

# **CELL-DYN® 1800**

# OPTICON OPT-6125 Trigger-Activated Hand-Held Bar Code Scanner USER'S GUIDE

Part No. 9140394A

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# NOTES

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## NOTES

# Scanner Installation:

#### Materials Required:

- OPTICON OPT-6125 Bar Code Scanner
- Adapter Cable, 5-Pin AT to 6-Pin PS/2
- Bar Code Scanner Holder (optional)
- 1. From the **MAIN MENU** press **SPECIAL PROTOCOLS**, then **DAILY SHUTDOWN**. Wait for the sequence to complete (approximately 5 minutes).
- 2. Power OFF the CELL-DYN 1800 System.

## A. Install New Bar Code Scanner

1. Disconnect the keyboard cable from the right side of the CELL-DYN 1800 System.



OPTICON OPT-6125 Barcode Scanner with Adapter Cable

- 2. Plug the CELL-DYN 1800 Keyboard Cable into the Scanner Cable at the 5-pin AT connector, making sure the pins line up.
- 3. Plug the 6-pin PS/2 connector on the Adapter Cable into the matching connector on the Scanner Cable, making sure the pins line up.
- 4. Plug the 5-pin AT connector on the Adapter Cable into the connector on the right side of the CELL-DYN 1800 System, making sure the pins line up.
- Attach the (optional) Bar Code Scanner Holder to the right side of the CELL-DYN 1800 System by removing the adhesive covering and pressing the hanger firmly to the instrument.
- Power ON the CELL-DYN 1800 System, wait for the INITIALIZED message to appear in the Status Box, then press PRIME/RUN to bring the CELL-DYN to READY.

## B. Replace Current Bar Code Scanner

Disconnect scanner cable from keyboard port of the analyzer, disconnect the keyboard cable from existing scanner. Follow steps 2 to 6 in Section A.

# Scanner Operation:

To scan bar codes, hold the scanner approximately 1.2 inches away and aim directly at the bar code. Squeeze the trigger handle on the underside of the reader to activate the red light beam. Aim the beam of light to scan horizontally across the entire bar code length as shown below. A successful read will be indicated by an audible beep. When a successful read is indicated, the scanner will automatically enter standby mode, and the light beam will turn off. The scanner is then ready to scan the next bar code.



# **Cleaning the Scanner Lens:**

The Bar Code Scanner may have trouble reading bar codes if the lens becomes dirty or smudged. Clean the scanner lens to correct the problem.

### Materials Required:

- Cotton swabs
- Deionized water or denatured alcohol
- Lint-free cloth

#### Procedure:

- 1. Dampen a cotton swab with deionized water or denatured alcohol.
- 2. Gently swab the Bar Code Scanner lens.
- Dry the lens with a lint-free cloth before scanner use.
  Note: Do not use cleaning materials that may scratch the lens.
- **Note:** If you have any questions or require further assistance, U.S. customers contact Abbott Customer Service at 1-877-4ABBOTT (1-877-422-2688). Customers outside the U.S., contact your local Hematology Customer Support representative.

# Troubleshooting the Scanner:

If the scanner is not responding, or does not scan bar codes, use the troubleshooting steps below.

- Verify proper scanner installation. Point the scanner at a piece of paper and squeeze the trigger to see if the red light beam is activated.
- Verify the bar code printer is configured for the symbology and options expected.
- Verify configuration of scanner matches the configuration of the bar code printer.
- Verify the labels are not smudged or damaged.
- Verify proper label placement on the tube. Consult the CELL-DYN 1800 Operator's Manual.
- Ensure the light beam scans across the entire length of the bar code.
- Verify the lens of the reader is clean. If the lens has splattered reagent or sample residue on it, misreads will occur. Refer to Cleaning the Scanner Lens section within this guide.
- Verify the quality of the bar codes printed by the bar code printer. There may be a malfunction of the bar code printer.
- Try varying the read distance. Hold the reader approximately 1.2 inches away from the bar code.
- Try varying the angle of the reader up or down slightly.
- Try reprogramming the reader using the appropriate codes in this document.
- **Note:** If misreads continue to occur after applying these troubleshooting techniques, U.S. customers call Abbott Customer Service at 1-877-4ABBOTT (1-877-422-2688).

Customers outside the U.S., contact your local Hematology Customer Support representative.

# Configuring the Scanner:

The scanner is ready to use, in the default configuration listed below, upon installation. Limited configuration changes can be made by using the configuration codes in this document.

**Note:** If more detailed configuration changes are needed, U.S. customers call Abbott Customer Service at 1-877-4ABBOTT (1-877-422-2688). Customers outside the U.S., contact your local Hematology Customer Support representative.

#### Default configuration:

- Keyboard: English (No check digit)
- Trigger: Active while pressed, Standby after a good read
- Active Symbologies:
  - Code 39 Check Digit: Not Used Bar Length: Any Length
  - Codabar Check Digit: Not Used Bar Length: Any Length
  - Code 128 / EAN 128 Bar Length: Any Length
  - Interleaved 2 of 5 Check Digit: Not Used Bar Length: Minimum Length 4

### Bar Code Symbologies Supported:

- CODE 39, with modulo 43 check digit, or without check digit
- CODABAR, with AIM recommended check digit, or without check digit
- CODE 128 / EAN 128
- INTERLEAVED 2 OF 5 (I 2 of 5), minimum length 4, with mod 10 check digit, or without check digit

# Configuration Bar Codes:

The following pages contain special Configuration Bar Codes for configuring the OPTICON OPT-6125 Trigger-Activated Bar Code Scanner. The scanner can be configured to use all of the four supported Bar Code symbologies *(with check digit)* for Code 39, Codabar, and I 2 of 5, or can be configured for *(No check digit)* for Code 39, Codabar, and I 2 of 5. Code 128 is active for both choices.

# Programming the Scanner:

This manual contains information that allows the user to change certain programmable parameters of the scanner. The scanner is ready to use - no additional programming is required in most situations. The scanner has been programmed at the factory with the most common settings. These factory default settings are ideal for most situations.

A specific parameter is set or changed by scanning one or more of the special programming bar codes found on the following pages. For each parameter, user can choose from a menu of options. When scanning the special bar code for a specific menu option, the scanner retains the changes that have been made even if the scanner is disconnected from the power source.

#### **Programming Instructions:**

- 1. Select "KEYBOARD TYPE" option from the Table 1.
- 2. Scan the **"START"** barcode. The scanner will beep continuously to indicate that it is ready to be programmed. When the scanner is in Programming Mode, it cannot read normal bar code. It can only read the special barcodes found on the following pages.
- Select desired keyboard type and scan the bar code. The scanner will beep once and the green light will flash, indicating the desired parameter has been scanned. The scanner will continue to beep continuously while in Programming Mode.
- 4. Scan the **"END"** barcode. The scanner will stop beeping, indicating that it is back in normal scanning mode. The changes made while in Programming Mode are now saved in the scanner's memory.
- Select the "NO CHECK DIGIT" options from Table 2 OR Select the "WITH CHECK DIGIT" options from Table 3.

6. Scan the **"START"** barcode. The scanner will beep continuously to indicate that it is ready to be programmed. When the scanner is in Programming Mode, it cannot read normal bar code. It can only read the special barcodes found on the following pages.

7. Scan all the barcodes from Table 2 (or Table 3). The scanner will beep once and the green light will flash, indicating the desired parameter has been scanned. The scanner will continue to beep continuously while in Programming Mode.

8. Scan the **"END"** barcode. The scanner will stop beeping, indicating that it is back in normal scanning mode. The changes made while in Programming Mode are now saved in the scanner's memory.

9. Proceed to Verifying the Configuration section within this guide.

TABLE 1-KEYBOARD TYPE	
START	
English keyboard	
French keyboard	
German keyboard	
Italian keyboard	
Spanish keyboard	
END	

TABLE 2-NO CHECK DIGIT		
START		
Code 39 Check Digit: Not Used Bar Length: Any Length		
Codabar Check Digit: Not Used Bar Length: Any Length		
Interleaved 2 of 5 Check Digit: Not Used Bar Length: Minimum Length 4		
END		

TABLE 3 – CHECK DIGIT		
START		
Code 39 Check Digit: Modulus 43, checked but not transmitted Bar Length: Any Length		
Codabar Check Digit: AIM recommendation, checked but not transmitted Bar Length: Any Length		
Interleaved 2 of 5 Check Digit: Mod 10, checked but not transmitted Bar Length: Minimum Length 4		
END		

**NOTE:** If it is necessary to reset the scanner to factory default configuration, scan all the following barcodes per Table 4 in succession to set the scanner back to factory defaults.

TABLE 4 – FACTORY DEFAULTS		
START		
USB Defaults		
Single Read Mode		
Minimum Data Lengths		
END		

#### Prepare for scanner verification.

- 1. Once analyzer in **Ready** state
- 2. From the **Main** menu, press the following softkey: **RUN / SPECIMEN TYPE / PATIENT SPECIMEN**
- 3. With cursor in **Next ID** field, start scanning the appropriate bar codes from section **Verifying the Configuration**.

# Verifying the Configuration

Scan the appropriate test bar code(s) on these two pages to verify the configuration.

#### CODABAR (No check digit)



CODABAR (With check digit)



CODE 39 (No check digit)



CODE 39 (With check digit)



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**CODE 128** 

INTERLEAVED 2 of 5 (No check digit)



INTERLEAVED 2 of 5 (With check digit)



## NOTES