

User's Manual

2D Image Wireless Handheld Barcode Scanner



Revision History

Changes to the original manual are listed below:

Version	Date	Description of Version
1.0	9/9/2024	Initial release

Important Notice

No warranty of any kind is made in regard to this material, including, but not limited to, implied warranties of merchantability or fitness for any particular purpose. We are not liable for any errors contained herein nor for incidental or consequential damages in connection with furnishing, performance or use of this material. We shall be under no liability in respect of any defect arising from fair wear and tear, willful damage, negligence, abnormal working conditions, failure to follow the instructions and warnings, or misuse or alteration or repair of the products without written approval. No part of this document may be reproduced, transmitted, stored in a retrieval system, transcribed, or translated into any human or computer or other language in any form or by any means electronic, mechanical, magnetic, optical, chemical, biological, manual or otherwise, except for brief passages which may be quoted for purposes of scholastic or literary review, without express written consent and authorization. We reserve the right to make changes in product design without reservation and without notification. The material in this guide is for information only and is subject to change without notice. All trademarks mentioned herein, registered or otherwise, are the properties of their various, ill, assorted owners.

General Handling Precautions

- Do not dispose the scanner in fire.
- Do not put the scanner directly in the sun or by any heat source.
- Do not use or store the scanner in a very humid place.
- Do not drop the scanner or allow it to collide violently with other objects.
- Do not take the scanner apart without authorization

Guidance for Printing

This manual is in A5 size. Please double check your printer setting before printing it out. When the barcodes are to be printed out for programming, the use of a high-resolution laser printer is strongly suggested for the best scan result.

Radio Notice

This equipment generates uses and can radiate radio frequency energy. If not installed and used in accordance with the instructions in this manual, it may cause interference to radio communications. The equipment has been tested and found to comply with the limits for a Class A computing device pursuant to EN55032 and 47 CFR, Part 2 and Part 15 of the FCC rules. These specifications are designed to provide reasonable protection against interference when operated in a commercial environment.

Radio and Television Interference

Operation of this equipment in a residential area can cause interference to radio or television reception. This 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 the receiving antenna.
- Relocate the device with respect to the receiver.
- Move the device away from the receiver.
- Plug the device into a different outlet so that the device and the receiver are on different branch circuits.

If necessary the user may consult the manufacturer, and authorized dealer, or experienced radio/television technician for additional suggestions. The user may find the following booklet prepared by the Federal Communications Commission helpful: "How to Identify and Resolve Radio-TV Interference Problems." This booklet is available from the U.S. Government Printing Office, Washington, DC 20402 U.S.A., Stock No. 004000003454.

For CE-Countries

This scanner is in conformity with CE standards. Please note that an approved, CE-marked power supply unit should be used in order to maintain CE conformance.

Wireless Communication

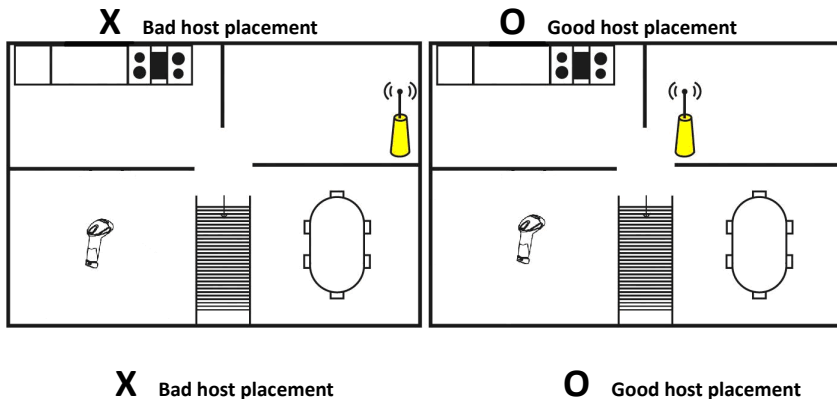
- Wireless technology operates 100M / 75M with communication cradle. Maximum communication range may vary depending on obstacles (person, metal, wall, etc.) or electromagnetic environment.
- The following conditions may affect the sensitivity of wireless communication.
 - There is an obstacle such as a person, metal, or wall between this unit and wireless device.
 - A device using 2.4 GHz frequency, such as a wireless LAN device, cordless telephone, or microwave oven, is in use near this unit.
- Because wireless devices and wireless LAN (IEEE802.11b/g) use the same frequency, microwave interference may occur and resulting in communication speed deterioration, noise, or invalid connection if this unit is used near a wireless LAN device. In such a case, perform the following.
 - Use this unit at least 10 m (about 30 ft) away from the wireless LAN device.

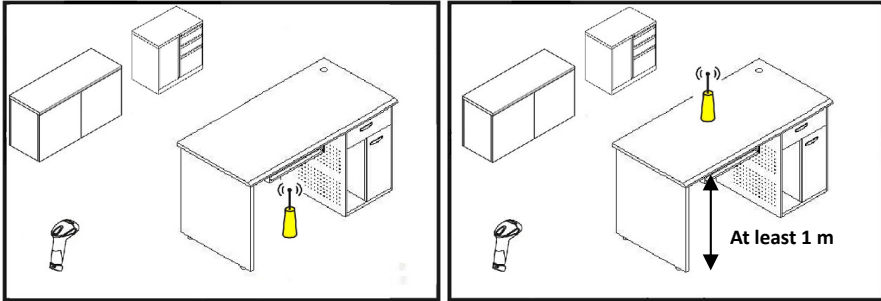
- If this unit is used within 10 m (about 30 ft) of a wireless LAN device, turn off the wireless LAN device.
 - Install this unit and wireless device as near to each other as possible.
- Microwaves emitting from a wireless device may affect the operation of electronic medical devices. Turn off this unit and other wireless devices in the following locations, as it may cause an accident.
 - Where inflammable gas is present, in a hospital, train, airplane, or a petrol station
 - Near automatic doors or a fire alarm
- This unit supports security capabilities that comply with the wireless standard to provide a secure connection when the wireless technology is used, but security may not be enough depending on the setting. Be careful when communicating using wireless technology.
- We do not take any responsibility for the leakage of information during wireless communication.
- Connection with all wireless devices cannot be guaranteed.
 - A device featuring wireless function is required to conform to the wireless standard specified by wireless SIG, and be authenticated.
 - Even if the connected device conforms to the above mentioned wireless standard, some devices may not be connected or work correctly, depending on the features or specifications of the device.
- Depending on the device to be connected, it may require some time to start communication.

Tips to help improve your wireless network

1. Position the access point (host/cradle) in a relatively empty space at central location.

When possible, place the access point in a central location on the high ground (1m or above). If your access point is against an outside wall, the signal will be weak on the other side of the room.





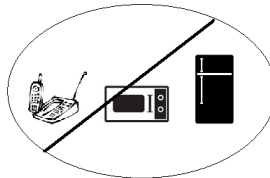
2. Move the access point (host/cradle) off the floor and away from walls and metal objects (such as metal file cabinets). Metal objects, walls, and floors will interfere with your wireless signals. The closer your access point is to these obstructions, the more severe the interference, and the weaker your connection will be.

3. Reduce wireless interference.

The most common wireless technology, 802.11g (wireless-G), operates at a frequency of 2.4 gigahertz (GHz). Many cordless phones, microwave ovens, hospital equipments, refrigerator, LED, and other wireless electronics also use this frequency. If you use these wireless devices in your office, your device might not be able to "hear" the signals over the noise coming from them.

If your network uses wireless-G, you can quiet the noise by avoiding wireless electronics that use the 2.4 GHz frequency. Instead, look for cordless phones and other devices that use the 5.8 GHz or 900 megahertz (MHz) frequencies. Because 802.11n (wireless-N) operates at both 2.4 GHz and the less frequently used 5.0 GHz frequency, you may experience less interference on your network if you use this technology.

Avoid possible wireless interference



4. Update the firmware or driver of your wireless dongle.

If you are using a wireless dongle or other similar devices to make the connection, getting the latest firmware or driver updates may improve the performance. Visit your manufacturer's website for the updates.

Battery Information

- Use only 18650 batteries with flat ends.
- Using any other type of battery and charging equipment may damage the device and invalidate the warranty.
- Store batteries at half of full charge in a dry, cool place, removed from the equipment to prevent loss of capacity, rusting of metallic parts and electrolyte leakage.

- When batteries are stored over six (6) months, some irreversible deterioration in overall battery quality may occur.
- When storing batteries for over a year, the charge level should be verified at least once every 6 months and charged to half of full charge.

Battery Safety

- The area in which the units are charged should be clear of debris and combustible materials or chemicals. Particular care should be taken where the device is charged in a non-commercial environment.
- Follow battery usage, storage, and charging guidelines found in the user guide.
- Improper battery use may result in a fire, explosion, or other hazard.
- To charge the device battery, the battery and charger temperature must be between 0°C~+45°C
- Do not use incompatible batteries and chargers. Use of an incompatible battery or charger may present a risk of fire, explosion, leakage, or the hazard.
- Do not disassemble or open, crush, bend or deform, puncture, or shred.
- Severe impact from dropping any battery-operated device on a hard surface could cause the battery to overheat.
- Do not short circuit a battery or allow metallic or conductive objects to contact the battery terminals.
- Do not modify or remanufacture, attempt to insert foreign objects into the battery, immerse or expose to water or other liquids, or expose to fire, explosion, or other hazard.
- Do not leave or store the equipment in or near areas that might get very hot, such as in a parked vehicle or near a radiator or other heat source. Do not place battery into a microwave oven or dryer.
- Battery usage by children should be supervised.
- Please follow local regulations to promptly dispose of used re-chargeable batteries.
- Do not dispose of batteries in fire.
- Seek medical advice immediately if a battery has been swallowed. In the event of a battery leak, do not allow the liquid to come in contact with the skin or eyes. If contact has been made, wash the affected area with large amounts of water and seek medical advice.
- Do not short the battery terminals. The battery could overheat.
- Do not attempt to split or peel the outer casing.

Battery Maintenance

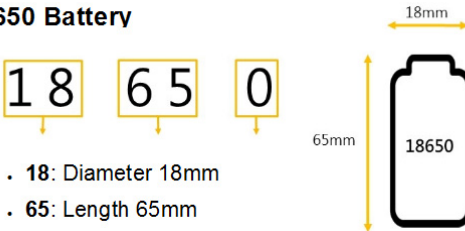
These are recommendations to extend the life of the battery pack:

- When charging the battery for the first time, charge for at least 12 hours prior to use.
- Remove the battery if the device is not going to be used for a long time. If the battery is left unused for more than 3 months, you need to charge the battery before use.
- If the battery is not installed, recharge the battery every 6 months to prevent damage to the battery cells.
- The battery capacity is reduced at temperature extremes, high and low.

Battery Type

The Z-3192BT Plus operates wirelessly using a single 18650 battery that must be charged within the scanner. However, not all 18650 batteries are compatible with the device. Only flat-top batteries, with both positive and negative ends flat, are supported. Ensure you use the correct battery type to avoid operational issues.

18650 Battery



- 18: Diameter 18mm
- 65: Length 65mm
- 0: Cylindrical battery type



Flat Top

- The positive and negative ends of the battery are both flat.



Button Top

- The positive terminal has a protruding bump or dot.



Protected Board

- The battery includes a protection circuit board.



Protected Board



Table of Contents

Important Notice.....	ii
General Handling Precautions.....	ii
Guidance for Printing	ii
For CE-Countries.....	iii
Wireless Communication	iii
Battery Information.....	v
Batty Safety	vi
Battery Maintenance	vii
Battery Type	vii
Introduction	1
Product Overview	2
Scanner	2
Cradle	2
Scanner and Accessories.....	3
Battery Installation.....	4
Connecting the Cradle.....	5
Charging the Battery	6
Power on the Scanner	7
How to Scan	8
Radio Communication Host Type.....	9
Cradle Host Mode	9
SPP Master/SPP Slave Mode	9
HID Mode	9
Paging the Scanner.....	10
Visible Indicators	10
Scanner	10
Cradle	11
Sound Indicators	11
ACK/NAK Protocol or Frame Packing.....	12
Pin-out Configuration.....	13
Cable Pin-out.....	14
Programming Guide	15
Connecting to a Host.....	19
Cradle Host Mode	19
Cradle Host Pairing	19
Wireless Mode	20
SPP Client Mode.....	20
SPP Host Mode.....	21
BT HID mode	22
Smart Phones	22
Multimedia Keyboard	23
Setting Pin Code	23
Deleting pin code	24
Reset Name	24
Setting Name.....	24
Wireless Discovery	25
Program Settings.....	26

Scan Modes	27
AIM light , illumination Light control.....	27
Radio Communication Settings	28
BT HID mode	28
SPP Host/Client mode	28
Functional Settings.....	30
Same Code Delay.....	30
Good Read Beeper Tone Selection	31
Beeper Duration Selection	31
Vibrator Selection	32
Inter Character Delay	32
Inter Message Delay.....	33
Power off Timeout Parameter.....	34
RS-232C Interface Setting.....	35
Parity Bit.....	35
Stop Bit.....	36
Data Bit.....	36
Handshaking Protocol	36
Message Terminator (For Cradle).....	37
Keyboard Wedge Setting (For Cradle).....	38
Message Terminator(For Cradle)	39
Terminator(For Scanner).....	40
Symbology Settings	41
CODABAR.....	41
Code39	42
Code 93	44
Code 128	45
Chinese post code(SLZ).....	46
MSI/PLESSY.....	47
CODE 11.....	48
ITF 2 of 5.....	48
Telepen	50
Pharmacode	50
UPC/EAN/JAN	50
Standard 2 of 5	56
Industrial 2 of 5	57
Matrix 2 of 5	57
GS1 Databar	59
QR Code.....	61
DataMatrix	62
PDF417	63
Aztec.....	64
Maxi code	64
POST code	65
Codablock F.....	66
Composite Codes	66
GS Substitution for NMVS Application	66
Data Editing.....	67
Full ASCII Data Matrix Table	70
Appendix 1: USB Virtual COM Driver Installation	82
Appendix 2: Barcode Length Setting	83

Introduction

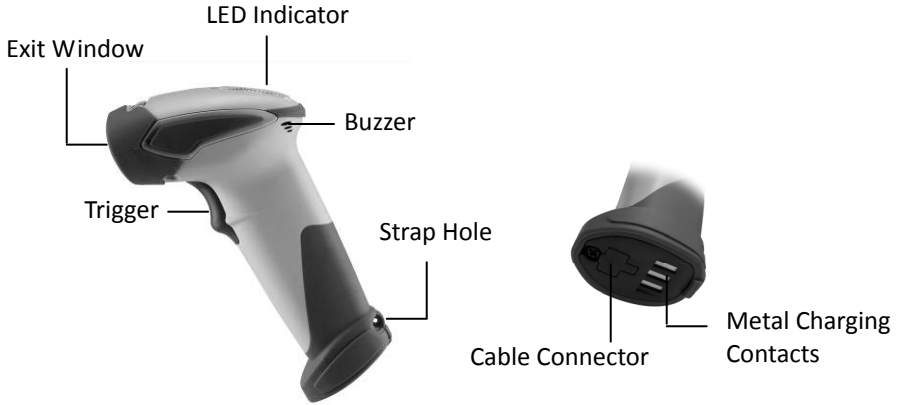
The Z-3192BT Plus is a professional-grade handheld wireless 2D barcode scanner designed for durability and ease of use. Featuring a high-capacity lithium-ion battery, it offers long-lasting performance and a 100-meter wireless range. Its lightweight gun-type design, rugged build, and intuitive feedback through flashing LED and programmable beeper make it ideal for tough conditions. The scanner reads a wide range of 1D and 2D barcodes from various devices, making it perfect for manufacturing and logistics sectors seeking enhanced efficiency.

Key Features:

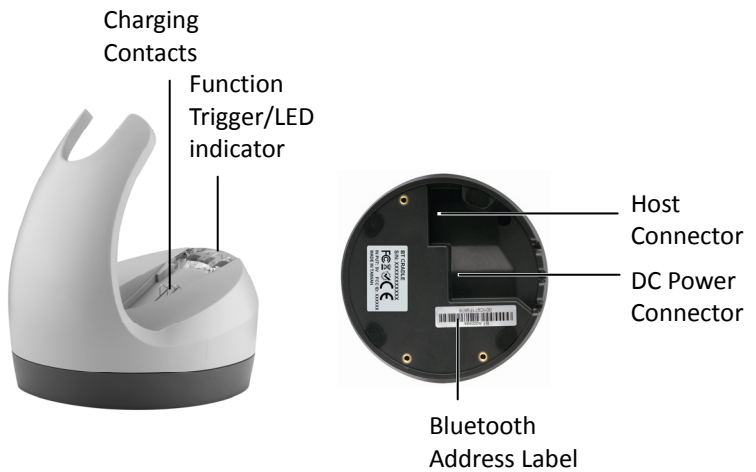
- 100M wireless range
- Flexible data connectivity
- Flashing LED and programmable beeper
- Lightweight and rugged gun-type design
- Smart charging for battery longevity
- Reads barcodes from phones, tablets, and screens

Product Overview

Scanner



Cradle



Scanner and Accessories

The scanner package contains:

Wireless scanner with battery /
Scanner cradle (optional)



(with cradle)



(without cradle)

Li-ion battery pack



USB-C Cable/
Communication cable (optional)



USB C charging cable



5V USB Power adapter



If any contents are damaged or missing, please contact your dealer immediately.

Battery Installation

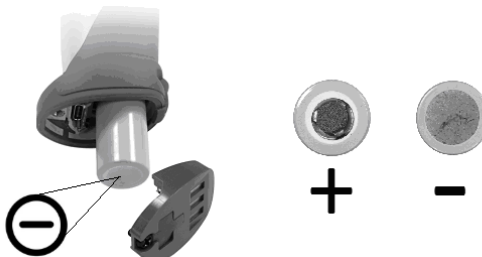
Installing Battery

1. Prepare for Installation:
 - Remove the screws securing the bottom cover of the device.
2. Install the Battery:
 - Orient the battery so that the positive terminal faces forward.
 - Carefully place the battery into the designated compartment, ensuring a secure fit.
3. Ensure Proper Installation:
 - Verify that the battery is correctly seated to avoid potential product damage.
4. Final Steps:
 - After installation, replace and secure the bottom cover with the screws.

Battery Removal

1. Prepare for Removal:
 - Before removing the battery, power off the device if necessary.
2. Remove the Battery:
 - Support the battery with your fingers to prevent accidental ejection.
 - Carefully lift the battery out of its compartment.
3. Store or Dispose of the Battery:
 - If replacing the battery, store it safely or dispose of it according to local regulations.

These instructions should help ensure safe and proper handling of the battery during installation and removal.

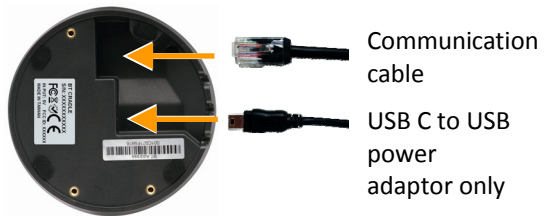


Always use the rechargeable batteries provided by the manufacturer to avoid any non-compatible danger or void the warranty.

Connecting the Cradle

The cradle host features wireless technology and is designed to support radio communication to the scanner. It can be used for both battery charging and radio communication.

1. Take the desirable interface cable and insert the RJ-45 connector on the bottom of the cradle. You will hear a clear and short “click” sound; then connect the other end to the host.
2. Connect the included USB cable to USB-C port at the bottom of the cradle and connect other end to USB power adaptor.
3. Connect the USB power adaptor into AC outlet. The LED indicator on the cradle should flash blue until it made connection with the scanner.



- When using Keyboard wedge and USB interface for cradle communication, it is not necessary to have an external power adapter if host has sufficient power. But these interfaces need external power adapter when charging batteries.
- The USB-C port on the bottom of the cradle should only be connected using the USB power adaptor. Please do not connect the USB cable to a PC host for charging when using the cradle.

Charging the Battery

The scanner offers two different ways to charge the battery: USB Cable or Cradle.

To charge the battery using the cradle:

1. Connect the cradle. Please see the Connecting the Cradle section for more details.
2. Place the scanner on the cradle. You will hear a short beep sound from the scanner indicating scanner is in contact with the cradle.
3. The battery begins charging when the scanner LED indicator starts flashing green. LED turns steady green when charging is complete.



Approx. charging time: 5 hours

To charge the battery using the USB cable:

There are two method to charge scanner via USB cable.

- Host USB Power
 - Power adaptor
1. Connect the USB-C connector directly to the scanner.
 2. Connect the other end of the USB connector to the host to begin charging. You can also connect the USB cable to an outlet using the power adaptor to charge the battery.
 3. The battery begins charging when the scanner LED indicator starts flashing green. LED turns steady green when charging is complete.



Approx. charging time: 7 hours



- The scanner will power on automatically when charging.
- Batteries shipped may not be full charged and should be fully charged for maximum charge capacity.
- *Recommended* charging environment is temperature in 0°C~35°C (32°F~95°F).

Power on the Scanner

1. Ensure the battery is fully charged. Please refer to the previous section to charge the battery.
2. Press and hold the trigger for 1 second until a long beep sound is heard to turn on the scanner.

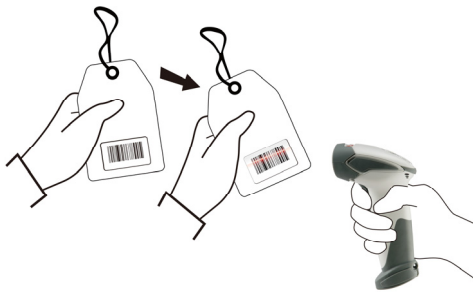
How to Scan

There are two ways to scan with this device.

- Handheld scanning
- Presentation scanning

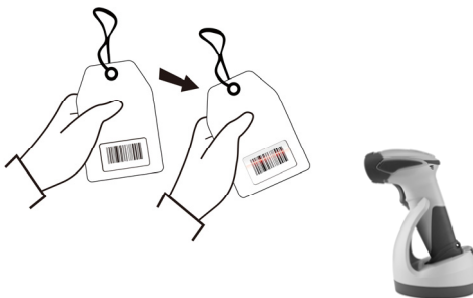
Handheld scanning

1. Power on the scanner.
2. Press the trigger and aim at the barcode as illustrated.
3. When decoding is successful, the scanner beeps and the LED indicates blue.



Presentation Scanning

1. Put the scanner into the cradle for presentation scanning.
2. Move the barcode label approach the scanner scanning zone.
3. When decoding is successful, the scanner beeps and the LED indicates blue.



Radio Communication Host Type

This scanner support three radio communication types:

- Cradle Host mode
- SPP master/slave mode
- HID mode

Cradle Host Mode

The scanner communicates with the host through the cradle and the cradle communicates directly to the host via host interface cable connection.

Typically, scanner and cradle in the same delivery box are paired in factory. As soon as both are powered on, they should find and connect to each other immediately.

However, under special circumstance that the scanner and the cradle are not paired with the cradle, please See Cradle Host Pairing section for detail operation information.



SPP Master/SPP Slave Mode

The scanner communicates with the host through wireless connection. Please see the Wireless Mode section for detail operation information.



HID Mode

The scanner communicates with the smart phone through wireless HID connection. Please see the BT HID mode section for detail operation information



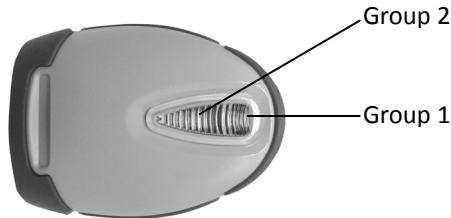
Paging the Scanner

1. Ensure the cradle is properly connected to the host and LED indicator is showing steady blue.
2. Press the function trigger on the cradle. You should hear the scanner make 3 beep sounds and blue LED flash 3 times if it is in range.

Visible Indicators

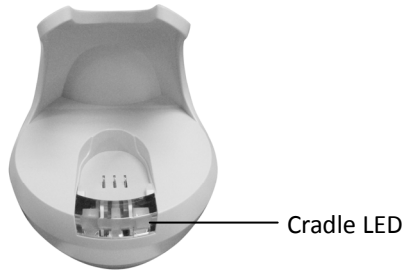
Scanner

There are 2 groups of LED indicators on top of the scanner. These indicate the operational status of the scanner.



LED Status		Indication
Group_2	Group_1	
	Blue Flashing	Waiting for radio connection (flash time 0.5s : 0.5s).
	Blue fast Flashing	Radio connecting.
	Blue Slow Flashing	Device connected (flash time 0.03s : 3s).
1 Blue Flashing		A barcode was decoded successfully
	Green Flashing	Charging mode
	Steady Green	Battery fully charged
Steady Red		Programming mode
Red flashing slow (with continuous beep sound)		Low battery warning
Red flash twice (with 2 beep sound)		Very low battery warning

Cradle



LED Status		Indication
		Red steady and blue continuous flashing
		Steady red and blue
		Red and blue interchange
		Steady blue
		Blue flashing
		Cradle is radio disconnected and power from DC adaptor is lost.
		Cradle is radio connected. But lost DC power from the adaptor.
		USB Interface communication failed.
		Cradle is radio connected.
		Cradle is radio disconnected.

Sound Indicators

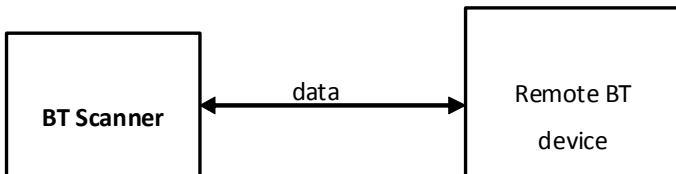
When the scanner is in operation, it provides audible feedback. The beeps indicate the status of the scanner.

Beep	Indication
A long beep	Power on scanner.
One beep	A barcode has been successfully decoded and data is either transfer to the host or saved in the memory.
1 high-low -high beeps	Scan cradle pair barcode.
Four short medium beeps	Data communication failed or out of range.
Intermission medium-low beeps	Low battery warning.
1 short medium – low beeps	Scanner is power down.

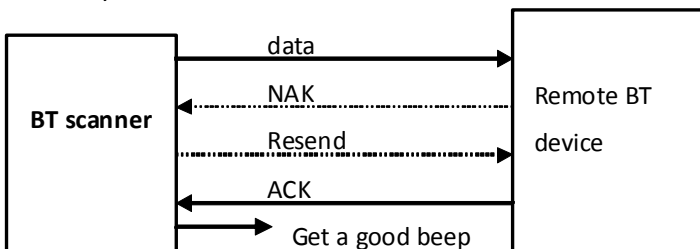
ACK/NAK Protocol or Frame Packing

When scanner is in SPP Master/Slave mode, and add in the data protocol or packing could confirm the data reliability. Refer to below for different setting options:

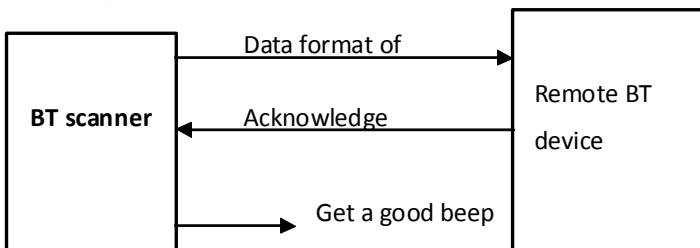
a) No ACK/NAK protocol:



b) ACK/NAK only



c) Frame packing:



Pin-out Configuration

Cradle Phone Jack Pin-Out Configuration


RJ 1.	RTS_EIA	RJ 6.	RX_EIA
RJ 2.	KB Data / USB_D+	RJ 7.	KB Clock
RJ 3.	PC Clock / USB_D-	RJ 8.	+5V
RJ 4.	GND	RJ 9.	PC Data
RJ 5.	CTS_EIA	RJ10.	TX_EIA

USB-C Pin-Out Configuration


Pin	Function	Pin	Function
A1	GND	B12	GND
A4	VBUS	B9	VBUS
A6	D+	B7	D-
A7	D-	B6	D+
A9	VBUS	B4	VBUS
A12	GND	B1	GND

Cable Pin-out

1. USB Charging Cable

	PIN-OUT CONFIGURATION			
	USB-C		USB A TYPE	
	A1/B12	GND	1	Vcc+
A4/B9	VBUS	2	D-	
A6/B6	D+	3	D+	
A7/B7	D-	4	GND	
A9/B4	VBUS			
A12/B1	GND			

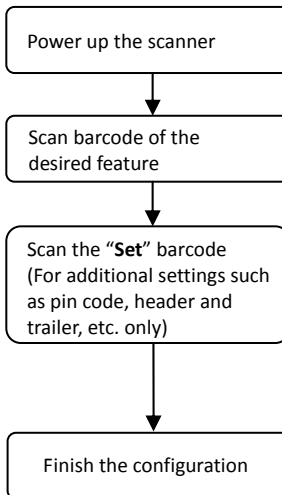
2. USB Communication Cable

	USB TYPE A CONNECTOR	FUNCTION
1.		VCC
2.		D-
3.		D+
4.		GND

Programming Guide

Program Procedure Using Barcode Manual

1. Power up the scanner.
2. Scan the barcode for the desired feature. Multiple features can be enabled/disabled.
3. For some parameter setting, such as barcode length and identifier code, it is required to scan the Set barcode to save the configuration.



Default Parameters

The factory default setting table gives the default settings of all the programmable parameters. The default settings will be restored whenever the "Reset" programming label is scanned and the scanner is in programming mode. Default values are highlighted in grey background in the settings.

Factory Default Setting

Parameter	Default
Radio communication	
Wireless host	Cradle Host
Pairing mode	Unlocked
Data transmit	Normal
Radio protocol timeout	5 seconds
Power off timeout	20 minutes
Encryption	Enable
Cradle Host	
RS-232 communication	
Baud rate	9600
Parity	none
Data bits	8
Stop bit	1
RTS/CTS	off
Terminator	<CR><LF>
Keyboard Wedge Communication	
Terminator	PC/AT
Keyboard	US keyboard
Terminator	Enter(Alpha numeric)
USB Communication	
Terminator	Enter
Code mode	Scan code
Keyboard	US keyboard
Wand Emulation	
Wand emulation speed	Normal
Data output	Black=high
Pair contact on cradle	Enable
Scanner	
Decoder Selection	Default

EAN/UPC	Enable
CODE 39	Enable
Code 32	Disable
CODABAR	Enable
ITF 2 OF 5	Enable
MSI	Disable
Chinese post code	Disable
Code 93	Enable
Code 128	Enable
EAN-128	Disable
Telepen	Disable
Code 11	Disable
Standard 2 of 5	Disable
Industrial 2 of 5	Disable
GS1 DataBar	Disable
Beeper Sound	Default
Frequency	Medium
Duration	Medium
Operating Parameter	Default
Scan mode	Trigger mode
Stand mode	Enable
Header and trailer	None
Inter-message delay	None
Inter-character delay	None
Code Identifiers	Default
Identifier code as ZEBEX standard	Disable
Identifier code as AIM standard	Disable
Code 39 identifier code	M
ITF 2 of 5 identifier code	I
Chinese post code identifier code	H
UPC-A identifier code	A
UPC-E identifier code	E
EAN-13 identifier code	F
EAN-8 identifier code	FF
Codabar identifier code	N
Code 128 identifier code	K
Code 93 identifier code	L

MSI identifier code	P
Code 11 identifier code	O
Standard 2 of 5 identifier code	S
Industrial 2 of 5 identifier code	D
GS1 DataBar identifier code	RS
GS1 DataBar Limited identifier code	RL
GS1 DataBar Expanded identifier code	RX

Default Data Transmit Format

Code	Message format
EAN-13	D1 D2 D3 D4 D5 D6 D7 D8 D9 D10 D11 D12 D13
EAN-8	D1 D2 D3 D4 D5 D6 D7 D8
UPCA	D1 D2 D3 D4 D5 D6 D7 D8 D9 D10 D11 D12
UPCE	D1 D2 D3 D4 D5 D6 D7 D8
CODE128	D1-Dx (default 3~62)
EAN128	C1 D1-Dx (default 3~62)
CODE39	D1-Dx (default 3~62)
CODABAR	D1-Dx (default 6~32)
INTERLEAVED 2/5	D1-Dx (default 6~32)
CHINESE POST CODE	D1-Dx (default 8~32)
CODE93	D1-Dx (default 3~32)
MSI	D1-Dx (default 6~32)

Connecting to a Host

The scanner provides several data transmit methods to communicate with the host. User may select the method according to their preferences. Read this section to learn the setups for connecting to different hosts.

Cradle Host Mode

The scanner communicates with the host through the cradle. Typically, scanner and cradle in the same delivery box are paired and corresponded to host interface in factory. To check if the scanner is paired to the cradle, check the scanner LED group1 for slow blue flash and check the top cradle LED for steady blue light. If LED group1 of scanner and top LED of cradle are both flashing blue, follow the steps below to radio connect the scanner and cradle.

Cradle Host Pairing

1. See the Connecting the Cradle section to connect the cradle and the computer. Please make sure the cradle LED is flashing blue indicating it's not linked to any scanner. If the LED shows steady blue, the cradle is already paired to another scanner so you must unpair the scanner before continuing.
3. Power on the scanner and enable cradle host mode if necessary.



Enable cradle mode

Cradle Host mode enable

4. Use the scanner to scan the pairing barcode at the bottom of the cradle to begin pairing. 3 short beeps will be heard.
5. The LED indicator on the scanner will flash blue rapidly indicating search mode in process. The LED on the cradle becomes steady blue when the pairing is successful.

Wireless Mode

The scanner connects to the host via wireless connection. You may select SPP Host or SPP Client for PC connection or select HID mode and Smart phone mode for smart phone connection.

SPP Client Mode

In this mode, the scanner connects to the host /PC via wireless connection and performs like there's a serial connection. In SPP Client mode, the scanner is discoverable from a remote device and it can request the scanner for connection. There are several ways to connect the wireless scanner to your PC. If you have your own applications please check their User's Manuals for pairing instructions.

To connect a wireless device to Window based system for the first time:

1. Turn on the host computer and activate its wireless connection.
2. Select "Add wireless device". Or open the dialog BT devices and click "Add".
3. Power on the scanner and program it with "SPP Client mode" label.



Enable wireless SPP Client mode

Scanner SPP Client enable

4. On Devices tab, click Add. This will open the Add wireless Device Wizard.
5. Select the "My device is set up and ready to be found" checkbox, and then click Next.
6. The scanner should be on the list of discoverable devices. The default name of the scanner is "ZBBT". Select "ZBBT" and click "Next".
7. Select "Let me choose my own passkey" and enter the pin code. The default pin code is "12345678".
8. Click "Next" to connect the scanner to the host. A short beep should be heard upon connection.

SPP Host Mode

In this mode, the scanner connects to the host /PC via wireless connection and performs like there's a serial connection. In host mode, the scanner initiates the connection to the remote device.

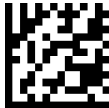
1. Power on of the remote device and have its address ready in hand and make it discoverable.
2. Program the scanner with the "SPP Host enable" barcode.



Enable SPP Host mode.

Scanner SPP Host enable

3. Scan "Set wireless address" to set the address.



Set wireless address for SPP Host connection.

Set wireless address
(SPP Host only)

4. Use the ASCII table in **Full ASCII Data Matrix Table** to input the 12 digit wireless address. For example: if the address is "011B1345600", scan "0", "0", "1", "1", "B", "1", "3", "4", "5", "6", "0", "0" from ASCII barcode labels, then scan Set barcode to save the configuration.



Scan to save the configuration

Set

5. Scan Required Pair with client (SPP Host) to begin pairing.



Begin pairing with client device(SPP Host)

Required Pair with client (SPP
Host)

BT HID mode

In BT HID mode, the scanner connects to the host /PC via wireless connection and performs like there's a keyboard connection. The scanner initiates the connection to the remote device.

1. Power on the scanner and program it with "BT HID Mode".



BT HID mode

Enable wireless HID keyboard emulation

2. Enable wireless connection on your host and follow the instructions in your host to set it to discover other wireless devices in its surrounding.
3. The scanner should be on the list of discoverable devices. The default name of the scanner is "ZBBT". You will be prompt to enter pairing pin code. Select "ZBBT" and input the pin code that appears on your mobile device to connect scanner to the phone.
4. Scan the Enter barcode to confirm. A short beep should be heard upon connection.

Smart Phones

For smart phones/tablets with iOS 7 or Android 5.0 and higher:

1. Enable SSP function to connect to the host without a pin code.



Enable Smart Phone mode

Enable Secure Simple Pairing

2. The scanner should be on the list of discoverable devices. The default name of the scanner is "ZBBT".
3. Select "ZBBT" from the list to connect the device.

Multimedia Keyboard

For all other iOS and Android versions (Default Setting):

1. Enable Multimedia keyboard mode to display on-screen keyboard on the mobile device when you press the Function button.



Multimedia Keyboard mode

2. Enable wireless connection on your host and set it to discover other wireless devices in its surrounding.
3. The scanner should be on the list of discoverable devices. The default name of the scanner is "ZBBT". Select "ZBBT" from the list.
4. Use the scanner to scan the ASCII table in previous section to input pin code. For example: if the pin code is "0111", scan "0", "1", "1", "1" from ASCII barcode labels, then scan Set barcode to save the configuration.



Set

Scan to save the configuration

5. Scan the Enter barcode to confirm.

Setting Pin Code

1. To change the pin code, use the "Set pin code" setting. Default is "12345678".



Set pin code (SPP Host only)

Set pin code

2. Use the ASCII table in Programming Guide to input the new code (must be at least 4 digits and not more than 8 numeric digits), then scan Set barcode to save the configuration.



Set

Scan to save the configuration



Please check the User's Manual from your PC for wireless address and pin code.

Deleting pin code

To delete pin code, use the “Delete pin code setting”.



Delete the stored pin code

Delete pin code

Reset Name

To change the scanner name back to the default name “ZBBT” use the “Default device name” setting.



Change device name back to default “ZBBT”

Default device name

Setting Name

1. To change the name displayed when the scanner is discovered, scan the “Friendly device name set” label. Default name is “ZBBT”.



Change the display name when scanner is discovered

Friendly device name set

2. Use the ASCII table in Programming Guide to input the name (Max.12 digits).
3. Scan “Confirm Setting” to store the new name.



Scan to save the configuration

Set

Wireless Discovery

Use the following settings to show or hide the device from wireless discovery.



Discover enable

Make scanner visible to wireless device

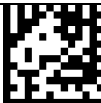







Discover disable

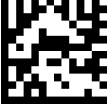


Make scanner invisible to wireless device

Program Settings





Default values are highlighted in grey background.

Barcode Value	Description
	Return scanner to factory defaults
	Return cradle host to factory defaults
	Return to USB default (Communication cradle link required)
	Return to RS232 default (Communication cradle link required)
	Return as USB-virtual COM port default
	Display firmware version





Scan Modes


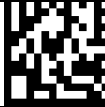




	<p>Trigger mode The scanner becomes inactive as soon as the data is transmitted. It must be triggered to become active again.</p>
	<p>Auto scan mode The scanner is still active after the data is transmitted but the successive transmission of the same barcode is not allowed when the trigger switch is pressed again.</p>
	<p>Presentation mode Also called auto trigger mode. The scanner is inactive but will automatically detect barcodes presented in the scan zone and become active.</p>

AIM light , illumination Light control

	<p>NO_USE_ILLUM</p>
	<p>USE_ILLUM</p>
	<p>NO_USE_AIM</p>
	<p>USE_AIM</p>












Radio Communication Settings



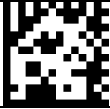

<i>BT HID mode</i>		
		BT HID mode (Combo keyboard)
		For Apple mode (Enter PIN CODE then scan SET)
		Multi Media Keyboard (For Apple Mode)
		Software Keyboard ON/OFF(For Apple Mode)






<i>SPP Host/Client mode</i>		
		Scanner SPP Host enable SPP Host
		Scanner SPP Client enable
		Setting wireless address (SPP Host only)
		Set PIN code (SPP Host only)
		Default Device name
		Friendly device name set



	Delete pin code
	Required Pair with client (SPP Host)
	Discover enable
	Discover disable
	Encryption enable
	Encryption disable







Functional Settings





<i>Same Code Delay</i>		
		50 msec
		100 msec
		200 msec
		300 msec
		400 msec
		500 msec
		600 msec
		700 msec
		800 msec
		1000 msec
		Infinite










Good Read Beeper Tone Selection	
	Medium beeper tone
	High beeper tone
	Low beeper tone
	Speaker disable







Beeper Duration Selection	
	Long
	Medium
	Short
	Ultra Short
	Ultra Long






<i>Vibrator Selection</i>	
	Vibrator enable
	Vibrator disable




<i>Inter Character Delay</i>	
	0 ms
	2 ms
	5 ms
	10 ms
	20 ms
	50 ms








<i>Inter Message Delay</i>	
	0 ms
	100 ms
	500 ms
	1000 ms





Power off Timeout Parameter	
	Power off timeout=5 min
	Power off timeout=10 min
	Power off timeout=20 min
	Power off timeout=30 min
	Power off timeout=1 hr
	Power Off timeout : 2 hr
	Power Off timeout : 4 hr
	Power Always On
	Power off by scanning this label








RS-232C Interface Setting	
Baud Rate	
	115200
	19200
	9600
	4800
	2400
	1200












Parity Bit	
	Even parity
	Odd parity
	Mark parity
	Space parity
	None parity






<i>Stop Bit</i>		
		1 stop bit
		2 stop bit
<i>Data Bit</i>		
		7 data bit
		8 data bit




<i>Handshaking Protocol</i>		
		None handshaking
		ACK/NAK
		Xon/Xoff
		RTS/CTS
		ACK/NAK response time 300ms
		ACK/NAK response time 2 sec
		ACK/NAK response time 500 ms


	ACK/NAK response time 3 sec
	ACK/NAK response time 1 sec
	ACK/NAK response time 5 sec
	ACK/NAK response time infinity

<i>Message Terminator (For Cradle)</i>	
	RS-232 message terminator—none
	RS-232 message terminator—CR/LF
	RS-232 message terminator—CR
	RS-232 message terminator—LF
	RS-232 message terminator—H tab
	RS-232 message terminator—STX/ETX
	RS-232 message terminator—EOT












Keyboard Wedge Setting (For Cradle)	
	International Keyboard mode (ALT method)
	Keyboard language support---USA
	Keyboard language support---UK send scan code
	Keyboard language support---GERMANY
	Keyboard language support---FRENCH send scan code
	Keyboard language support---SPANISH send scan code
	Keyboard language support---ITALIAN send scan code
	Keyboard language support---Switzerland send scan code
	Keyboard language support---Belgium send scan code
	Keyboard language support---Japanese
	Capital lock on
	Capital lock off






	Function key emulation enable
	Function key emulation disable
	Send number as normal data
	Send number as keypad data
	Alphabet follow as keyboard RS-232 also available
	Alphabet always upper case RS-232 also available
	Alphabet always Lower case RS-232 also available_








Message Terminator(For Cradle)	
	Keyboard terminator---none
	Keyboard terminator---Enter
	Keyboard terminator---H-TAB













<i>Terminator(For Scanner)</i>	
	Message terminator—none
	message terminator—CR/LF
	message terminator—CR
	message terminator—LF
	message terminator—H tab
	message terminator—STX/ETX
	message terminator—EOT
	Alphabet follow as keyboard RS-232 also available
	Alphabet always upper case RS-232 also available
	Alphabet always Lower case RS-232 also available





Symbology Settings

CODABAR	
	Codabar enable
	CODABAR disable
	Codabar data redundant check=off
	Codabar data redundant check=1
	Codabar data redundant check=2
	Codabar data redundant check=3
	Codabar start/stop character transmission-----none
	Codabar start/stop character transmission-----A,B,C,D
	Codabar start/stop character transmission-----DC1~DC4
	Codabar start/stop character transmission-----a/t,b/n,c/* ,d/e
	Codabar start/stop character transmission -a,b,c,d









		Codabar maximum length setting
		Codabar minimum length setting
		No check character
		Validate modulo 16, but don't transmit
		Validate modulo 16, but transmit











Code39		
		Code 39 enable
		Code 39 disable
		Code 32 enable
		Code 32 disable
		Code 39 data redundant check=off
		Code 39 data redundant check=1
		Code 39 data redundant check=2









		Code 39 data redundant check=3
		Standard code 39
		FULL ASCII code 39
		Code 39 start/stop character transmission
		Code 39 start/stop character without transmission
		Code 39 check digit calculate and transmit
		Code 39 check digit calculate but without transmit
		No check character
		Code 39 maximum length setting
		Code 39 minimum length setting
		Code39 Data Redundant check = off
		Code39 Data Redundant check = 1











		Code39 Data Redundant check = 2
		Code39 Data Redundant check = 3
		Code 32 (Italian pharmacy)transmit "A" character
		Code 32 (Italian pharmacy)without transmit "A" character








Code 93





		Code 93 enable
		Code 93 disable
		Code 93 data redundant check=off
		Code 93 data redundant check=1
		Code 93 data redundant check=2
		Code 93 data redundant check=3
		Code 93 maximum length setting
		Code 93 minimum length setting











<i>Code 128</i>	
	Code 128 enable
	Code 128 disable
	EAN-128 enable
	EAN-128 disable
	Code 128 data redundant check=off
	Code 128 data redundant check=1
	Code 128 data redundant check=2
	Code 128 data redundant check=3
	Code 128 maximum length setting
	Code 128 minimum length setting

<i>Chinese post code(SLZ)</i>	
	Chinese post code enable
	Chinese post code disable
	Chinese post code data redundant check=off
	Chinese post code data redundant check=1
	Chinese post code data redundant check=2
	Chinese post code data redundant check=3
	Chinese post code check digit calculate and transmit
	Chinese post code check digit calculate but without transmit

<i>MSI/PLESSY</i>	
	MSI enable
	MSI disable
	MSI/PLESSY maximum length setting
	MSI/PLESSY minimum length setting
	MSI/Plessy double check digit calculate but not transmit
	MSI/Plessy double check digit without calculate and transmit
	MSI/Plessy double check digit calculate but only first digit transmit
	MSI/Plessy double check digit calculate and both transmit
	MSI/Plessy single check digit calculate but without transmit
	MSI/Plessy single check digit calculate and transmit



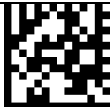


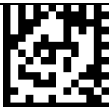
CODE 11		
		CODE 11 enable
		CODE 11 disable
		CODE 11 maximum length setting Default length 6 ~32 character
		CODE 11 minimum length setting
		Disable verification
		Code 11 check digit transmitted
		Code 11 check digit not transmitted













ITF 2 of 5		
		ITF 2 of 5 enable
		ITF 2 of 5 disable
		ITF 25 data redundant check=off
		ITF25 data redundant check=1













		ITF25 data redundant check=2
		ITF 25 data redundant check=3
		ITF 2 of 5 code maximum length setting
		ITF 2 of 5 code minimum length setting
		ITF 2 of 5 no check character
		ITF 2 of 5 check digit calculate and transmit
		ITF 2 of 5 check digit calculate but without transmit
		ITF 2 of 5 one Fixed length setting
		ITF 2 of 5 two Fixed length setting
		ITF 2 of 5 length variable













<i>Telepen</i>	
	Telepen Enable
	Telepen Disable













<i>Pharmacode</i>	
	Pharmacode Enable
	Pharmacode Disable












<i>UPC/EAN/JAN</i>	
	EAN convert to ISSN/ISBN enable
	EAN convert to ISSN/ISBN disable
	UPC/EAN/JAN enable
	UPC/EAN/JAN disable
	EAN-8 OR EAN-13 ENABLE
	UPC-A AND EAN-13 ENABLE







	UPC-A AND UPC-E ENABLE
	UPC-A ENABEL
	UPC-E ENABLE
	EAN-13 ENABLE
	EAN-8 ENABEL
	UPC/EAN ADDon off
	Addon 5 only
	Addon 2 only
	Addon 2 or 5
	Force UPC-E to UPC-A format enable
	Force UPC-E to UPC-A format disable
	Force UPC-A to EAN-13 format enable







		Force UPC-A to EAN-13 format disable
		Transmit UPC-A check digit enable
		Transmit UPC-A check digit disable
		Transmit UPC-E leading character enable
		Transmit UPC-E leading character disable
		Transmit UPC-E check digit enable
		Transmit UPC-E check digit disable
		Transmit EAN-8 check digit enable
		Transmit EAN-8 check digit disable
		Transmit EAN-13 check digit enable
		Transmit EAN-13 check digit disable
		Transmit UPC-A leading character enable






		Transmit UPC-A leading character disable
		Addon format with separator
		Addon format without separator
		EAN/UPC +addon (none mandatory)
		EAN/UPC +addon (mandatory)
		EAN-8 to EAN-13 format enable
		force EAN-8 to EAN-13 format disable
		EAN-13 first "0" can transmitted
		EAN-13 first:"0" can't transmitted
		EAN-13 with first 0 ID code same as "UPC-A"
		EAN-13 with first 0 ID code same as "EAN-13"
		double code disable(9784/192) default




		double code enable(9784/192)
		double code send for other default
		double code not send for other
		EAN/UPC +addon mandatory for 491 Japanese (bookland) Supplement requirement, not sent for other
		EAN/UPC +addon mandatory 491 Japanese (bookland) Supplement requirement, optionally for other
		EAN/UPC +addon mandatory for 978/977 (bookland) Supplement requirement, not sent for other
		EAN/UPC +addon mandatory for 978/977 (bookland) Supplement requirement, optionally for other
		UPC-A data redundant check=off
		UPC-A data redundant check=1
		UPC-A data redundant check=2
		UPC-A data redundant check=3
		UPC-E data redundant check=off













		UPC-E data redundant check=1
		UPC-E data redundant check=2
		UPC-E data redundant check=3
		EAN-13 data redundant check=off
		EAN-13 data redundant check=1
		EAN-13 data redundant check=2
		EAN-13 data redundant check=3
		EAN-8 data redundant check=off
		EAN-8 data redundant check=1
		EAN-8 data redundant check=2
		EAN-8 data redundant check=3







<i>Standard 2 of 5</i>		
		STD 2 of 5 code enable
		STD 2 of 5 code disable
		Standard 2 of 5 check digit calculate and transmit
		Standard 2 of 5 check digit calculate without transmit
		STD 2 of 5 code maximum length setting Default:6~32
		STD 2 of 5 code minimum length setting












Industrial 2 of 5	
	Industrial 2 of 5 Enable
	Industrial 2 of 5 Disable
	Industrial 2 of 5 check digit calculate and transmit
	Industrial 2 of 5 check digit calculate without transmit
	Industrial 2 of 5 code maximum length setting Default:6~32
	Industrial 2 of 5 code minimum length setting






Matrix 2 of 5	
	Matrix 2/5 code enable
	Matrix 2/5 code disable
	Matrix(Japanese) 2/5 code enable
	Matrix(Japanese) 2/5 code disable
	Matrix 2/5 code maximum length setting









		Matrix 2/5 code minimum length setting
		Matrix 2 of 5 check digit calculate and transmit
		Matrix 2 of 5 check digit calculate without transmit








GS1 Databar	
	GS1 Databar enable
	GS1 Databar disable
	GS1 Databar LIMITED enable
	GS1 Databar LIMITED disable
	GS1 Databar EXPANDED enable
	GS1 Databar EXPANDED disable
	GS1 Data Redundant check = off
	GS1 Data Redundant check = 1
	GS1 Data Redundant check = 2
	GS1 Data Redundant check = 3
	GS1 Limited Data Redundant check = off
	GS1 Limited Data Redundant check = 1


	GS1 Limited Data Redundant check = 2
	GS1 Limited Data Redundant check = 3
	GS1 Expanded Data Redundant check = off
	GS1 Expanded Data Redundant check = 1
	GS1 Expanded Data Redundant check = 2
	GS1 Expanded Data Redundant check = 3









<i>QR Code</i>	
	QR Code enable
	QR Code disable
	Micro QR Code enable
	QR Model 1 Code enable
	QR Model 1 Code disable
	Micro QR Code disable
	QR Code Mirror enable
	QR Code Mirror disable
	QR/MQR polarity setting = Dark on Light
	QR/MQR polarity setting = Light on Dark
	QR/MQR polarity setting = either

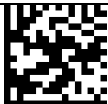

<i>DataMatrix</i>		
		DataMatrix enable
		DataMatrix disable
		DataMatrix Mirror enable
		DataMatrix Mirror disable
		DataMatrix polarity setting = either







PDF417		
		PDF417 enable
		PDF417 disable
		Micro PDF417 enable
		Micro PDF417e disable
		PDF417 Data Redundant check = off
		PDF417 Data Redundant check = 1
		PDF417 Data Redundant check = 2
		PDF417 Data Redundant check = 3


<i>Aztec</i>	
	Aztec enable
	Aztec disable
	Aztec Mirror enable
	Aztec Mirror disable
	Aztec polarity setting = Dark on Light
	Aztec polarity setting = Light on Dark
	Aztec polarity setting = either

<i>Maxi code</i>	
	Maxi code enable
	Maxi code disable











<i>POST code</i>		
		PostNet Enable
		PostNet Disable
		PLANET Enable
		PLANET Disable
		Australia Post Enable
		Australia Post Disable
		Royal Post Enable
		Royal Post Disable













Codablock F	
	Codablock F Enable
	Codablock F Disable













Composite Codes	
	CC-A Enable
	CC-A Disable
	CC-B Enable
	CC-B Disable
	CC-C Enable
	CC-C Disable




GS Substitution for NMVS Application	
This setting enables GS substitution function in barcodes with GS characters.	
	NMVS Disable (default) GS Substitution value: CTRL +]

		NMVS Enable GS Substitution value: Alt + 29
--	---	--








Data Editing				
		Disable identifier code		
		Enable identifier code table as ZEBEX standard		
		Enable identifier code table as AIM standard. Refer to appendix A.		
		CODE 39 identifier code setting	M	]A0
		ITF 2 of 5 identifier code setting	I	]I0
		CHINESE POST CODE identifier code setting	H	]h0
		UPC-E identifier code setting	E	]E0
		UPC-A identifier code setting	A	]E0
		EAN-13 identifier code setting	F	]E0
		EAN-8 identifier code setting	FF	]E0


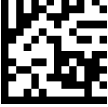







	CODABAR identifier code setting	N	]F0	
	CODE 128 identifier code setting	K	]C0	
	CODE 93 identifier code setting	L	]G0	
	MSI identifier code setting	N	]M0	
	GS1 Databar identifier code setting	RS	]e	
	GS1 Databar limited identifier code setting	RL	]e	
	GS1 Databar expanded identifier code setting	RX	]e	
	Industrial 2 of 5 Identifier code setting	D	]S0	
	Code 11 Identifier code setting	O	]H0	
	Standard 2 of 5 Identifier code setting	S	]R0	
	Matrix 2 of 5 (Japanese) Identifier code setting	G	]J0	
	Telepen identifier code setting	T	]T2	


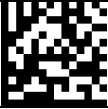









	PDF417 identifier code setting	p	]L0	
	QR Code identifier code setting	q	]Q1	
	DataMatrix identifier code setting	d	]d1	
	AZTEC identifier code setting	a	]z0	
	Maxi code identifier code setting	m	]U0	
	Add code length as header enable(all barcode)			
	Add code length as header disable (all barcode)			
	Header (Preamble)			
	Trailer (Post amble)			
	Truncate header character			
	Truncate trailer character			
	Inter message delay 0 ms			






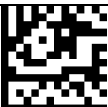
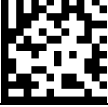
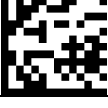



	Inter message delay 100 ms	
		Inter message delay 500 ms
	Inter message delay 1000 ms	




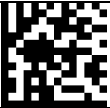








Full ASCII Data Matrix Table













Data Matrix	ASCII	Hexa- code
	Full ASCII ---NUL ~ZBN000000!	00
		Full ASCII ---SOH Function key----“Ins” ~ZBN000100!
	Full ASCII ---STX Function key----“Del” ~ZBN000200!	02
		Full ASCII ---ETX Function key---- “Home” ~ZBN000300!
	Full ASCII ---EOT Function key---- “End” ~ZB0000400!	04
		Full ASCII ---ENQ Function key----“Up arrow” ~ZBN000500!
	Full ASCII ---ACK Function key---- “Down arrow” ~ZBN000600!	06













		Full ASCII ---BEL Function key-----“Left arrow” ~ZBN000700!	07
		Full ASCII ---BS Function key----- “Backspace” ~ZBN000800!	08
		Full ASCII ---HT Function key----- “TAB” ~ZBN000900!	09
		Full ASCII ---LF Function key----- “Enter (alpha numeric” ~ZBN000A00!	0A
		Full ASCII ---VT Function key----- “right arrow” ~ZBN000B00!	0B
		Full ASCII ---FF Function key----- “PgUp” ~ZBN000C00!	0C
		Full ASCII ---CR Function key----- “Enetr(num.)” ~ZBN000D00!	0D
		Full ASCII ---SO Function key----- “PgDn” ~ZBN001E00!	0E
		Full ASCII ---SI Function key----- “Shift” ~ZBN000F00!	0F







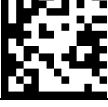

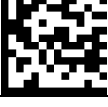

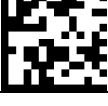

	Full ASCII ---DLE Function key---- "5(num)" ~ZB001000!	10
	Full ASCII ---DC1 Function key----"F1" ~ZBN001100!	11
	Full ASCII ---DC2 Function key----"F2" ~ZBN001200!	12
	Full ASCII ---DC3 Function key----"F3" ~ZBN001300!	13
	Full ASCII ---DC4 Function key----"F4" ~ZB001400!	14
	Full ASCII ---NAK Function key----"F5" ~ZBN001500!	15
	Full ASCII ---SYN Function key----"F6" ~ZBN001600!	16
	Full ASCII ---ETB Function key----"F7" ~ZBN001700!	17
	Full ASCII ---CAN Function key----"F8" ~ZB001800!	18
	Full ASCII ---EN Function key----"F9" ~ZBN001900!	19
	Full ASCII ---SUB Function key---- "F10" ~ZBN001A00!	1A



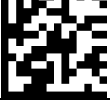









		Full ASCII ---ESC Function key---- “F11” ~ZBN001B00!	1B
		Full ASCII ---FS Function key---- “F12” ~ZBN001C00!	1C
		Full ASCII ---GS Function key---- “ESC” ~ZBN001D00!	1D
		Full ASCII ---RS Function key---- “CTL(L)” ~ZBN001E00!	1E
		Full ASCII ---US Function key---- “ALT(L)” ~ZBN001F00!	1F
		Full ASCII ---SP ~ZBN002000!	20
		Full ASCII ---! ~ZBN002100!	21
		Full ASCII ---“ ~ZBN002200!	22
		Full ASCII ---# ~ZBN002300!	23
		Full ASCII ---\$ ~ZBN002400!	24
		Full ASCII ---% ~ZBN002500!	25













	Full ASCII ---& ~ZBN002600!	26
	Full ASCII ---' ~ZBN002700!	27
	Full ASCII --- (~ZBN002800!	28
	Full ASCII ---) ~ZBN002900!	29
	Full ASCII ---* ~ZBN002A00!	2A
	Full ASCII ---+ ~ZBN002B00!	2B
	Full ASCII ---, ~ZBN002C00!	2C
	Full ASCII ---- ~ZBN002D00!	2D
	Full ASCII ---. ~ZBN002E00!	2E
	Full ASCII ---/ ~ZBN002F00!	2F
	Full ASCII ---0 ~ZBN003000!	30
	Full ASCII ---1 ~ZBN003100!	31













	Full ASCII ---2 ~ZBN003200!	32
	Full ASCII ---3 ~ZBN003300!	33
	Full ASCII ---4 ~ZBN003400!	34
	Full ASCII ---5 ~ZBN003500!	35
	Full ASCII ---6 ~ZBN003600!	36
	Full ASCII ---7 ~ZBN003700!	37
	Full ASCII ---8 ~ZBN003800!	38
	Full ASCII ---9 ~ZBN003900!	39
	Full ASCII ---: ~ZBN003A00!	3A
	Full ASCII ---; ~ZBN003B00!	3B
	Full ASCII ---< ~ZBN003C00!	3C
	Full ASCII ---= ~ZBN003D00!	3D




	Full ASCII ---> ~ZBN003E00!	3E
	Full ASCII ---? ~ZBN003F00!	3F
	Full ASCII ---@ ~ZBN004000!	40
	Full ASCII ---A ~ZBN004100!	41
	Full ASCII ---B ~ZBN004200!	42
	Full ASCII ---C ~ZBN004300!	43
	Full ASCII ---D ~ZBN004400!	44
	Full ASCII ---E ~ZBN004500!	45
	Full ASCII ---F ~ZBN004600!	46
	Full ASCII ---G ~ZBN004700!	47
	Full ASCII ---H ~ZBN004800!	48
	Full ASCII ---I ~ZBN004900!	49

	Full ASCII ---J ~ZBN004A00!	4A
	Full ASCII ---K ~ZBN004B00!	4B
	Full ASCII ---L ~ZBN004C00!	4C
	Full ASCII ---M ~ZBN004D00!	4D
	Full ASCII ---N ~ZBN004E00!	4E
	Full ASCII ---O ~ZBN004F00!	4F
	Full ASCII ---P ~ZBN005000!	50
	Full ASCII ---Q ~ZBN005100!	51
	Full ASCII ---R ~ZBN005200!	52
	Full ASCII ---S ~ZBN005300!	53
	Full ASCII ---T ~ZBN005400!	54
	Full ASCII ---U ~ZBN005500!	55

	Full ASCII ---V ~ZBN005600!	56
	Full ASCII ---W ~ZBN005700!	57
	Full ASCII ---X ~ZBN005800!	58
	Full ASCII ---Y ~ZBN005900!	59
	Full ASCII ---Z ~ZBN005A00!	5A
	Full ASCII ---[~ZBN005B00!	5B
	Full ASCII ---\ ~ZBN005C00!	5C
	Full ASCII ---] ~ZBN005D00!	5D
	Full ASCII ---^ ~ZBN005E00!	5E
	Full ASCII ---_ ~ZBN005F00!	5F
	Full ASCII ---` ~ZBN006000!	60
	Full ASCII ---a ~ZBN006100!	61

	Full ASCII ---b ~ZBN006200!	62
	Full ASCII ---c ~ZBN006300!	63
	Full ASCII ---d ~ZBN006400!	64
	Full ASCII ---e ~ZBN006500!	65
	Full ASCII ---f ~ZB006600!	66
	Full ASCII ---g ~ZBN006700!	67
	Full ASCII ---h ~ZBN006800!	68
	Full ASCII ---i ~ZBN006900!	69
	Full ASCII ---j ~ZBN006A00!	6A
	Full ASCII ---k ~ZBN006B00!	6B
	Full ASCII ---l ~ZBN006C00!	6C
	Full ASCII ---m ~ZBN006D00!	6D

	Full ASCII ---n ~ZBN006E00!	6E
	Full ASCII ---o ~ZBN006F00!	6F
	Full ASCII ---p ~ZBN007000!	70
	Full ASCII ---q ~ZBN007100!	71
	Full ASCII ---r ~ZBN007200!	72
	Full ASCII ---s ~ZBN007300!	73
	Full ASCII ---t ~ZBN007400!	74
	Full ASCII ---u ~ZBN007500!	75
	Full ASCII ---v ~ZBN007600!	76
	Full ASCII ---w ~ZBN007700!	77
	Full ASCII ---x ~ZBN007800!	78
	Full ASCII ---y ~ZBN007900!	79

		Full ASCII ---z ~ZBN007A00!	7A
		Full ASCII ---{ ~ZBN007B00!	7B
		Full ASCII ---| ~ZBN007C00!	7C
		Full ASCII ---} ~ZBN007D00!	7D
		Full ASCII ---~ ~ZBN007E00!	7E
		Full ASCII ---DEL ~ZBN007F00!	7F

Appendix 1: USB Virtual COM Driver Installation

Contact your distributor to get the driver and follow the steps below to enable USB virtual COM port.

1. Connect the handheld scanner and the host (e.g. a PC) with a USB interface cable.
2. Enable USB virtual COM port with programming barcode from System Function Settings.
3. After the programming, the host would request driver installation. Browse your files to locate the driver and start installation.
4. The USB virtual COM port is ready for use after driver installation.

Appendix 2: Barcode Length Setting

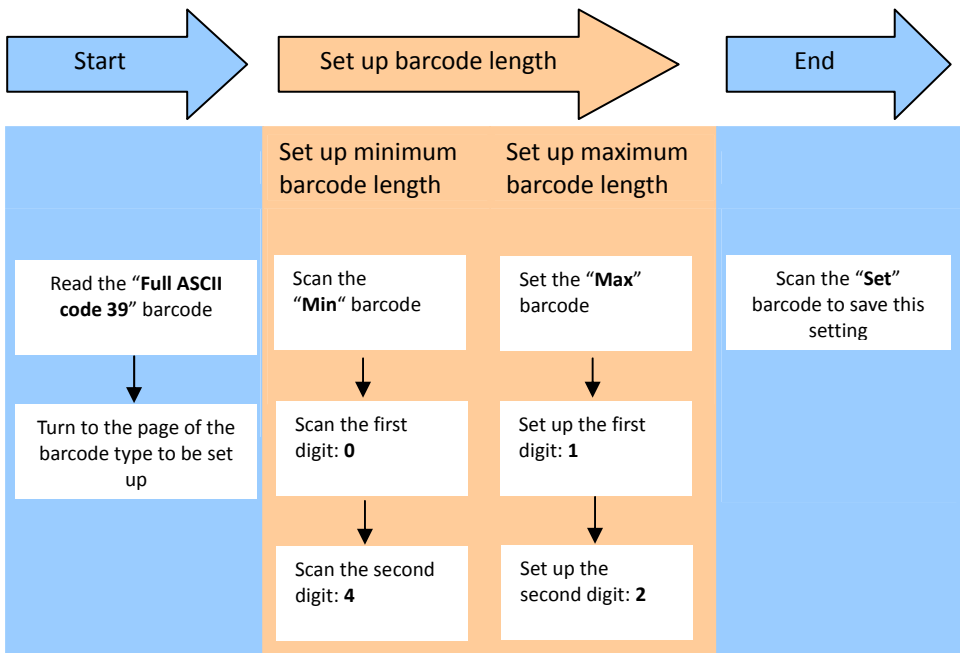
Introduction

The length of a barcode is the number of characters it contains, including check digits. As listed in the Default Parameters section, each barcode type has different default length. You may change the setting by the following procedure.

To set up barcode length, the parameters to be determined are barcode type and the desired barcode length. Barcode length is consisted of 2 digits. For numbers smaller than 10, you need to add a "0" in the front.

Example

If the barcode length is 4 to 12 digits, the steps would be as below:



Use the ASCII table (Appendix 4) to set up barcode length. Be sure to enable the full ASCII code 39 option before you start and read the "Set" label to set your choice into memory.