in a retail environment. Despite its light weight, the HT580 is unusually robust - capable of sustaining 1.2 meter (4 foot) drops to a concrete floor.

We believe the HT580 will more than satisfy your own unique retail requirements. The HT580 standard package includes the HT580 terminal, communication cradle, adaptor, USB & RS232 Y cable, holster, and strap. Additionally, two alternative types of communication/charging cradles - RS232 and Modem - are offered as options.

1.2 Support

Unitech has professional support teams around the world to answer your questions or any related technical issues. Should equipment problems occur, please contact one of our regional service centers for a quick response. Our six regional service centers and their contact information can be found on the websites provided below:

UTC (China) <http://www.ute.com.cn>

APAC (Taipei, Taiwan) <http://www.unitech-adc.com>

UTJ (Japan) <http://www.unitech-japan.co.jp>

UTA (North and South America) <http://www.unitech-adc.com>

UTI (Netherlands, UK) <http://www.unitech-europe.nl>

1.3 Features

HT580 includes the following features:

- Operating System: Proprietary**
- Memory: 1MB**
- Display: 128 x 64 pixels**
- Keypad: 18-key keypad**
- Data Capture: CCD**
- Communication: Bluetooth / RS232 / USB**

1.4 Technical Specifications

| Model | HT580 |
|-------------------------------|---|
| Dimensions | 123mm x 55mm x 25mm (4.8" x 2.2" x 1.0") |
| Weight | 150g (5.3 oz) |
| Drop Specification | 1.2M (4 foot) free drop to concrete floor |
| Display | 128 x 64 pixels; 16 x 8 characters or 12 x 4 characters |
| Battery | One 3.7V 600mAH Li-Ion battery |
| Environmental Sealing | IP42 |
| Operation Temperature | 0°~50°C (32°~122° F) |
| Storage Temperature | -20°~70°C (-4°~158° F) |
| Humidity | 5% to 95% RH; not condensed |
| Electrostatic Discharge (ESD) | 4 KV contact discharge 8 KV air discharge |
| Back-Lit Display | Yes |
| Keypad | 18 alphanumeric keys including one scan trigger |
| CPU | ST UP3354DV |
| Operating System | Proprietary (C Language) |
| Memory | 1 MB for main program and data storage |
| Application Development | EZ Job |
| Communication | RS232 / USB1.1 / Bluetooth / Modem |
| Battery Life | Up to 8 hours |
| Symbologies | China Postal Code, Codabar, Code 32, Code 39, Code 93, Code 128, Interleaved 2 of 5, MSI, UPC/EAN |
| Buzzer | Yes, over 75 dB |
| One LED | Reading (green color) |

1.5 Product Illustrations

This section is designed to familiarize you with the HT580 and its cradle. For detailed explanations on some of the functions, please refer to subsequent chapters.



Figure 1: HT580 Front View



Figure 2: HT580 Back View



Figure 3: HT580 Top View



Figure 4: HT580 Bottom View



Figure 5: HT580 Battery Position



Figure 6: HT580 Charging/Communication Cradle, Featuring 2 Types of Communication: RS232 and modem



Figure 7: Modem Cradle Back View



Figure 8: RS232 Cradle Back View



Figure 9: HT580 Communication/Charging Cable



Figure 10: HT580 Li-Ion Battery

1.6 Battery Storage and Safety Precautions

Batteries should be stored at normal room temperature. Avoid placing them in any situation where explosion or damage could possibly occur. The Li-Ion batteries may lose their charge if not used for several months due to back up and internal resistance. If this happens, we suggest recharging prior to use.

Remove Main Battery

To remove the main battery, press down on the release button while pushing out the cover on the unit. **We suggest that the battery not be removed, if possible.**

Charging

When starting to operate the HT580, the main battery must be fully charged before the first use. The HT580 is equipped with a 3.7V 600mAH Lithium-Ion battery. It takes 8 hours to fully charge the main battery when empty. We suggest users recharge the battery regularly after long hours of use.

 This icon shown in the menu indicates the current battery capacity status.

There are 2 ways to charge the main battery:

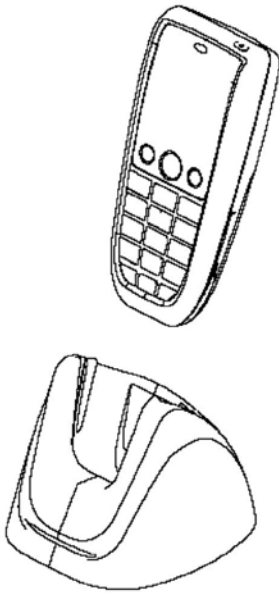
1. Mount the unit in the cradle and connect the power adaptor between the back of the cradle and any power outlet.
2. Or, use the standard USB cable and connect it to your PC's USB port.

1.7 Communication Cradle

The HT580's battery can be charged by placing the HT580 into its charging/communication cradle - part number: 5000-601558 (RS232) / 5000-601557 (Modem)

Positioning Terminal Into Cradle

1. Figure A - Proper Position

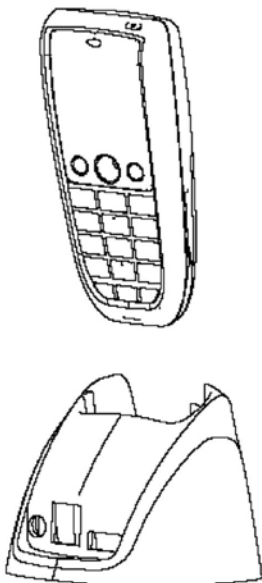


Front View

Figure A shows the proper way to insert your terminal while using the cradle to transmit data or to charge.

Please note that the connector in the bottom of the cradle may be damaged if you use excessive force to insert the terminal.

2. Figure B - Improper Position



Back View

Figure B shows the improper way to insert the terminal into the cradle.

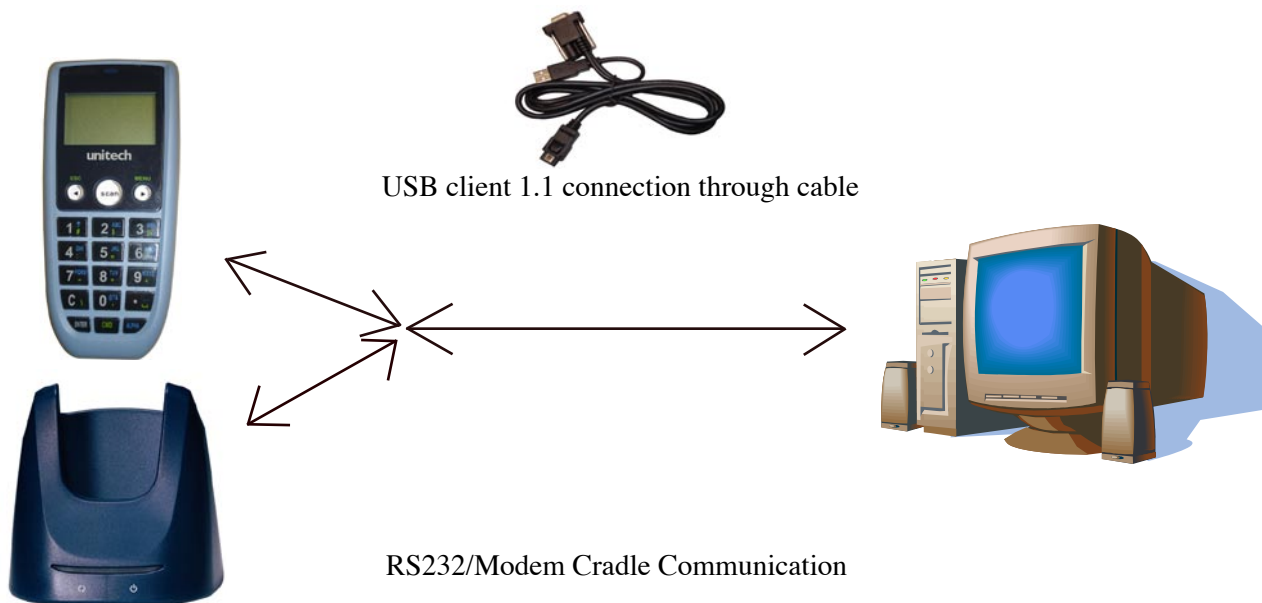
Do not insert the terminal into the cradle incorrectly. It will not function properly and damage can occur.

Communication Cradle LED Icons

This LED light (**Red**) shows the power status of the cradle itself. An Illuminated light indicates the cradle is charging. To identify if the terminal is fully charged, it may be necessary to check the terminal LCD.

This LED light (**Green**) shows transmission status of the cradle itself. An Illuminated light indicates that data is in transmission.

1.8 HT580 Communication with the Host



1.9 Interface Port

The HT580 communicates via the RS232 communication port located on the bottom of the unit. You can connect the HT580 directly via the communication cable to your PC's RS232 port for data transfer, or connect via the cradle.

1.10 Pin Assignment


| Pin | Name | Pin | Name |
|-----|----------|-----|--------|
| 1 | US-POWER | 7 | DSR |
| 2 | GND | 8 | GND |
| 3 | DC-IN | 9 | DTR |
| 4 | USB DP | 10 | TXD |
| 5 | CTS | 11 | RXD |
| 6 | RTS | 12 | USB DP |

1.11 Keypad

The HT580 keypad consists of 18 rubber keys and one power key; the keypad is configured into three different modes: Numeric mode, Command mode, and Alphabetic mode.

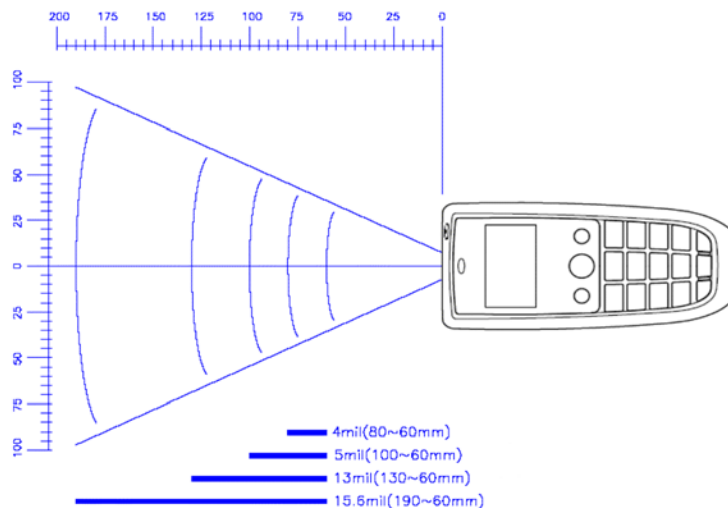
The keypad is configured in Numeric mode by default, Command mode when the light green CMD key is selected, or Alphabetic mode when the blue ALPHA key is selected.

Keypad Description

- [] To power on the unit press the power key.
The power key is on top right corner of the cover.
- [ESC] Returns you back to the previous menu.
- [MENU] Press [MENU] to scroll items you require.
- [SCAN] Press [SCAN] to trigger scanning function or to perform as the [ENTER] key while in [SETTING] mode.
- [C] Press [C] to delete.
- [ENTER] Press [ENTER] to save changes or to go to the next page.
- [ALPHA] Press [ALPHA] to switch to Alphabet.
Any alphabetical character (printed in blue) can be activated with the ALPHA key.
- [CMD] Press [CMD] to perform delimiters such as “#”, “\$” etc.
Any delimiter (printed in green) can be activated with the CMD key.



1.12 Barcode Scanning Spectrum



Chapter 2: Operating the HT580

After powering on the HT580, you will see the Main Menu as below:

```

HT580 V1.06
1. SETTING
2. FORMCACHING
3. RUN APG580
    
```

2.1 Setting System

Press [1] or [MENU] to enter “SETTING” category. There you will see the following four options:

1. DATE & TIME, 2. DEVICE, 3. MODEM INIT, 4. SUPERVISOR

2.1.1 DATE & TIME:

Press [1] or [MENU] to enter the DATE & TIME category to set the correct date and time. The page will appear as it is shown below:

```

YYYY-MM-DD
2000-01-08
HH-MM-SS
05:50:35
    
```

Press numeric keys to input correct date and time. Once complete, press [ENTER] to save the revised settings. To return to the previous menu, press [ESC].

2.1.2 DEVICE

When you select device setting, you will be able to see three settings as shown below:

```

1. BACKLIGHT
2. SCANNER
3. AUTORUN
    
```

2.1.2- 1 < BACKLIGHT >

Press [1] or [scan] to enter <BACKLIGHT> mode and to press [ESC] to go back to the device setting mode.

< BACKLIGHT > selection: press [MENU] to scroll down on your preferred mode of backlight duration as ON 10 SECS / ON 20 SECS / ON 30 SECS / ON 60 SECS / Always OFF. Once you select the preference for backlight duration, press [ENTER] to complete the setting.

Note: Selecting “ON 10 SECS” means that backlight remains active for 10 seconds. The default may be reset if you press any key while the backlight is active.

2.1.2- 2 < SCANNER >

Press [2] or [scan] to enter <SCANNER> mode. Press [ESC] to return to the device setting mode.

< SCANNER > selection: **ON NORMAL/ON FLASH/OFF**. Selecting your preference and press [ENTER] to complete the setting.

2.1.2- 3 < AUTORUN>

Press [3] or [scan] to enter <AUTORUN> mode. Press [ESC] to go return to the device setting mode.

<AUTORUN> automatically runs the selected program once you change the default. AUTORUN default is set up on <OFF> mode. Three programs can be selected: < **FORMCACHING**>, <**APG580**>, and <**OFF**>. Once you define the selected program, the program will automatically activate when you restart the unit. The main menu will run in the program.

2.1.3 < MODEM INIT >

To perform modem command, plug in the modem and it will be automatically initiated. To execute <**MODEM INIT**>, press [3] or [scan] to enter this mode. Press [ESC] to go back to the previous menu.

2.1.4 < SUPERVISOR >

When entering into <**SUPERVISOR**> mode, you will be required to input your password.

For password and detail reference, please refer to the Technical Binder.

Press [4] or [scan] to enter <**SUPERVISOR**> mode setting. Press [ESC] to go back to the previous menu.

2.2 FORMCACHING

In the main menu, there is **FORMCACHING** to be performed while scanning.

In the default setting for **FORMCACHING**, you will see "Item" as defined in field 1 and "Qty" as defined in field 2. To change the default of the field, go to "FORM" under "SUPERVISOR" in the mode category. To start <**FORMCACHING**>, press [2] or [scan] to enter and press [ESC] to go back to the previous menu.

2.3 RUN APG580

To run on "APG580", please refer to the technical binder for detailed instructions.