



DDMS
Inventory
Scanning
Manual

DDMS INVENTORY SCANNING MANUAL

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INTRODUCTION

Control over inventory is one of the key elements in building and maintaining a successful Office Products dealership. Establishing inventory control requires accurate inventory counts on a periodic basis. However, inventory counts have traditionally carried a high cost in terms of time and manpower. A dealer could either divert personnel from other projects to perform the counts in-house, or contract an outside firm to perform the job.

Now, dealers can use the M3000 portable bar code scanner in conjunction with the DDMS system to perform inventory counts with a significant savings of both time and manpower, eliminating the expense of hiring outside inventory control personnel. In addition to the time savings, using bar code scanning for inventory control also increases the accuracy of your inventory counts.

With the M3000 scanner, taking inventory is as easy as scanning an item's bar code label and entering the quantity, and, optionally, the bin location. This ensures that each quantity is recorded for the correct item, unlike manual count sheets. When the count is finished, the quantities are downloaded directly from the scanner to your DDMS system, converted into a SHORT-BUYS-type file, and then released to a purchase order, eliminating the errors that can occur when manually keying in items from a count sheet. Once the quantities have been transferred to a purchase order, the purchase order can be received and released to on-hand quantities exactly as though you had performed the count manually.

Bar code scanning offers very real benefits to Office Products dealers. In addition to increased accuracy and reduced costs, it makes it easy to rely on cycle counts to maintain accurate inventory quantities. Once you have taken a complete inventory and have accurate quantities in your system, you can use cycle counts to ensure the continuing accuracy of these figures. The overwhelming speed advantages of bar code scanning make it easy to perform cycle counts on a regular basis. However, to get the maximum benefit from this method of inventory control, some preparation is necessary.

Regardless of whether you are counting inventory manually or scanning bar codes, items should be neatly arranged and located in the correct shelf or bin location. Good stocking practices dramatically increase the speed of any inventory count. In addition, you should make sure that all of your items have been bar coded and the codes set up as aliases for the item numbers in the (ES) Inventory Alias screen. (For detailed information on setting up bar codes in the (ES) screen, refer to "Chapter 3: The Inventory Database" in the *O/P Dealer Systems Software Manual*.) Any items that are not bar coded have to be counted and manually entered on a purchase order.

DDMS recommends that you set up your store or warehouse with bar code shelf labels, not just labels on boxes or individual items. Experience has shown that shelf labels provide greater efficiency with respect to inventory control. When taking inventory, your employees can scan the shelf label, do a physical count, and move on the next item. This eliminates the time-consuming difficulties that can occur when trying to scan bar codes that are damaged or faded, covered with shrink wrap or printed on curved surfaces. In addition, shelf labels identify the correct location for each item, making stocking easier.

Shelf labels also provide an additional benefit for many dealers. Inventory control problems can result when a bar code does not match the inventory unit for an item. For example, a retail dealer might sell envelopes by the carton, the box, or individually, using a separate bar code for each. Regardless of which bar code is scanned, the unit measure is one. However, the inventory unit for these item is eaches, and the box represents 500 eaches, while the carton represents 2500. The recommended way

```

07:25:15                (ES) INVENTORY ALIAS  REV. (10/09/91)                02/19/92
=====
ACTION [S] A=Add C=Chg D=Del I=Inq R=Reindex X=Xerox E=EDI P=Print S=Scan Codes
===== B=Back To E =
Customer Name :COMMON                #.....10015 Dept :....
Suite        :..... City :KELLER..... State :TX
Street       :..... Phone :...-...-....
=====
Alias Number      Item Number      Co.      Description      Un
-----
43256            65001            C-LINE   8 X 5 ENVELOPES
=====

CUSTOMER UNIT [1 ]    FACTOR (M/D) [M]    FACTOR AMOUNT [500 ]
CORRECT RECORD Y/N ?Y
    
```

Figure 1. FACTOR AMOUNT Field

to handle this situation is to enter factor amounts for these items in the FACTOR AMOUNT field in the (ES) Inventory History screen, as shown in Figure 1. Then, when you scan the bar code for a box of envelopes, the system multiplies the quantity (one) by the factor amount—in this case 500—and uses the result as the quantity of the item. This means that your employees can simply scan the bar code and count the number of boxes. The system automatically converts the quantity to the correct unit of measure.

Dealers who have not set up factor amounts for all of their items must be sure to *enter the item quantity using the inventory unit of measure*. Otherwise, you will not have accurate quantities. For instance, in the example of the envelopes above, if you scan the bar code for a box of envelopes and are selling them by the each, you must enter a quantity of 500, not one. This is where bar code shelf labels can provide an invaluable reference for your employees while taking inventory. Unlike product labels, shelf labels include the inventory unit of measure. All your employees have to do is compare the unit of measure being scanned to the unit shown on the label and make any necessary adjustments when entering the quantity into the scanner.

As previously mentioned, careful preparation allows you to realize the full time-saving potential of bar code scanning while increasing the accuracy of your counts. The steps for actually performing inventory counts using bar code scanners are described in the following sections. **Section 1: Inventory Counts Checklist** provides a brief step-by-step overview of all of the procedures involved in performing an inventory count, from shutting down and backing up your system to printing an Inventory Extended Dollars Report. This checklist is very similar to the one published in the Fall, 1991, issue of *Key OPs* detailing the steps for manual inventory counts. The only differences are that additional steps have been added for downloading quantities from the portable scanner to your DDMS system and the counts are now transferred to a purchase order using the [S] Short Buys action code in the (F) Purchase Order Entry screen rather than entered manually using the [O] Order action code.

The remaining sections detail the operation of the M3000 portable bar code scanner and the procedures for downloading inventory counts to your DDMS system and converting them to a SHORT-BUYS-type file. However, once you become familiar with the scanner and the downloading and conversion procedures, you will probably be able to perform an inventory count using the checklist alone.

Before using the M3000 scanner for the first time, you need to perform certain setup functions. First, set up the (Y) System Status screen of your DDMS system to work with the scanner. Then you need to download setup information and two programs, PGM1 and PGM2, from your system to the scanner. Instructions for setting up your system's (Y) screen and downloading the setup information and inventory scanning programs can be found in **Appendix A: Setting Up the M3000 Bar Code Scanner**.

CHAPTER 1: INVENTORY COUNTS CHECKLIST

Read this chapter to obtain an overview of all of the procedures involved in performing an inventory count. This checklist provides only a brief description of each step, not detailed instructions. If you are unfamiliar with any of the procedures listed, or have any questions, refer to the *O/P Dealer Systems Software Manual* or, where noted, the appropriate chapter in this book.

This checklist contains all of the steps necessary for loading or updating on-hand inventory quantities in the DDMS system. To ensure that your inventory count is loaded into the system correctly, perform the following steps in the order they are listed.

Note: The following steps **must** be done in the order they are listed. Once you begin these procedures, be sure that no order entry functions are performed until these steps have been completed.

- (Z)[E6] Perform a level R shutdown before proceeding. This ensures that all data in cache memory has been written to the disk before backing up.
- (Z)[C3] Do a file-by-file backup of each PGDOS unit. Use your normal, day-end rotation tape. (You should have a backup tape for each day of the week. Once a tape has been used, **do not** use it again until the same day of the following week.) When the backup is complete, label the tape, turn the write-protect arrow to SAFE, and store the tape in a secure location.

Note: The [C3] backup is a **dedicated function**. Before performing this step, check the (Y) System Status screen to be sure all devices are idle.

- (C)[A] Create a vendor with the vendor number INVENTORY. Return through the screen to save it. Using the vendor INVENTORY lets you create purchase orders that will be released to on-hand inventory without affecting any of your actual vendors.
- (F)[R] Receive all purchase orders that have been received from vendors, but not yet entered as received, into the system. This lets you fill all of the backorders that you can before you begin your inventory count.
- (TR)[G] Flush all backorders.
- (TR)[H] Release all RECEIPTS to on-hand. At the prompt RELEASE TO ON-HAND, specify Y. This clears the receipts file.
- (RR)[C] Print a stock catalog report. Use the RIGHT HAND COLUMNS fields to print information such as on-hand quantities and bin locations. If your inventory has bin locations, DDMS recommends that you use bin locations to sort the report. If you are making a full inventory count, print a complete listing. If you are making a cycle count, print a stock catalog showing only the items that you want to include. Limit items to be counted by vendor, bin locations, and/or stock classes.

Note: This step is optional. You may elect to print an Inventory Extended Dollars Report instead of a stock catalog report.

- (R)[S]** Print an Inventory Extended Dollars Report. (This step is optional.) This report provides you with an extended dollar total of your inventory. When the cursor moves to the A/D/R/P field, specify **A** (average cost), **D** (direct buy replacement cost), **R** (wholesaler replacement cost), or **P** (list price). Specify **V** in the SORT 1 field and **Y** in the BREAK PAGES 1 field. This sorts the report by vendor and breaks pages between each vendor. Save this report for your audit trail.
- (+E)[F]** Clear on-hand quantities. If you are doing a full inventory count, press RETURN until the cursor reaches the SOURCE LOCATION field. If you are doing a cycle count, use the FROM/TO limiter fields to select only the appropriate vendors, stock classes, and bin locations. Use the SOURCE LOCATION and the DESTINATION LOCATION fields to specify the range of warehouse bin locations that you want to clear. When you have entered the locations that you want to clear, press TAB until the system displays the prompt ARE YOU SURE. Specify **Y** at this prompt.
- Take a physical inventory count by scanning bar code shelf labels with the M3000 bar code scanner. Be sure that the quantity you enter for each item corresponds to the unit of measure on the shelf label. For more information, refer to **Chapter 2: Using the M3000 Bar Code Scanner**.
- (+G)[C]** Download the inventory count from the M3000 scanner to your DDMS system. For more information, refer to **Chapter 3: Using the (+G) Special Portable Scanner Screen**.
- (+G)[D]** Create a SHORT-BUYS-type file from the data file containing the inventory counts. For more information, refer to **Chapter 3: Using the (+G) Special Portable Scanner Screen**.
- (F)[S]** Transfer the inventory counts to purchase orders with a vendor number of INVENTORY. At the prompt FILE TO USE FOR SHORT BUYS, enter the name of the file containing the scanned inventory counts. For more information on this file, refer to **CHAPTER 3: USING THE (+G) SPECIAL PORTABLE SCANNER SCREEN**. Be sure to space through the ONLY ITEMS THAT MATCH VENDOR field in the Short-Buys window. (This field defaults to INVENTORY.) Otherwise, only items with INVENTORY as a vendor number are placed on the purchase order.

Note: Do not use the vendor number DUMMY when creating purchase orders for entering your inventory count.

- (SR)[A]** When you have transferred the inventory counts to purchase orders, print the purchase orders to check the accuracy of the information. Make any necessary corrections using the [C] Change action code in the (F) Purchase Order Entry screen.
- (F)[R]** Final-receive items on the purchase orders you have created. The system displays a series of prompts. Press TAB at each prompt until the prompt IS ENTIRE P/O CORRECT is displayed. Specify **Y** at this prompt. This lets you receive all of the items on a purchase order at one time instead of receiving each item individually. At the prompt ENTER STARTING ITEM NUMBER OR RETURN FOR ALL, press RETURN.
- (TR)[G]** Flush all backorders.
- (TR)[H]** Print a Stock Receipts Report. At the prompt RELEASE TO ON-HAND, specify **Y**. This updates your on-hand quantities.

- (F)[D]** Delete all of the purchase orders you created for the vendor INVENTORY. This prevents them from being archived to the purchase order journal (JOUR-PO) and taking up valuable disk space.

Note: If you prefer to save the purchase orders you have created to provide inventory history, purge the purchase order journal (JOUR-PO) and archive them in the (SR) Purchase Order Reports screen.

- (+F)** Reset the on-order, backorder, allocated, and received quantities. There is no actual (+F) screen. When you select the [F] Reset Inventory Records function code in the (+) Special Programs screen, the system displays the ARE YOU SURE prompt. Specify **Y** to reset your on-order, backorder, allocated, and received quantities.

- (RR)[\$]** Print an Inventory Extended Dollars Report. This report shows an extended dollar total for your inventory. When the cursor moves to the A/D/R/P field, specify **A** (average cost), **D** (direct buy replacement cost), **R** (wholesaler replacement cost), or **P** (list price). Specify **V** in the SORT 1 field and **Y** in the BREAK PAGES 1 field to sort the report by vendor and break pages between each vendor. Save this report for your audit trail.

If you printed a copy of this report prior to clearing on-hand quantities, compare the totals for each vendor on that report with the totals on this copy of the report. Look for unusually large gains or losses. This alerts you to discrepancies between your physical count and the quantities that appear on purchase orders. If the quantity of an item was entered incorrectly, you can be adjust it manually in the (E) Inventory Master screen.

This completes the updating of your inventory file. However, the system creates and deletes a large number of records during this process. To maintain the efficiency of your system, DDMS recommends that you do an MB compression as soon as possible after entering your inventory counts. For more information on an MB compression, see **Chapter 25: Operational Backup Procedures and Changes Reports**.

CHAPTER 2: USING THE M3000 BAR CODE SCANNER

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Introduction

Read this chapter to learn how to perform inventory counts using the M3000 portable bar code scanner. You must set up the scanner before using it for the first time. This involves downloading the inventory scanning programs PGM1 and PGM2 from your system. If you have not already done this, refer to **Appendix A: Setting Up the M3000 Scanner** for more information.

Section 1: Selecting a Scanning Program and Inventory File

To prepare your scanner for counting, unplug the null modem cable from the port on the front of the scanner if you have not already done so. If the scanning wand is not already connected to the scanner, attach the black female connector on the wand to the black male connector on the front of the scanner.

You can use either PGM1 or PGM2 for your count. PGM1 lets you enter the item number and the quantity; PGM2 lets you enter item number, quantity, and bin number.

Setting Up Your Scanner

When you are ready to begin counting, press the scanner's ON button. The scanner displays the following message:

```
Portable Mode
Select Function
```

Note: When you turn on your scanner, you may see the RS232 SERIAL, KEYBOARD WEDGE, or SERIAL WEDGE message, instead of the PORTABLE MODE/SELECT FUNCTION message as shown above. This does *not* indicate a problem with your scanner. At some point, the SHIFT key was accidentally pressed. Your scanner will operate normally. You can restore the PORTABLE MODE/SELECT FUNCTION message by pressing the SHIFT key again.

Press the I/INPUT key. The scanner displays the following prompt:

```
Select Program
> PGM1
```

Note: When operating the M3000 scanner, be sure to use sufficient force when pressing the keys. The scanner beeps each time a key is pressed successfully. If you do not hear the beep, check the scanner's display screen to be sure that it recorded the keystroke.

When setting up your scanner, you downloaded two inventory scanning programs from your DDMS system. These programs are called PGM1 and PGM2. Both programs can be used to perform inventory counts. The difference is that PGM1 only allows you to enter a quantity for an item. When using PGM2, you can also enter the primary bin location for the item.

At this point, you must decide which of the scanning programs that you want to use. To use PGM1, press the ENTER key.

To use PGM2, press the DOWN arrow key. The scanner displays the following prompt:

```
Select Program
> PGM2
```

Press the ENTER key.

Once a scanning program has been selected, the scanner displays the following prompt:

```
Input File
> *New File*
```

At this point, you can create a new inventory file or add to an existing one.

Creating New Inventory Files

When the scanner displays the prompt INPUT FILE >*NEW FILE*, you can create a new inventory file. You can do this even if a file that you have already created has not been downloaded or deleted from the scanner. The M3000 scanner can store multiple inventory files in memory. This lets you divide the area you are counting into sections and create a separate file for each section without having to continually stop and download the counts to the DDMS system.

The inventory programs in your DDMS system include error-auditing that notify you of problems, unit of measure errors, or missing aliases. Dividing the area to be counted into several sections and using a unique file name for each section makes it easier for you to locate these items and correct the problem.

To begin a new file, press the ENTER key. The scanner displays the following prompt:

Enter File Name

Enter a unique file name. For example, if you are taking inventory in a retail store and want to make a separate file for each gondola, you might enter GON1 as the file name for the first gondola that you count.

If you are using inventory program PGM1, the scanner displays the following fields once you have entered the file name:

I/N
QTY

When the scanner displays these fields, you are ready to begin counting your inventory. For more information, refer to **Section 2: Taking Inventory Counts**.

If you are using inventory program PGM2, the scanner displays the following fields once you have entered the file name:

I/N
QTY BIN

When the scanner displays these fields, you are ready to begin counting your inventory. For more information, refer to **Section 2: Taking Inventory Counts**.

Changing Existing Files

When the scanner displays the prompt INPUT FILE >*NEW FILE*, you can also add to or change an existing inventory file. To do this, press the UP or DOWN arrow key until you see the name of the file that you want to use.

Note: When you use the arrow keys to display the files currently stored in the scanner, the scanner displays only the file for the program you have selected. For example, if you selected program PGM2, you would only see the inventory files created using that program. Any programs created using PGM1 would not appear, even though they are stored in the scanner. If there are no files for the selected program, the scanner continues to display the message INPUT FILE >*NEW FILE*.

Select a displayed file by pressing the ENTER key.

The following prompt displays:

Append to End of File?

To go to the end of the file, press the **YES** key on the scanner. At this point, you are ready to begin counting your inventory. Go to **Section 2: Taking Inventory Counts**.

To go to the beginning of the file, press the **NO** key on the scanner.

Note: If you specify **NO** to the prompt **APPEND TO END OF FILE**, you must manually move the scanner to the end of the file before you begin your inventory count.

When the scanner displays the first record of an existing file, you *must* move to the first blank record in the file, before you begin taking inventory. If you begin scanning items while an item record is displayed, that record will be overwritten with the new record.

If you are using PGM1, the scanner displays the following fields:

```
I/N#####  
QTYx
```

Note: When the scanner displays these fields, the symbols **#####** will be replaced by the bar code of the first item in the file, and the symbol **x** will be replaced by the quantity.

If you are using PGM2, the scanner displays the following fields:

```
I/N#####  
QTYx      BINy
```

Note: When the scanner displays these fields, the symbols **#####** will be replaced by the bar code of the first item in the file, the symbol **x** will be replaced by the quantity, and the symbol **y** will be replaced by the bin location, if one was entered for this item.

You can view all previous entries in the selected file by pressing the **DOWN** arrow key until the end of the file is reached. You may even change an incorrect number by pressing the correct number key when the desired field is reached. For details, see **Section 3: Correcting Input Errors**.

To go to the end of a file quickly, press the **FUNC** key, followed by the **DOWN** arrow key. The scanner displays the last item record in the file. Press the **DOWN** arrow key to move through the fields until the cursor is in the **I/N** field of a blank record.

At this point, you are ready to begin counting your inventory. For details, refer to **Section 2: Taking Inventory Counts**.

Section 2: Taking Inventory Counts

When the scanner displays a blank item record and the cursor is in the I/N field, you are ready to begin counting your inventory. To do this, scan the bar code for the item by moving the wand across the bar code.

As discussed in the **Introduction**, DDMS recommends that you scan bar code shelf labels rather than the labels on boxes or individual items. This increases the efficiency of your count, allowing employees to scan the bar code in the least amount of time, perform the count, and move on to the next item. It can also prevent discrepancies in your quantities. If you do not have factor amounts set up in the (ES) Inventory History screen for all of your items, you must enter the item's quantity in the same unit of measure as in the item's record in the (E) Inventory Master screen. Since shelf labels include the inventory unit of measure, they provide a handy reference for your employees to make manual adjustments to quantities.

When the scanner reads the code, it beeps, displays the bar code in the I/N field, and the cursor moves to the QTY field. If the scanner cannot pick up the code, nothing happens. The cursor remains in the I/N field.

There are several factors which may make it difficult or impossible for the scanner to read a bar code. Both shelf and product labels can become torn or faded. With product labels, the surface on which the bar code is printed also affects scanning. Other factors that can impair scanning are curved or metallic surfaces and plastic shrinkwrap.

If the scanner cannot read the bar code label, you can enter the bar code manually, using the numeric keys on the scanner. Be sure that you include the product code (leading digit) and check digit when entering the code.

The M3000 scanner accepts six- to fourteen-digit numeric bar codes. However, it does not accept alphanumeric bar codes. If you attempt to scan a bar code containing letters as well as numbers, the scanner beeps and the following message appears:

**Invalid Bar Code
Data For Input**

Then, the cursor returns to the I/N field. Either count these items manually or create alternate bar codes in the (ES) screen and print new labels for these items.

When you enter a bar code, either by scanning the item or using the numeric keys, the cursor moves to the QTY field. This field defaults to one.

If you have factor amounts set up for all of your items in the (ES) screen, you must enter the quantity in the unit of measure that you scanned. For example, if you sell envelopes by the each and scan the bar code on a box of 500 envelopes, you would enter the number of boxes. When you transfer the inventory quantities to a purchase order, the system automatically multiplies the number of boxes by 500 so that you will have accurate inventory quantities. There is one exception to this.

The FACTOR AMOUNT field in the (ES) screen is a three-digit field. Occasionally, a bar code may represent a quantity too large to enter in this field. For example, a carton of envelopes contains five boxes, for a total of 2500 envelopes. Since you cannot enter a factor amount for this bar code, your employees must enter the quantity in eaches. Again, using shelf labels helps your employees enter the correct unit of measure when performing inventory counts.

If you do not have any factor amounts set up, you must be sure to enter all item quantities using *the inventory unit of measure*.

To accept the default quantity of one, press the ENTER key.

To change the quantity, enter the new quantity by typing the number. If you accidentally hit an incorrect key, press the LEFT arrow key to move the cursor back one space. When you have typed the quantity, press the ENTER key.

If you are using scanning program PGM1, the cursor returns to the I/N field so that you can scan the next item.

If you are using scanning program PGM2, the cursor moves to the BIN field. If you have not entered bin locations for any items in this file, the BIN field is blank. If you have entered bin locations in this file, the last location that you entered appears as the default.

Note: When the cursor is in the bin location field, you can correct any errors in the displayed record. However, you must do this before pressing the ENTER key, or the scanner accepts the information and displays a blank record so that you can scan the next item. For more information, refer to **Section 3: Correcting Input Errors**.

To accept the default location, press the ENTER key.

To change the bin location, enter the new location. If you accidentally hit an incorrect key, press the LEFT arrow key to move the cursor back one space. When you have typed the bin number, press the ENTER key.

Note: If you enter a number that is different than the default, the number you enter will become the new default location.

If you do not want to enter a bin location for this item and a default is displayed in the BIN field, press the DEL key to delete the default. Then, press the ENTER key. If you do this, the BIN field remains blank until you enter a new location.

Once you have entered a bin number, the cursor returns to the I/N field so that you can scan the next item. At this point, you can also make corrections to the record for an item that you already scanned or exit the scanning program. These options are discussed in the following sections.

<p>Warning! The M3000 scanner is powered by a 9-volt transistor battery. If you receive a BATTERY LOW message, stop counting immediately. Plug the AC adaptor cord included with the scanner into an electrical outlet and connect it to the scanner. Then exit the scanning program and transfer the data currently in the scanner to your DDMS system. For information on exiting the scanning program, refer to Section 4: Exiting the Scanning Program. For information on downloading the inventory files, refer to Chapter 3: Using the (+G) Special Portable Scanner Screen. Once the data transfer has been completed, you can turn off the scanner and replace the battery.</p>

Section 3: Correcting Input Errors

The M3000 scanner allows you to correct errors such as scanning the wrong shelf label or entering an inaccurate quantity while performing inventory counts. You can not only correct errors in the currently displayed record, but in any record in the file.

Note: If you discover that the quantity you entered for an item was too low, it may be faster to rescan the bar code label and enter the additional quantity than to correct the original record manually.

Correcting Errors in the Displayed Record

If you discover a mistake such as scanning the wrong shelf label or entering an inaccurate quantity while that item record is still displayed on the scanner, correcting the problem is easy. Pressing the UP arrow key lets you move the cursor back through the fields of the displayed record so that you can make changes.

For example, suppose you are using scanning program PGM2 and scan a shelf label and enter a quantity before discovering that you accidentally scanned the wrong label. At this point, the cursor is in the BIN field. Press the UP arrow until the cursor moves to the I/N field and scan the correct label. The new bar code appears in the I/N field, overwriting the bar code that was previously displayed for this record.

You can change the quantity or bin location in the same way. If the new number you enter in the QTY or BIN field has fewer digits than the one originally displayed, press the DEL key to remove any unneeded characters. For example, suppose the correct count for an item was 10 and you accidentally entered 100. Move the cursor to the QTY field and type 10. The QTY field still displays 100 at this point. Press the DEL key to remove the extra zero, then press the ENTER key to accept the corrected quantity.

If you do not need to change a field, press the ENTER key to accept the default quantity. For example, you scanned the wrong shelf label but entered the correct quantity and bin location. When you scan the correct bar code, the cursor moves to the QTY field. Press the ENTER key to accept the displayed quantity. The cursor moves to the BIN field. Press the ENTER key again. The scanner displays a blank record and you can resume counting.

Correcting Errors in a Previous Record

If you discover that you made an error after scanning other items, you can correct it much the same way as an error in the currently displayed record. You can use the UP arrow key to move backward through all of the records in the file as well as through the fields in the currently displayed record. If you press the UP arrow key while the cursor is in the I/N field, the scanner displays the previous record in the file and the cursor appears in the QTY or BIN field, depending on which scanning program you are using. Continue pressing the UP arrow key to move backward through the fields of this record and then to the previous record. You can go all the way back to the first record in the file, if necessary.

Note: Some bar code labels do not display the product code or check digit (the first and last digits of a bar code, respectively), although they are included in the bar code itself and appear as part of the number displayed in the I/N field of the scanner when the label is scanned. Be careful when comparing a number displayed in the I/N field to a bar code label.

Once you have located the correct record and the cursor is in the field that you want to change, enter

the correct information. To change the bar code, scan the correct code. The new bar code overwrites the one previously entered for this record.

To change the quantity or bin location, enter the correct number. If the new number has fewer digits than the one originally displayed, press the DEL key to remove any unneeded characters. Then, press the ENTER key. For example, suppose the correct count for an item was 10 and you accidentally entered 100. Enter 10 in the QTY field. The QTY field still displays 100 at this point. Press the DEL key to remove the extra zero, then press the ENTER key to accept the corrected quantity.

Once you have corrected the record, press the FUNC key followed by the DOWN arrow key to move to the last record in the file so that you can resume counting your inventory. Alternately, you can press the DOWN arrow key by itself to move through the fields of the displayed file and then to the next record in the file. Pressing this key allows you to move forward through the file in the same way that pressing the UP arrow key lets you move backward. This can be useful when you need to correct the bin locations for several item records at one time.

For example, suppose you are using scanning program PGM2 and count all of the items in a particular bin location. Then you move to the next location and, after scanning a half a dozen items, you discover that you forgot to enter the new bin location. You have been accepting the default which is the number of the last bin that you counted. Look at the first item in the bin you are counting and note the bar code number. Then, press the UP arrow key to move backward through the file until the record for this item is displayed and the cursor is in the BIN field. Enter the correct number. The system displays the next record in the file. Press the DOWN arrow key to move through the fields until the cursor reaches the BIN field. Enter the correct bin number again. Repeat this procedure until you have corrected all of the bin numbers and the cursor is in the I/N field of the first blank record. Scan the next item in this bin and enter the count and the correct bin location. This number then becomes the new default for the bin field.

Section 4: Exiting the Scanning Program

When you have finished counting inventory, or when you want to use a different inventory file, press the scanner's EXIT key. The scanner displays the following prompt:

Exit Data Entry ?

Press the scanner's YES key. If this is a new inventory file, the scanner displays the following prompt:

Save Data File?

To save the data file you have created, press the YES key.

If, for some reason, you do not want to save this data file, press the NO key.

Note: If you were making changes or adding to an existing file, the scanner saves it automatically.

The scanner displays the following prompt:

Select Program
> PGM1

At this point, you can finish exiting the scanning program, change to a different scanning program or inventory file. For more information on changing the program or inventory file, refer to **Section 1: Selecting a Scanning Program and Inventory File**.

To finish exiting the scanning program, press the scanner's EXIT key again. The scanner displays the following prompt:

Portable Mode
Select Function

At this point, you can turn off the scanner or download the inventory files currently in memory to your DDMS system. To turn off the scanner, press the OFF key.

To download inventory files, refer to **Chapter 3: Using the (+G) Special Portable Scanner Screen**.

CHAPTER 3: USING THE (+G) SPECIAL PORTABLE SCANNER SCREEN

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Introduction

Once you have created inventory files using the M3000 portable bar code scanner, you need to download these files to your DDMS system. Once these inventory files are on the hard drive, they can be converted to the same file format used by the file SHORT-BUYS. This allows you to transfer the counts to a purchase order for release to on-hand. Downloading the inventory files from the scanner and converting them to the SHORT-BUYS file format is done through the (+G) Special Portable Scanner screen. This screen was developed specifically to control the interaction of the scanner with your DDMS system.

The (+G) screen is also used to download setup information and inventory scanning programs from your DDMS system to the M3000 scanner. This must be done before you can use the scanner to count your inventory. For more information, refer to **Appendix A: Setting Up the M3000 Bar Code Scanner**.

Section 1: Downloading Inventory Files

When you have finished with an inventory file in your M3000 scanner, you need to download the file to your DDMS system. To do this, attach the female connector on the null modem cable supplied with your scanner (not the Y-cable) to the DDMS I/O pad, using the proper male-to-male gender changer module.

For more information, refer to **Appendix A: Setting Up the M3000 Bar Code Scanner**.

Attach the cable's male connector to the female connector at the front of the portable bar code scanner and press the scanner's ON key. The scanner displays the following message:

Portable Mode
Select Function

If this message is not displayed, press the scanner's EXIT key until it appears.

Note: The M3000 scanner includes an automatic power-saving feature. When enough time passes between keystrokes, the scanner turns itself off automatically. If this happens, press the ON button to return to the prompt that was displayed before it turned itself off.

To put the scanner in transmitting mode, press the B/XMIT key. The scanner displays the following message:

Transmit Select
> Upload Data

Press the ENTER key. The scanner displays the following message:

Upload Selection
> All Data Files

Press the down arrow until the following message appears:

Upload Selection
> Pgm PGM#

Note: When this prompt appears, the symbol # will be replaced by 1 or 2, depending on which scanning program you used to create the inventory files currently in the scanner's memory.

If you have created inventory files using both programs, press the DOWN arrow key until the scanner displays the program used to create the file(s) that you want to download at this time.

When the correct program is displayed, press the ENTER key. The scanner displays the following prompt:

Upload PGM#
> All Data Files

Note: When this prompt appears, the symbol # will be replaced by the program number you selected, either 1 or 2.

Remember that the M3000 scanner can store multiple inventory files. If you have created more than one inventory file using the specified scanning program, you need to download these files one at a

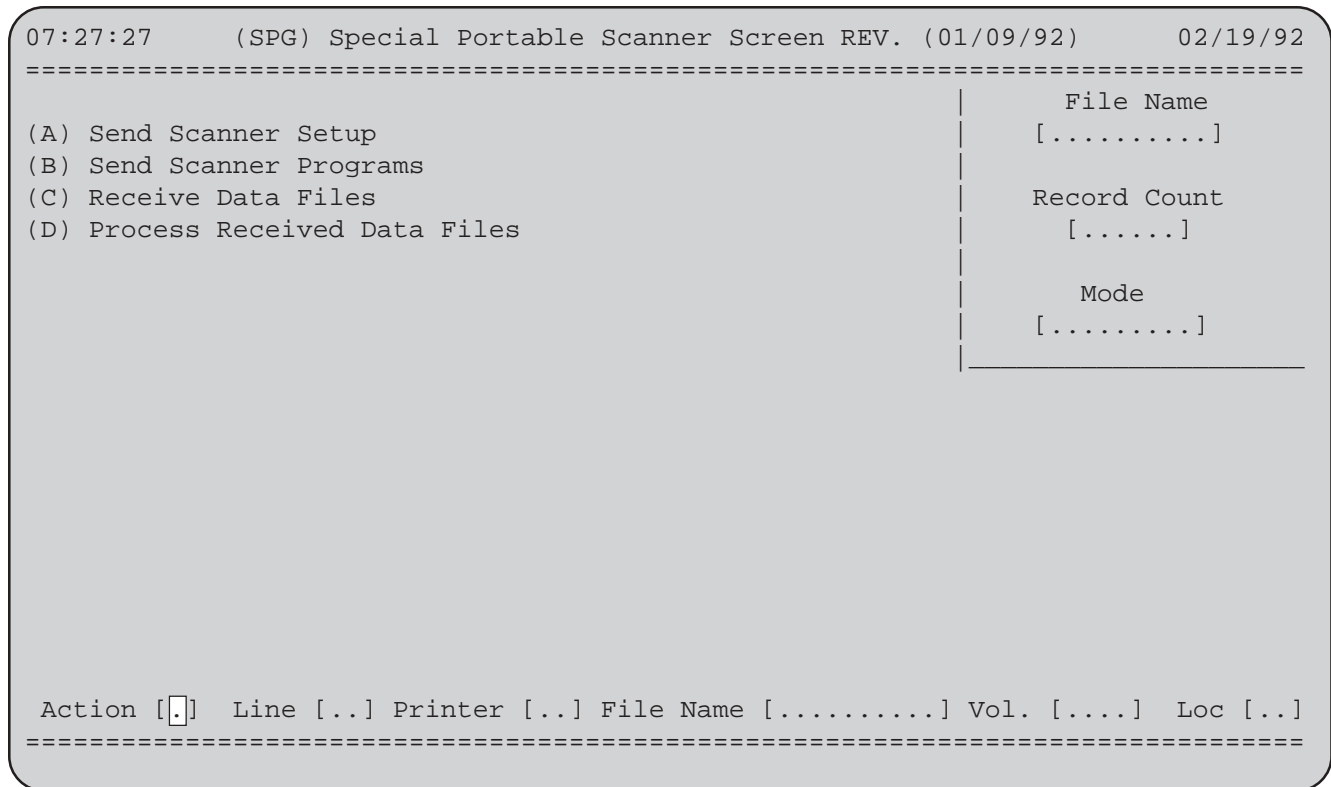


Figure 3-1. (+G) Special Portable Scanner Screen

time. This allows you to maintain an audit trail for correcting any alias or unit of measure problems that appear on the Inventory Count Exception Report. For more information on this report, refer to **Section 3: The Inventory Count Exception Report**.

Press the DOWN arrow key until the scanner displays the name of the inventory file that you want to download. Then, press the ENTER key. The scanner displays the following prompt:

```

Transmit Mode
> Keyboard Wedge
    
```

Press the DOWN arrow until the following message appears:

```

Transmit Mode
> RS232 Serial
    
```

When this message appears, go to the (+G) Special Portable Scanner screen in your system. This special screen, shown in Figure 3-1, contains functions for use with the M3000 bar code scanner. Do *not* press any additional keys on the scanner at this time.

In the (+G) screen, select the [C] Receive Data Files action code.

The cursor moves to the LINE field and the following message appears, as shown in Figure 3-2:

```

THIS PROCESS WILL DOWNLOAD DATA FILES FROM THE "M3000" TO THE "DDMS"
SYSTEM!
    
```

In the LINE field, enter the scanner's logical name. The logical name assigned to the scanner is displayed in the LOG NAME field in the (Y) System Status screen. An example of a logical name for a scanner is MZ. For more information on setting up the M3000 scanner in the (Y) screen and assigning

a logical name, refer to **Appendix A: Setting Up the M3000 Bar Code Scanner**.

The cursor moves to the PRINTER field. Press TAB

The cursor moves to the FILE NAME field. Remember, this procedure creates a copy of an inventory file from the M3000 scanner on the work unit of your DDMS system.

Enter a name for the file that you want to create on the work unit of your system. DDMS recommends that you use the same name for the copy on your work unit as for the original file in the scanner. For example, suppose you are preparing to transmit the file GON1. This file contains counts of the first gondola in a retail store. You should enter the name GON1 for the file that will be created on your work unit as well. Using the same file name consistently makes it easier to correct errors later if the system finds alias or unit of measure problems when the counts are transferred to a purchase order.

The cursor moves to the VOL field. The volume serial of your work unit will be displayed. Press RETURN to accept this volume serial, or type in the volume serial to the unit you want to create the file on.

Note: Volume serials are listed in the Volume Serials fields in the (LØ) Global Master Parameters screen. For more information, refer to "Part I: The Global Parameters" in the *O/P Dealer Systems Software Manual*.

The system displays the following prompt:

ARE YOU SURE Y/N ?N

If you are not ready to download the file, press RETURN or type:

N

The cursor returns to the action code field.

When you are ready to transmit the inventory file to your DDMS system, type:

Y

The system displays the following message in the MODE field, as shown in Figure 3-2:

RECEIVE

Press the scanner's ENTER key. The scanner begins transmitting the file to your system, and the following message appears:

**Sending XXXX
##% Complete**

Note: When this message appears, the symbols XXXX will be replaced by the name of the file, and the symbols ## will be replaced by a running total of the percentage of the file that has been transmitted to the DDMS system.

In a box in the upper right corner of the (+G) screen, the RECORD COUNT field displays the number of records transmitted, and the MODE field displays the word RECEIVE.

When the scanner is through transmitting the file, it displays the following message:

**Data Upload
Complete**

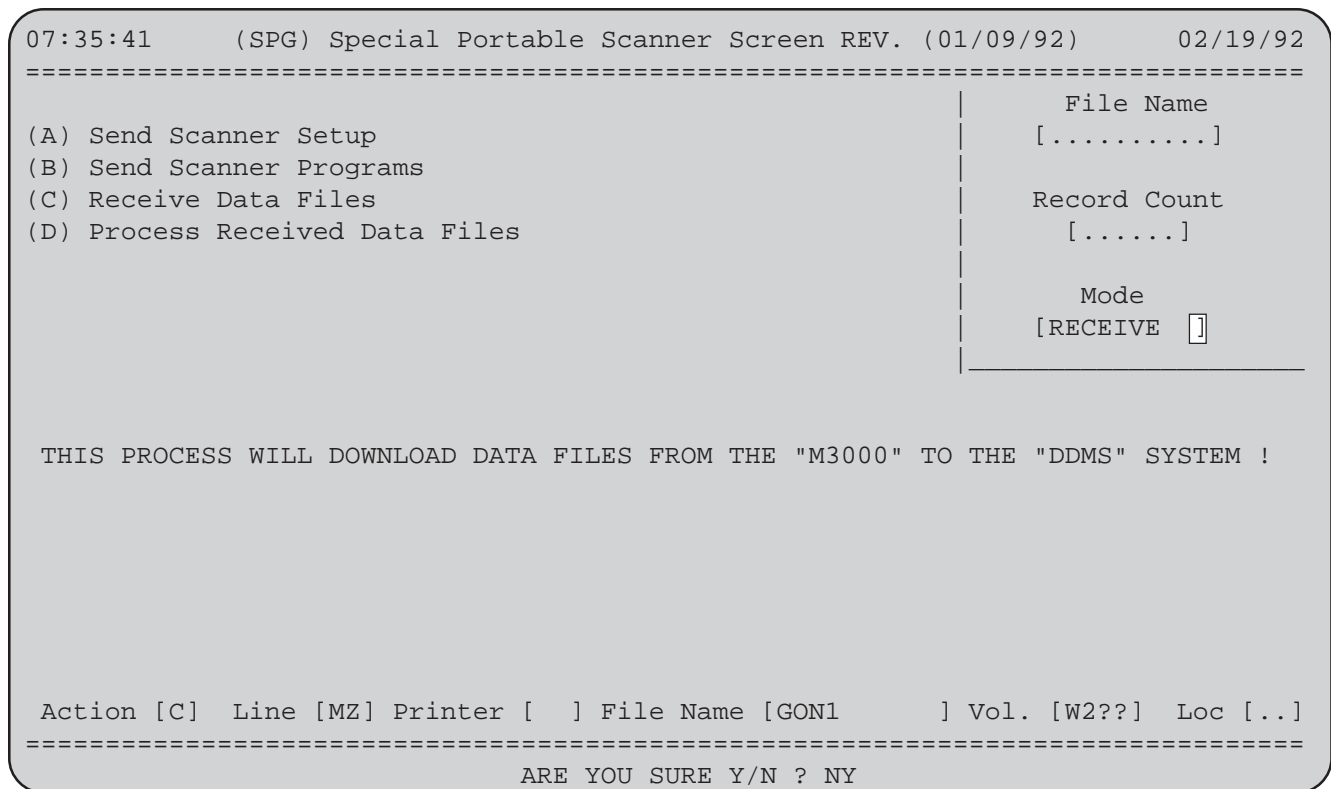


Figure 3-2. The RECEIVE Message

When the DDMS system is through receiving the file, it displays a total record count in the RECORD COUNT field, and the following message appears:

PROCESSING COMPLETE -- ANY KEY TO CONTINUE

Press RETURN to move the cursor back to the action code field.

Press the scanner's EXIT key. The scanner displays the following prompt:

**Erase Uploaded
Data Files ?**

To retain the inventory file that you have just transmitted to the DDMS system, press the NO key.

To erase the file you transmitted from the scanner's memory, press the YES key. The scanner displays the following prompt:

**Erase Files
Are You Sure ?**

If you do not want to delete the file, press the NO key. The scanner displays the following prompt:

**Upload PGM#
>File XXXX**

Note: When this prompt appears, the symbol # will be replaced by 1 or 2, depending on which scanning program you are using, and the symbols XXXX will be replaced by the name of the file that you transmitted.

If you wish to transmit additional files, press the up or down arrow keys until you see the next file name. Download the file to the DDMS system by following the steps in this chapter.

When you have downloaded all of the files from the scanner, press the EXIT key until the following message is displayed:

**Portable Mode
Select Function**

When this message appears, you can turn off the scanner or resume counting inventory. To turn off the scanner, press the OFF key.

For more information on taking inventory counts, refer to **Chapter 2: Using the M3000 Bar Code Scanner**.

Section 2: Converting Inventory Files to the SHORT-BUYS Format

When you download an inventory file from the M3000 scanner to your DDMS system, the file is saved on your work unit as an ordinary data file. You must convert it to the same file format used for the file SHORT-BUYS before you can transfer the counts to a purchase order. This process creates a new file, in the SHORT-BUYS format, on the disk unit whose volume serial appears in the P/O'S field in the (LØ) Global Master Parameters screen. The original data file remains on your work unit.

To convert an inventory file to the SHORT-BUYS format, go to the (+G) Special Portable Scanner screen, and select the [D] Process Received Data Files action code.

The system displays the following prompt, as shown in Figure 3-3:

DO YOU WISH TO SET BIN LOCATIONS IF A BIN HAS BEEN SET IN THE SCANNER Y/N ? N

If you used scanning program PGM2 to perform the count, and entered bin locations for the items, you can have the system set the bin locations in your inventory when you release the counts to on-hand. To do this, type:

Y

If you are using scanning program PGM1, or you do not want to set bin locations, press TAB or type:

N

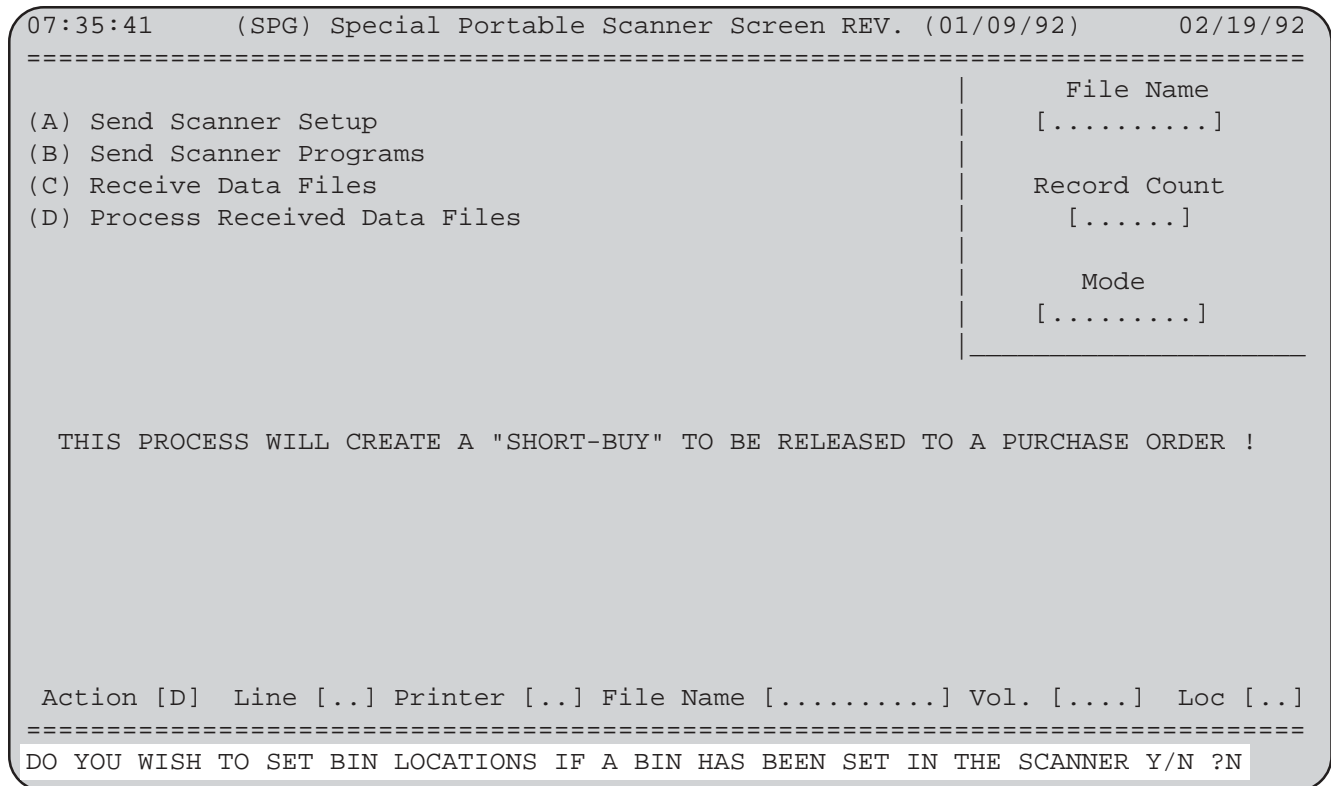


Figure 3-3. DO YOU WISH TO SET BIN LOCATIONS Prompt

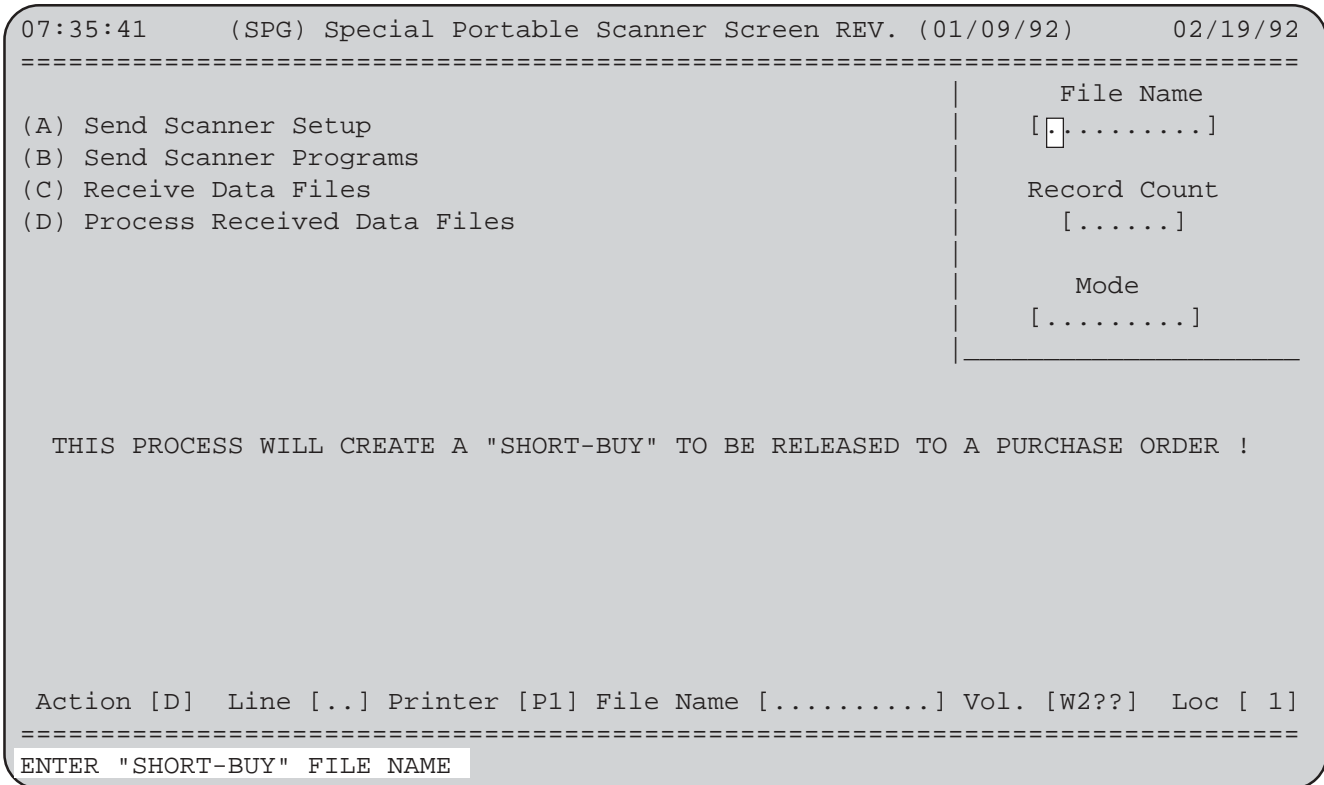


Figure 3-4. ENTER "SHORT-BUY" FILE NAME Message

The cursor moves to the FILE NAME field in the upper right corner of the screen and the following message appears, as shown in Figure 3-4:

ENTER "SHORT-BUY" FILE NAME

Enter the name that you want to use for the converted file. As mentioned above, this file is created on the disk unit where your purchasing files are located.

DDMS recommends that you use the same name as your original inventory file, along with an -SB suffix. For example, if you are converting the file GON1, you would name the new file GON1-SB. Using the same file name consistently makes it easier to correct errors later if the system finds alias or unit of measure problems when the counts are transferred to a purchase order.

Note: If you are releasing this file to a purchase order for the vendor INVENTORY to update your on-hand quantities, do not use the characters SHORT- as the beginning of the file name or the system will not create the purchase order correctly.

The cursor moves to the PRINTER field. This field defaults to printer P1.

When you convert an inventory file to the Short-Buy file format, the system prints an Inventory Count Exception Report. This report lists any errors the system detects in the inventory file. For more information on this report, refer to **Section 3: The Inventory Count Exception Report**.

Enter the name of the printer that you want to use, or press RETURN to accept the default printer.

The cursor moves to the FILE NAME field at the bottom of the screen and the following message appears, as shown in Figure 3-5:

ENTER RECEIVED FILE NAME AND VOLUME SERIAL

```

07:35:41      (SPG) Special Portable Scanner Screen REV. (01/09/92)      02/19/92
=====
(A) Send Scanner Setup
(B) Send Scanner Programs
(C) Receive Data Files
(D) Process Received Data Files

File Name
[GON1-SB  ]

Record Count
[.....]

Mode
[.....]

THIS PROCESS WILL CREATE A "SHORT-BUY" TO BE RELEASED TO A PURCHASE ORDER !

Action [D] Line [...] Printer [P1] File Name [.]..... Vol. [W2??] Loc [ 1]
=====
ENTER RECEIVED FILE NAME AND VOLUME SERIAL
    
```

Figure 3-5. The ENTER RECEIVED FILE NAME AND VOLUME SERIAL Message

Type the name of the inventory file that you want to convert to the Short-Buy file format. If the name does not completely fill the FILE NAME field, press TAB.

The cursor moves to the VOL field. This field defaults to the work unit.

Enter the volume serial of the unit you saved your M3000 file on, or press TAB to accept the default.

If the file specified in the FILE NAME field does not exist on the specified work unit, the cursor returns to the FILE NAME field. Enter the correct file name and volume serial.

The system displays the following prompt:

ARE YOU SURE Y/N ?N

If you do not want to convert the inventory file to the SHORT-BUY format, press RETURN or type:

N

The cursor returns to the action code field.

To convert the file, type:

Y

The system begins converting the inventory file. This file contains bar codes, but not item numbers. As part of the conversion process, the system attempts to match the bar codes in the inventory file against the bar codes that you have set up as aliases for item numbers in the file I-ALIAS. If the bar code in the inventory file is twelve characters, the system first attempts to match all twelve characters. If it cannot find an exact match, it attempts to find a match using the first eleven characters of the bar code. If it cannot find a match with eleven characters, it uses the middle ten characters of the bar code.

This is illustrated by the following example:

Attempts to Match on all Twelve Characters	123456789012
Attempts to Match on the First Eleven Characters	12345678901
Attempts to Match on the Middle Ten Characters	2345678901

If the system still cannot find a match at this point, it stops and proceeds to the next bar code in the inventory file.

If you scanned a fourteen-digit bar code, the system attempts to match all fourteen characters to a bar code in the file I-ALIAS. If it cannot find a match, it attempts to match the first thirteen characters. This is illustrated by the following example:

Attempts to Match on all Fourteen Characters	12345678901234
Attempts to Match on the First Thirteen Characters	1234567890123

If the system still cannot find a match at this point, it stops and proceeds to the next bar code in the inventory file.

If you scanned an eight-digit bar code, the system attempts to match all eight characters to a bar code in the file I-ALIAS. If it cannot find an exact match, it attempts to find a match using the middle six characters, followed by the first seven characters, then the last seven characters. This is illustrated by the following example:

Attempts to Match on all Eight Characters	12345678
Attempts to Match on the Middle Six Characters	234567
Attempts to Match on the First Seven Characters	1234567
Attempts to Match on the Last Seven Characters	2345678

If the system still cannot find a match at this point, it stops and proceeds to the next bar code in the inventory file.

During the conversion process, a the system creates a file using the name that you specified. It is located on the disk unit whose volume serial appears in the P/O's field in the (LØ) screen in the Short-Buys format. This file contains the item number of every item whose bar code the system was able to successfully match to a bar code in the file I-ALIAS, the quantity from the inventory file, and the bin locations (if they were entered). The system also prints an Inventory Count Exception Report. For more information on this report, refer to **Section 3: The Inventory Count Exception Report**.

When the conversion process is complete, the cursor returns to the action code field. As previously mentioned, the original inventory file remains on your work unit.

This completes the procedures for performing inventory counts using a bar code scanner and transferring the inventory files to the DDMS system. Once the inventory files have been converted to the Short-Buys file format, the counts can be transferred to a purchase order using the [S] Short Buys action code in the (F) Purchase Order Entry screen, or transferred to a pick ticket using the release function in the (G) Order Entry screen. For more information on doing this, refer to "Chapter 9: Purchase Order Entry" in the *O/P Dealer Systems Software Manual*.

Section 3: The Inventory Count Exception Report

When you convert an inventory file to the Short-Buy file format, the system prints an Inventory Count Exception Report. This report lists any errors detected in the inventory counts, such as bar codes that do not match any existing aliases. The report also shows the name of the inventory file that is being converted. If you separate your store or warehouse into sections, create a separate inventory file for each section, and use the same file names when transferring the files from the scanner to the DDMS system. It is easy to locate any items that appear on this report, even if you do not enter bin locations.

If the system detects a problem with an item, it prints the available item information and an error message identifying the problem. There are three error messages that may appear on the Inventory Count Exception Report. These are:

NO ALIAS MATCH The bar code you scanned is not set up as an alias for an item number in the (ES) Inventory Alias screen. The report lists the alias (bar code) number, the quantity, and (if you used scanning program PGM2) the bin number for these items.

NO ITEM MATCH The bar code is set up as the alias for an item number in the (ES) screen. However, there is no record for that item number in the (E) Inventory Master screen. The report lists the alias (bar code) number, the quantity, the bin number (if you used scanning program PGM2), and the item number for these items.

INVALID FACTOR QUANTITY This message indicates a unit of measure error. Either the inventory quantity or the information in the FACTOR (M/D) and FACTOR AMOUNT fields in the (ES) screen is incorrect.

If items appear on the report followed by one of the messages listed above, you have two choices. DDMS recommends that you correct the problem indicated on the report immediately, before transferring the counts to a purchase order in the (F) Purchase Order Entry screen. Then, when you do create a purchase order and release the quantities to on-hand inventory, these items will be updated. In addition, this ensures that these problems do not reoccur.

However, if you have already transferred the counts to a purchase order, you can manually update the on-hand quantities for these items in the (E) screen. (For more information, refer to Chapter 3: The Inventory Database in the *O/P Dealer Systems Software Manual*.) If you do this, be sure that you also correct the problem identified on the report.

APPENDIX A: **SETTING UP THE M3000 BAR CODE SCANNER**

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Introduction

You must set up your portable bar code scanner before using it for the first time. This involves downloading the inventory scanning programs PGM1 and PGM2 from your system. You also need to set up the (Y) System Status screen of your system to work with the scanner.

Section 1: Modifying the (Y) System Status Screen

The first step in preparing to use the M3000 portable bar code scanner is to modify the (Y) System Status screen in your system. You must set up your system to communicate with the scanner just as you would for a terminal, modem, or other peripheral device.

Go to the (Y) screen and select the [M] Modify Dev action code. The cursor moves to the LOG NAME field on the first row of the (Y) screen.

Select an open I/O channel for the M3000. DDMS recommends that you use a channel from 4 to 7 on the first 32 channels for the M3000 scanner, since these channels have larger buffers than any other channels. Since the scanner will only be connected to the system when sending or receiving information, you may elect to use the same channel for all of your scanners.

Press RETURN until the cursor moves to the DEV TYPES field on the row with the same physical number as the I/O channel you selected. (Physical numbers are displayed in the PHY # field on each row.) For example, if you decide to connect the scanner to channel 5, press RETURN until the cursor moves to the DEV TYPES field on the row with 5 displayed in the PHY# field, as shown in Figure A-1.

Space through the DEV TYPES field.

The cursor moves to the LOG NAME field. You must assign a logical name for the M3000 scanner. Enter a modem logical name that has not already been assigned to a modem. Logical names for modems are M1 through M9, and MA through MZ.

TIME		SYSTEM STATUS (J004)					ACC-CNT = 10981		
DEVICE	DEV TYPES	LOG NAME	PHY #	PR.	PROGRAM NM	BAUD RATE	CH #	OVERLAY ADD.	LEN.
Util	TCB	U1	81	60	;UTLMMASTER			32C9	0280
Util	TCB	U2	82	60	;UTLMMASTER			354A	0763
Util	TCB	U3	83	60	;UTLMMASTER			3CAE	0B58
Util	TCB	U4	84	60	;UTLMMASTER			4848	09B9
Util	TCB	U5	85	60	;UTLMMASTER			5202	00E8
Util	TCB	U6	86						
Batch		B1	91						
Batch		B2	92						
Terminal	IB	T0	9	50	;UTLE1	57600	9	5A92	015D
Terminal	VP	T1	1			9600	1		
Terminal	VP	T2	2	70	;UTLMMASTER	9600	2	52EB	00D9
Printer	O1	PD	3			9600	3		
Terminal	VP	T4	4			9600	4		
Terminal	<input checked="" type="checkbox"/> VP	T5	5			9600	5		
Terminal	VP	T6	6	60	;SER:0	9600	6	57E4	0119
Printer	O2	P1	7			9600	7		
Printer		P5	8			9600	8		
Terminal	VP	T1	11	70	;UTLMMASTER	9600	1	53C5	00D9

ENTER: S = Stop Device, M = Modify Device
R=Record Configuration, P=Print or Page Nbr. (1-8=Pages) (M)

Figure A-1. DEV TYPES Field

Note: DDMS recommends that you use MZ as the logical name for your scanner. This not only eliminates the possibility of it being confused with one of your modems, but leaves logical names M1 through MY available for other devices.

If the cursor moves to the PR field, press TAB.

The cursor moves to the BAUD RATE field. To specify your baud rate, type:

9600

The cursor moves to the DEV TYPES field on the next row. Press TAB or RETURN until the cursor returns to the action code field, and the screen repaints itself.

To permanently record the changes you have made, select the [R] Record Configuration action code. To do this, type:

R

The system displays the following prompt:

**You are about to make these changes permanent.
Are you sure ? Y/N**

If you do not want to make these changes permanent, type:

N

If you are ready to save these changes, type:

Y

The cursor returns to the parentheses at the bottom of the screen.

If you have DDMS I/O pads and you had to change the baud rate, or if the device you are using was disabled before you entered a logical name, you must reboot your system before using the M3000 scanner.

Note: Make sure that no one else is using your system before rebooting it.

To reboot your system, go to the (Z) Master Utilities screen, select the [E6] System Shutdown function, and do a level R shutdown to reboot your system. For detailed instructions on performing a level R shutdown, see "Chapter 32: System Utilities," in *the O/P Dealer Systems Software Manual*.

Section 2: Downloading the Scanning Programs

Inventory scanning programs for use with the M3000 scanner are stored in the !RID library of your DDMS system. Once you have set up the scanner as a peripheral device in the (Y) System Status screen, you can download the scanning programs. Under normal circumstances, you only need to do this once. The setup information and scanning programs remain in the scanner's memory. You only need to repeat these procedures to update the programs currently in your scanner, or if your scanner's memory is lost.

CONNECTING THE SCANNER

Before you download the scanning programs to the scanner, connect the portable scanner to your I/O pad.

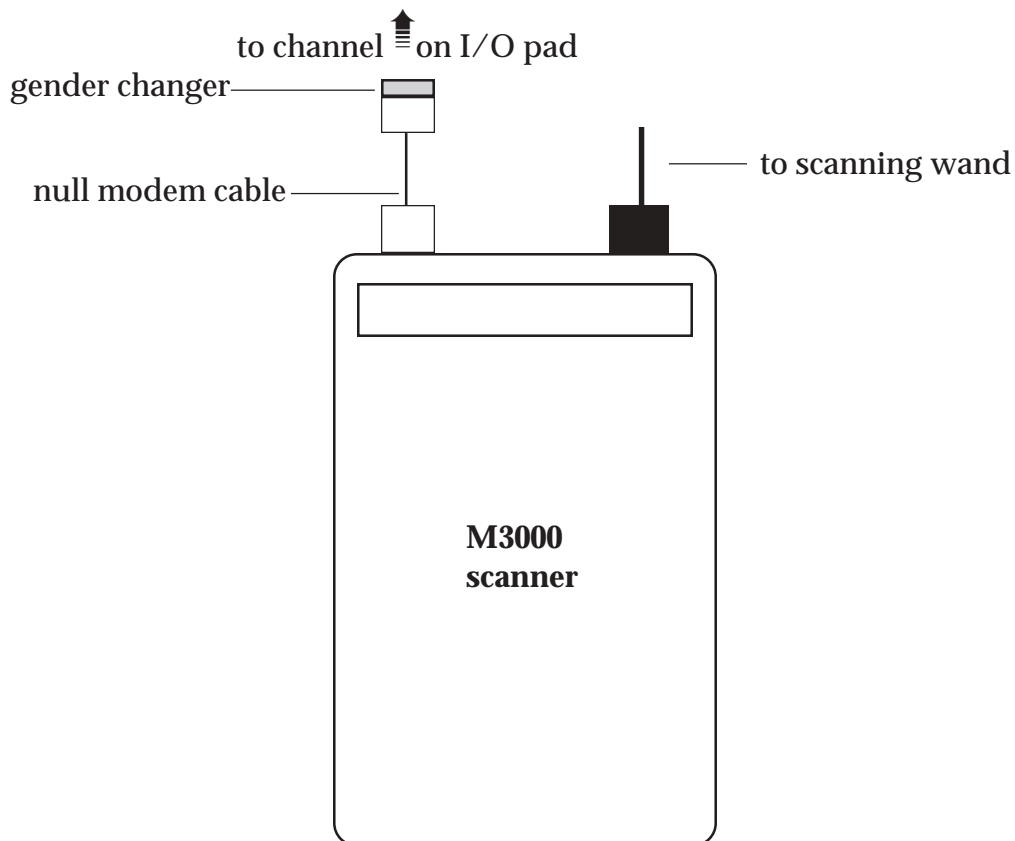
Select the null modem cable that came with your portable scanner (not the Y-cable).

Attach the cable's female connector to a male-to-male gender changer, as shown in the diagram below.

Note: If you use standard DDMS I/O pads, use a straight-through gender changer. If you use Specialix I/O pads, use an M3000/SPX gender changer.

Then attach the gender changer to the channel on the I/O pad that you have set up for the scanner. (For more information, refer to **Section 1: Modifying the (Y) System Status Screen.**)

Attach the cable's male connector to the female connector at the front of the portable bar code scanner.



PREPARING TO LOAD INFORMATION

Turn your scanner on by pressing the red ON button.

Note: The M3000 scanner includes an automatic power-saving feature. When a long period of time passes between keystrokes, the scanner turns itself off automatically. If this happens, press the ON button to return to the prompt that was displayed before the scanner turned itself off.

Determining the Firmware Version

Before loading setup software, you need to determine which firmware version your scanner uses.

Note: Firmware is a set of instructions (like software). However, firmware is embedded directly on a read-only memory (ROM) chip. Unlike software, which can easily be changed or erased, firmware can only be changed by replacing the chip that contains it.

When you first turn on your scanner, the following message should appear:

```
Portable Mode
Select Function
```

Note: If you do not see this message, press the EXIT button until it appears.

Press the G/STATUS key. Now press the down arrow key (located near the bottom right corner of the scanner's keypad) until a message like the following appears:

```
M3000      V#.#
Rom Chksum  XXXX
```

When this message appears, the symbols #.## will be replaced by a number, and the letters XXXX will be replaced by numerals and letters.

The number after the letter V is your firmware version number. Note whether your firmware version is higher than 2.0 (version 2.20, for example), or lower than 2.0.

Press the EXIT key. The system will display the following message:

```
Portable Mode
Select Function
```

Loading Setup Software

To begin loading setup software, press the A/SETUP key. The scanner displays the following message:

```
Setup Selection
>Date/Time
```

Press the down arrow until the scanner displays the following message:

```
Setup Selection
>Reset Setups
```

Press ENTER. The scanner displays the following prompt:

```
Reset All Setups to Default?
```

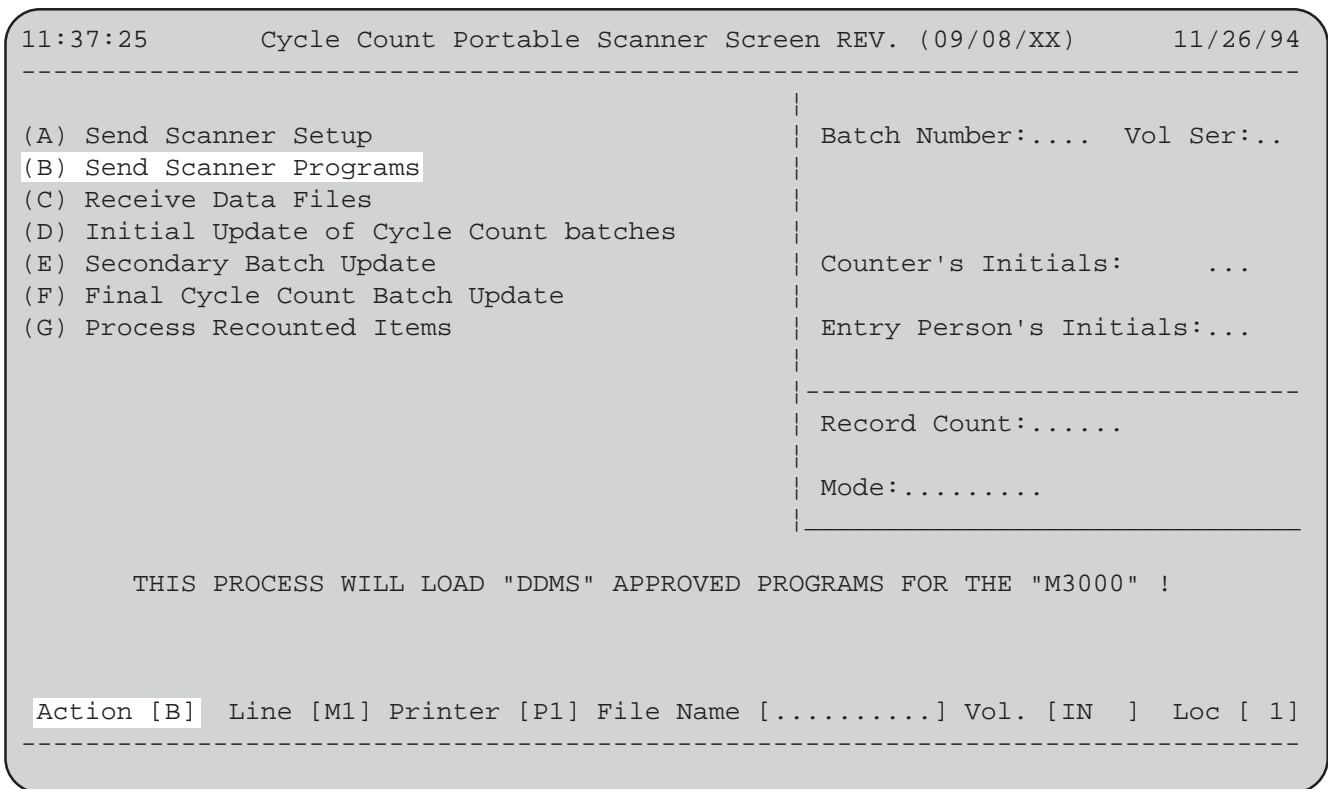


Figure A-2. Selecting the [B] Send Scanner Programs Action Code

Press the YES button on the scanner. The system displays the following prompt:

**Reset All Setups
Are You Sure?**

Press the YES button. The system displays the following message:

Resetting All System Setups

After the system has reset all system setups, the following prompt appears:

**Setup Selection
>Date / Time**

Press EXIT. The following message appears:

**Portable Mode
Select Function**

To enter the receive mode, press the B/XMIT key. The scanner displays the following message:

**Transmit Select
>Upload Data**

Press the down arrow until the following message is displayed:

**Transmit Select
>Receive**

Press ENTER.

If you have a scanner with a firmware version lower than 2.0, go to **Completing the Procedure**.

If you have a scanner with a firmware version higher than 2.0, the scanner displays the following message:

Receive Select
>ASCII files

Press the down arrow until the following message is displayed:

Receive Select
>System Files

Press ENTER.

Completing the Procedure

The scanner will display the following message:

Receive Mode
>RS232 Serial

Note: If the second line does not read RS232 SERIAL, press the DOWN arrow until it does.

Press ENTER. The scanner will display the following message:

Receive Waiting

DOWNLOADING PROGRAMS TO THE SCANNER

To download the program information from your DDMS system, go to the (+G) Special Portable Scanner screen. This special screen was created specifically for use with the inventory scanning programs. To reach this screen, go to the (+) Special Programs screen, and select the [G] Remote Input Device Program screen.

The system displays the (+G) screen, as shown in Figure A-2. Select the [B] Send Scanner Programs action code. The cursor moves to the LINE field and the following message appears:

THIS PROCESS WILL LOAD "DDMS" APPROVED PROGRAMS FOR THE "M3000" !

In the LINE field, specify the scanner's logical name (MZ, for example). The system displays the following prompt:

ARE YOU SURE Y/N ?N

If you are not ready to transmit the program information to the scanner, press RETURN or type:

N

The cursor returns to the action code field.

If you are ready to transmit the program information, type:

Y

The system transmits the program information to your scanner, and sends a running total of the records sent during transmission. This appears in the RECORD COUNT field. The scanner also displays a running total of the records sent.

The (+G) screen displays the following message to let you know the transmission is complete:

PROCESSING COMPLETE --- PRESS ANY KEY TO CONTINUE

Press RETURN, and the cursor returns to the action code field.

When the transmission of the programs is complete, the scanner displays the following message:

Receive Complete

Press the ENTER key on your scanner to process the setup information. The scanner displays the following message:

**Processing
Pgm PGM1**

This message is followed by:

**Processing
Pgm PGM2**

When the scanner has finished processing the programs, the following message will appear:

**Transmit Select
>Receive**

This completes the setup procedure.