Intermec

System Manual

EasyADC® for SAP Business One

Intermec Technologies Corporation

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Before You Begin

This section provides you with safety information, technical support information, and sources for additional product information.

Safety Information

Your safety is extremely important. Read and follow all warnings and cautions in this document before handling and operating Intermec equipment. You can be seriously injured, and equipment and data can be damaged if you do not follow the safety warnings and cautions.

This section explains how to identify and understand dangers, warnings, cautions, and notes that are in this document. You may also see icons that tell you when to follow ESD procedures and when to take special precautions for handling optical parts.

⚠ Warning **A warning alerts you of an operating procedure, practice, condition, or statement that must be strictly observed to avoid death or serious injury to the persons working on the equipment.**

⚠ Caution **A caution alerts you to an operating procedure, practice, condition, or statement that must be strictly observed to prevent equipment damage or destruction, or corruption or loss of data.**

Note: Notes either provide extra information about a topic or contain special instructions for handling a particular condition or set of circumstances.

Global Services and Support

Warranty Information
To understand the warranty for your Intermec product, visit the Intermec web site at www.intermec.com and click **Service & Support**. The Intermec Global Sales & Service page appears. From the **Service & Support** menu, move your pointer over **Support**, and then click **Warranty**.

Visit www.intermec.com/activate to activate your warranty.

Disclaimer of warranties: The sample code included in this document is presented for reference only. The code does not necessarily represent complete, tested programs. The code is provided "as is with all faults." All warranties are expressly disclaimed, including the implied warranties of merchantability and fitness for a particular purpose.

Web Support
Visit the Intermec web site at www.intermec.com to download our current manuals in PDF format. To order printed versions of the Intermec manuals, contact your local Intermec representative or distributor.

Visit the Intermec technical knowledge base (Knowledge Central) at intermec.custhelp.com to review technical information or to request technical support for your Intermec product.

Telephone Support

These services are available from Intermec Technologies Corporation.

Service	Description	In the U.S.A. and Canada call 1-800-755-5505 and choose this option
Order Intermec products	• Place an order. • Ask about an existing order.	1 and then choose 2
Order Intermec media	Order printer labels and ribbons.	1 and then choose 1
Order spare parts	Order spare parts.	1 or 2 and then choose 4
Technical Support	Talk to technical support about your Intermec product.	2 and then choose 2
Service	• Get a return authorization number for authorized service center repair. • Request an on-site repair technician.	2 and then choose 1
Service contracts	• Ask about an existing contract. • Renew a contract. • Inquire about repair billing or other service invoicing questions.	1 or 2 and then choose 3

Outside the U.S.A. and Canada, contact your local Intermec representative. To search for your local representative, from the Intermec web site, click **Contact**.

Who Should Read this Manual

The *EasyADC® for SAP Business One System Manual* provides you with information about the software components of SmartSystems Console and EasyADC Data Collection Management.

Before you configure the SmartSystems and EasyADC applications, you should be familiar with your network and general networking terms, such as IP addresses.

Use this manual to install the software and hardware and test the installation, learn about EasyADC, use the EasyADC Inventory Transactions on CK30s, and train users and operators.

Related Documents

Document Title	Part Number
EasyADC for SAP Business One Installation CD	235-113-001
SmartSystems Foundation - ADC Console Installation CD	235-113-002
CK30 Handheld Computer User's Manual	073528
CK30 Command Reference Manual	073529
MobileLAN access WA2X System Manual	073915
EasyCoder PM4i Bar Code Label Printer User's Guide (Fingerprint Version)	1-960583
LabelShop ULTRA/PRO User's Manual	N/A
LabelShop START Quick Start Guide	N/A

The EasyADC and SmartSystems CDs contain PDF copies of these manuals. To access these manuals, insert the CDs in your CD drive, cancel the Installation Wizard that launches automatically, and browse to the "\Manuals" folder.

The Intermec web site at www.intermec.com contains our documents that you can download in PDF format.

To order printed versions of the Intermec manuals, contact your local Intermec representative or distributor.

Quick Start

This section provides an outline of what needs to be installed and configured to set up your EasyADC® network. Each step includes a page reference where detailed information begins in this system manual.

Using the CK30 Handheld Computers

This chapter introduces the CK30 Handheld Computer keypad, explains how to log on and off the CK30, and how to move through the EasyADC Terminal menus on the CK30. Go to Chapter 3, starting on page 35, to learn how to use the CK30.

Using the EasyADC Data Collection Manager

This chapter explains how to use the modules of the EasyADC Data Collection Manager application. The following topics are addressed:

- Using the Remote Terminal Emulator (page 55)
- Using the System Manager (page 56)
- Viewing Log and Error Log Information (page 61)
- Running the Benchmark Reports (page 63)
- Doing the Warehouse Inventory (page 67)

Using the SmartSystems™ Console

This chapter explains how to use the SmartSystems Console to monitor and manage the hardware components of the system. The following information is covered:

- Starting the SmartSystems Console (page 72)
- Monitoring Devices (page 72)
- Viewing the Troubleshooting Tips (page 73)
- Enabling Email Notification (page 73)
- Configuring the Network Security Level (page 74)
- Adding New Devices (page 74)
- Resetting an Access Point to its Factory Defaults (page 74)
- Updating System Software (page 75)
- Updating the Discovered Devices Folder (page 75)

Troubleshooting

This chapter addresses how to troubleshoot your system. Information begins on page 77.

1 Introducing EasyADC® for SAP Business One

The following information is available in this chapter:

- What is EasyADC? (page 2)
- What are the EasyADC Requirements? (page 4)

What is EasyADC?

EasyADC is an easy and efficient bar code data collection system that seamlessly integrates with SAP Business One.

This system enables access into SAP Business One through select transactions supported on the CK30. This allows the user to collect information on the warehouse floor using the CK30 by scanning and entering information which is updated in the SAP Business One system in real time.

EasyADC is a self-contained system for adding bar code data collection to the warehouse distribution environment and has these advantages:

- Reduced errors
- Increased speed
- Improved order-to-cash cycle
- Rapid ROI (Return on Investment)
- Visibility
- Productivity
- Profitability
- Security

EasyADC Hardware Components

The standard EasyADC includes these products:

- **Two CK30 Handheld Computers**
  wireless handheld computers with integrated bar code scanners
- **One MobileLAN™ access WA22 Access Point**
  high-speed and high-security wireless access point
- **One EasyCoder® PM4i Fingerprint Printer**
  industrial-strength thermal label printer
- **CK30 Charging Docks**
  that keep your CK30s fully charged when not enroute

CK30
Scans bar code data and transmits it wirelessly to the WA22.

MobileLAN™access WA22 and MobileLAN power bridge
Collects data from the CK30s and sends it to the EasyADC PC through your Ethernet network. Powered over Ethernet by the MobileLAN power bridge.

To Your Network

EasyCoder® PM4i
Prints customizable bar code labels from LabelShop PRO 6 software (included).

EasyADC PC
Manages the data interface to your SAP Business One application software.

EasyADC Software Components

EasyADC consists of the following applications from Intermec in addition to partner applications, such as Wavelink Avalanche:

- SmartSystems™ Console
- EasyADC Data Collection Manager
- EasyADC Inventory Transactions on the CK30s
- LabelShop PRO 6

What is the SmartSystems Console?

The SmartSystems Console is a software platform that provides a single, integrated environment for hands-free deployment and management of devices located anywhere in the enterprise – on-site or remote. The console works with the Intermec components of your system to make the most of limited IT resources, and lower your total cost of ownership for data collection equipment.

The SmartSystems Console provides a simple, comprehensive, management tool for monitoring and managing your Intermec automatic identification and data collection network. The console also allows you to add CK30, WA22, and PM4i devices to EasyADC. The console includes a built-in diagnostics intelligence and the ability to update system software.

What is the EasyADC Data Collection Manager?

The EasyADC Data Collection Manager is the software interface between EasyADC and your ERP software. The EasyADC Data Collection Manager consists of screens to view and change current settings and a Remote Terminal Emulator to emulate the menu system of a connected CK30 for testing and training.

What are the EasyADC Inventory Transactions on the CK30s?

The CK30 EasyADC Inventory Transactions perform sales order fulfillment, goods receipt, goods issue, item transfer, inquiries, inventory, cross-reference, goods receipt purchase orders, and label printing.

What are the EasyADC Requirements?

Before you begin installing EasyADC, you need these items:

- Version number of your software as shown on your installation CDs

- Name of and path to your SAP Business One server

- Name of your company database

- SQL System Administrator password

- User ID and password

Dedicated EasyADC PC Requirements

You also need to provide a PC connected to your local area network with a static IP address running an unmodified SAP Business One client to act as your EasyADC PC. Hardware requirements for the PC are as follows:

- Windows® XP Professional (Service Pack 2)

- 2 GHz Pentium 4 or better

- 512 MB RAM

- 500 MB available hard disk space

- CD-ROM drive

- An available USB port and mouse

- An available 100baseTx Ethernet port

Tools and Additional Materials

Use a Phillips screwdriver to install the handstraps on the CK30s. Other suggested materials include: a ladder to reach the permanent mounting location for the WA22, six mounting screws for the WA22 mounting bracket *(type and size of screws depend on materials at the installation location)*, a drill and bit, a screwdriver for the bracket mounting screws, and three Ethernet cables (CAT5). *Note: EasyADC comes with three 3.05 m (10 ft) Ethernet cables. If you need longer cable runs, you have to supply your own.*

2 Installing and Configuring EasyADC®

Use this chapter to install and configure EasyADC. If anything is missing, contact your Intermec representative. See the "Before You Begin" section for contact information.

Note: You should have the SAP Business One application installed on your designated EasyADC PC. If not, please contact your SAP Business One partner of choice for more information.

PreInstallation Worksheet

Gather as much of the following information as you can before you begin the installation:

- EasyADC Host PC location: _____
- PM4i printer location: _____
- WA22 access point location:
  1) Outside - 300 ft radius (283,000 sq ft)
  2) **Inside - 100 ft radius (31,000 sq ft)** _____
- Warehouse square footage: _____
- AC2 4 Bay charging dock location: _____

Test Database

- Client version: _____
- Server version: _____
- **Test Company Name:** _____
- **Production Company Name:** _____
- Admin login name and password: _____
- New User profiles for each CK30 user: _____
- Host IP Address: _____
- Static IP Range (5 to 50 addresses): _____

Active Database

See "Starting the EasyADC Data Collection Manager" on page 30 for instructions on switching to the active database.

- **Test Company Name:** _____
- **Production Company Name:** _____
- Admin login name and password: _____
- New User profiles for each CK30 user: _____
- Host IP Address: _____
- Static IP Range (5 to 50 addresses): _____

Unpacking EasyADC

Use this checklist to verify that you receive all the components of EasyADC. If any is missing, contact your Intermec representative.

EasyCoder PM4i Printer

- PM4i printer
- Printer accessories box

For a complete list of the Printer accessories box contents, see the *EasyCoder PM4i Bar Code Label Printer User's Guide* in the box.

Media for PM4i

- 2 rolls 4x6-inch label media
- 1 roll thermal transfer ribbon
- 1 cardboard takeup roll (or tube)

AC2 4-Bay Charging Dock

- AC2 charging dock
- Quick start guide

EasyADC Installation CDs

- All required software to install the EasyADC Data Collection Manager and SmartSystems Foundation applications
- LabelShop PRO 6
- Manuals and quick start guides for products and EasyADC system

Two CK30 Handheld Computers

- CK30 computer
- Rechargeable AB1 battery
- Packet including documentation and labels

For a complete list of the packet contents, see the *CK30 Handheld Computer Quick Start Guide* in the packet.

Note: Two CK30 Product Authorization Keys (PAKs) are automatically configured with your EasyADC for SAP Business One package. To include more CK30s in this network, you must purchase additional PAKs. Contact your Intermec representative for information.

MobileLAN access WA22

- WA22 access point
- Mounting bracket and hardware
- Documentation packet

For a complete list of the packet contents, see the *MobileLAN access WA22 Quick Start Guide* in the packet.

Accessories Box

Includes the accessories specific to your EasyADC components. For a complete list, see the *EasyADC Accessories* checklist in the box.

Installing the WA22

Choose a location for the **Mobile**LAN™ access WA22 access point based on these guidelines, then follow these instructions to install the WA22:

- Place the WA22 horizontally on a desk or counter, or mount it vertically on a wall with the included mounting bracket.

- Mount the WA22 as high as possible (at about two-thirds of the floor-to-ceiling distance), close to the area where the CK30s are used.

- Keep the WA22 clear of metal surfaces like beams or girders, which may decrease the radio range.

- Keep large quantities of paper products from blocking the line-of-sight between the WA22 and the CK30s, as these products do absorb the radio signals and make communications unreliable.

1 Get the **Mobile**LAN power bridge and AC power cord, two Ethernet cables (or other cables longer than 3.05 m [10 ft]), and two antennae from the Accessories box.

2 On the WA22, remove the antennae port caps and the plastic plug in the Ethernet port.

3 Attach both antennae to the WA22. Tighten the nut to finger tightness. If you are not using the mounting bracket, "Installing without a Mounting Bracket" on page 13, else go to the next paragraph.
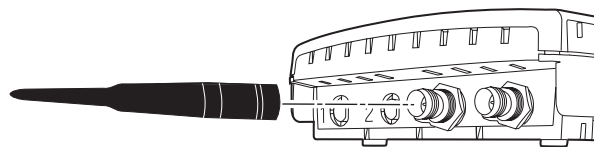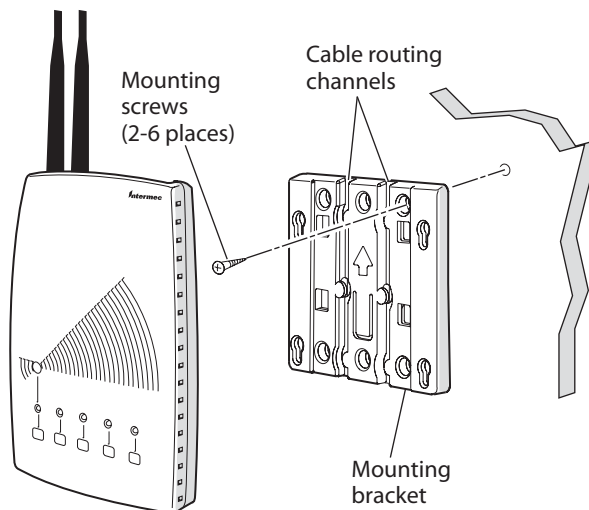
Installing with a Mounting Bracket

**1** Insert one shoulder screw into each of the four brass inserts and tighten them securely.
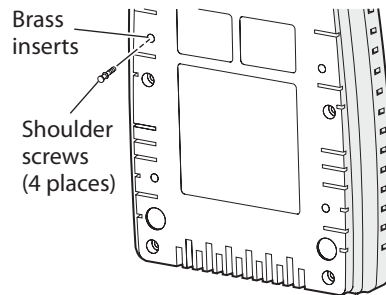
2 Using the bracket as a template, mark the mounting hole locations on the mounting surface.

3 Route the Ethernet cables through the cable routing channels in the bracket.

4 Mount the WA22 in the bracket by inserting the shoulder screws into the keyhole slots in the bracket. Slide the WA22 down until it is firmly seated.

Installing without a Mounting Bracket

1 Connect one Ethernet cable to the WA22 Ethernet port.
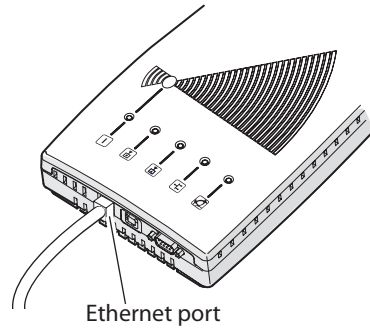
Ethernet port

2 Connect the Ethernet cable from the WA22 to the **Power & Data Out** port on the power bridge.

3 Connect an Ethernet cable from the **Data In** port on the power bridge to a port on an Ethernet hub or switch connected to your LAN.

4 Connect the AC power cord to the power bridge and an AC outlet.

Power & Data Out

Data In

To Ethernet
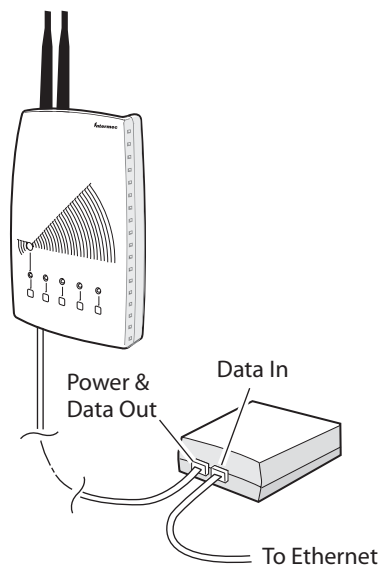
On the WA22, the green Power light turns on and stays solid and the other lights start blinking as the WA22 boots. The blue light turns on and remains on after the WA22 has finished booting.

Setting Up the AC2 and CK30s

**Note**: If you have already unpacked and installed the AC2, then skip to "Installing the Software" on page 16.

Do the following to set up the AC2:

1 Get the AC2 power supply and AC power cord from the Accessories box.

2 Place the charging dock on a flat, stable, and clean surface that is within 1.5 m (5 ft) of an AC power outlet.

3 Connect the power supply to the power connector on the back of the AC2.

4 Connect the power supply to an AC power outlet. The yellow Power light turns on showing that the charging dock is ready to charge.

Power
light
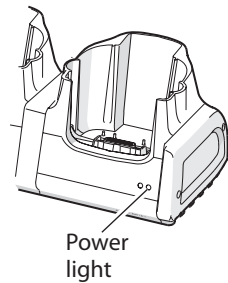
5 Get a CK30 and an AB1 battery from one of the CK30 shipping boxes.

6 Insert the tabs on the bottom of the battery into the CK30 and snap the battery into place.

If you want to use the included AL2 handstraps, continue with the next step. If you do not want to install the handstraps, continue with Step 8.
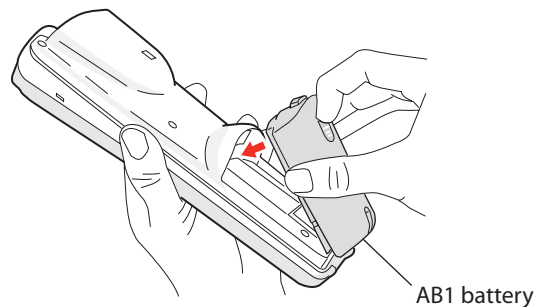

AB1 battery

7 Get an AL2 handstrap from the Accessories box and follow the instructions in the shipping bag to install the handstrap on the CK30.

Unhook the bottom of the handstrap to remove and install the AB1 battery.

Top of
handstrap

Adjustment
tab

Handstrap
hook
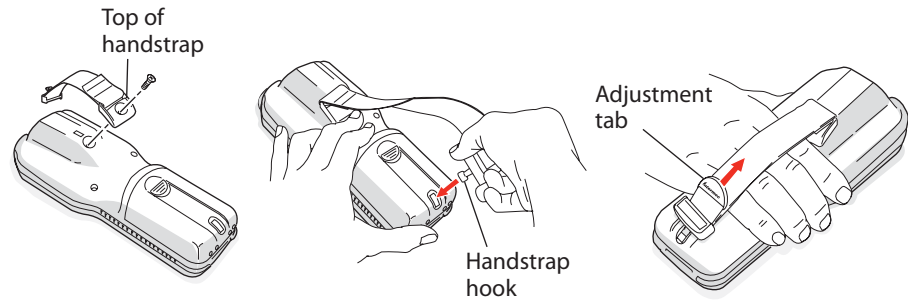
8 Slide the CK30 into any of the four bays on top of the charging dock. The Charge light for that bay turns on to indicate the battery charge status. For more information, see the *AC2 Charging Dock Quick Start Guide* that shipped with the dock.

Charge
lights
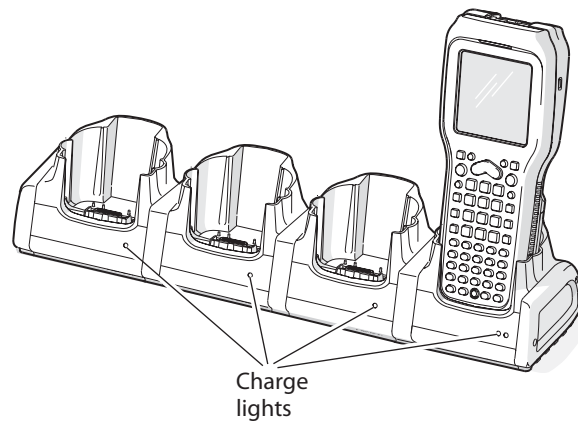
Repeat Steps 5 though 8 for the other CK30.

Installing the Software

> **Note**: You should have the SAP Business One application installed on your designated EasyADC PC. If not, please contact your SAP Business One partner of choice for more information.

If the installation does not start automatically, select **Start** > **Run**, enter the setup command, such as "D:\setup.exe," then click **OK** to start the InstallShield Wizard.
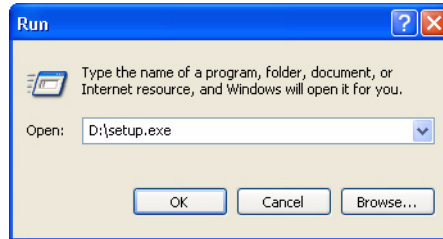
Installing the SmartSystems Foundation - ADC Console

Get the installation CDs from the shipping box. Insert the "SmartSystems Foundation - ADC Console" CD into the CD drive in the designated EasyADC PC also running the SAP Business One application.

If you do not have Microsoft .NET Framework 1.1 on your designated PC, then the process begins with the Microsoft .NET Framework 1.1 installation. Follow the onscreen instructions to install and configure the .NET Framework files.

After the installation wizard is set up for the SmartSystems Server Setup, click **Restart** to reboot your PC.
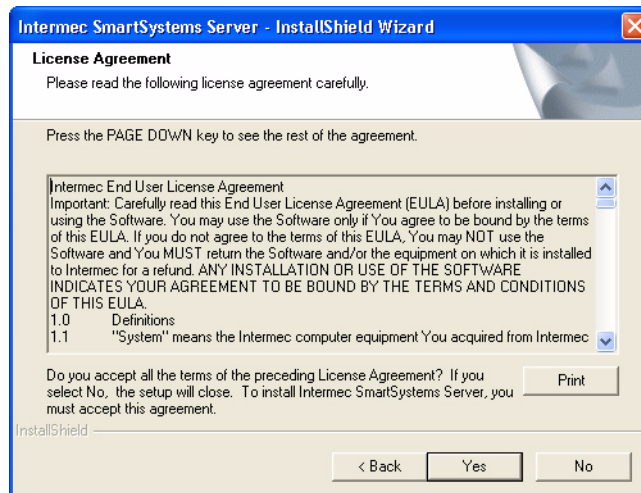

After your PC reboots and you return to your desktop, wait for the SmartSystems Server InstallShield Wizard to appear.
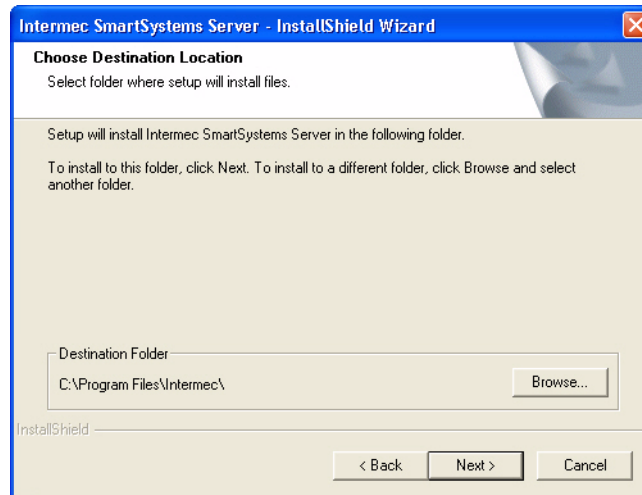
1 Click **Next** to begin the installation.
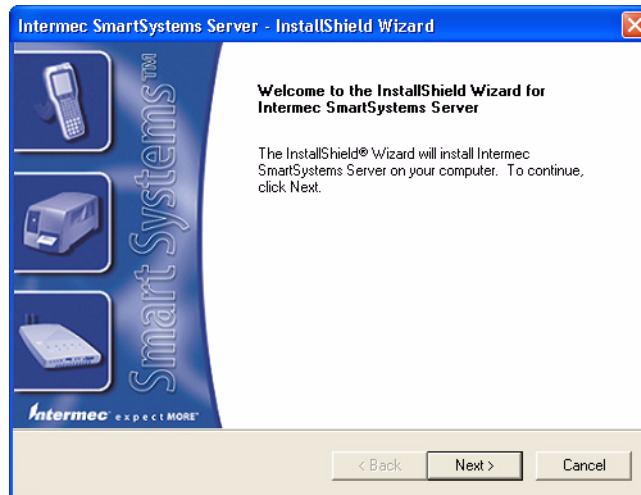
**2** Click **Yes** to accept the license agreement.

3 Click **Browse** to change the location if necessary. Click **Next** to install the SmartSystems Server in the location defined.

4 Wait approximately fifteen minutes while the InstallShield Wizard installs a number of features needed for the SmartSystems Server.

Select **Yes, I want to restart my computer now**, remove the installation CD, then click **Finish** to shut down the computer and reboot.

**5** Once you are back on the desktop, wait several minutes before you see this message. Click **OK** to close.
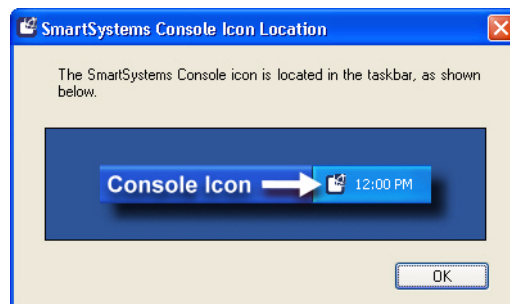
Installing the EasyADC for SAP Business One

Note: You should have the SmartSystems Foundation application installed on your designated EasyADC PC. If not, please go to "Installing the Smart-Systems Foundation - ADC Console" on page 16 to install this application.

Before you do the next installation, close all SmartSystems explorer windows, right-click the **SmartSystems Console** icon in the Windows system tray for a pop-up menu, then select **Exit** to close the application.
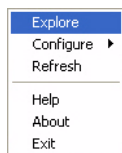

Installing EasyADC

Insert the CD with "EasyADC for SAP Business One" on the label into the CD drive in the designated EasyADC PC, then wait for the EasyADC InstallShield Wizard to appear.

1 Click **Next** to begin the installation.

2 Follow the onscreen instructions for the LabelShop® PRO 6 application with all its default settings.

3 Select **Yes, I want to restart my computer now**, then click **Finish** to install the EasyADC Data Collection Manager.
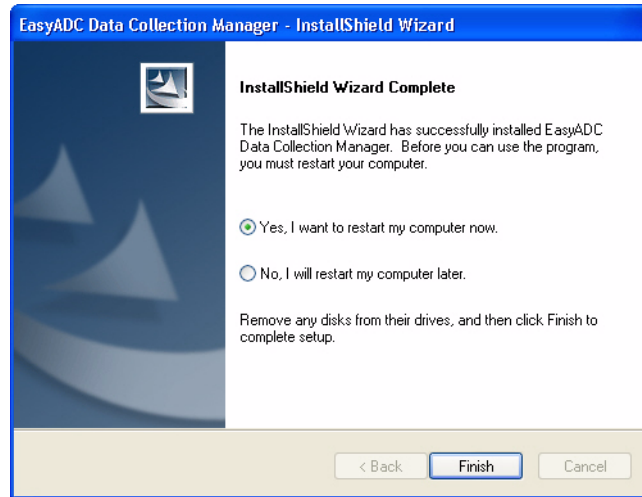
Including the WA22 Access Point

1 Wait as the system looks for the WA22. When the WA22 is located, its EasyADC PC IP address appears in the **Host IP Address** field. Enter a range of IP addresses for your system, then click **Next** to continue.
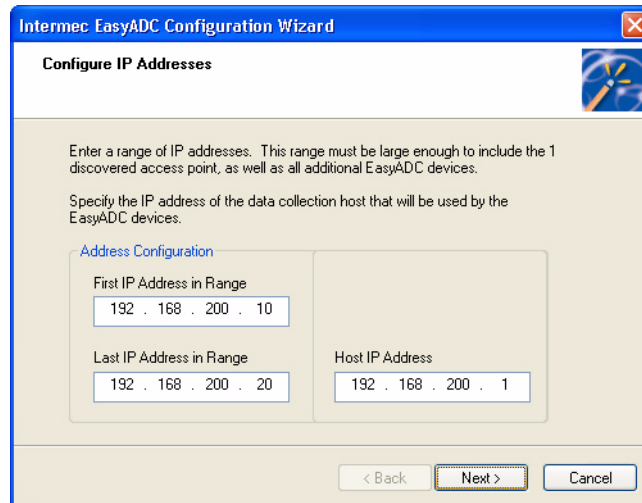
2 The progress of the Configuration Wizard is monitored. As each task is complete, that box is checked in the list. *This may take up to five minutes.*
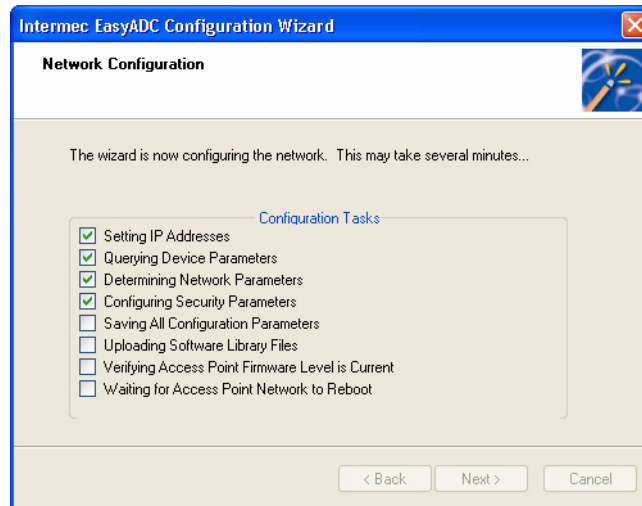

3 Once the Intermec Ready-To-Work™ indicator (blue light) for the WA22 returns to steady on, reboot all of your other EasyADC devices to their defaults, then click **Finish** to complete the configuration. See "Resetting Defaults" on page 33 to perform these reboots.
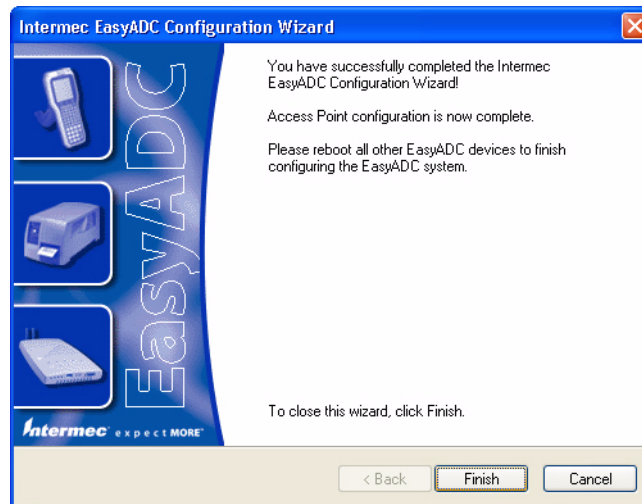
Finishing the Software Installation

1 Select **Yes, I want to restart my computer now**, remove the installation CD from the CD drive, then click **Finish** to shut down the computer and reboot. *Note that this may take several minutes.*
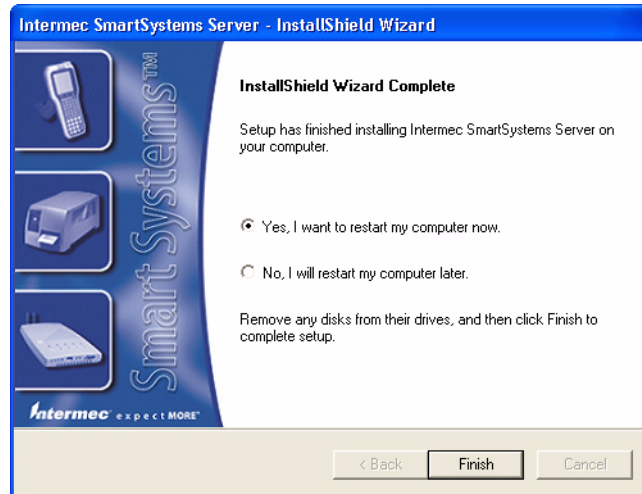
2 Once you are back on the desktop, get the LabelShop PRO 6 envelope from the Accessories box and take the LabelShop dongle from the envelope. Plug the LabelShop dongle into an available USB port on the Easy-ADC PC.

Installing the PM4i

Do the following to install the **Easy**Coder® PM4i Printer:

Unpacking the PM4i

1 Unpack the PM4i and its box of printer accessories.

2 Get the teal high edge guide and AC power cord from the Printer Accessories box. Set aside the other items described in the user guide for later.

Note: The sample media and ribbon in the printer box are not intended for use with the EasyADC. Do not use them in this installation.

3 Get the 3.05 m (10 ft) Ethernet cable from the EasyADC Accessories box or another Ethernet cable if you need a longer cable run.

4 Connect the AC power cord to an AC outlet and the back of the PM4i.

5 Connect the Ethernet cable from your network hub or switch to the Ethernet port on the back of the printer.

Installing the Ribbon
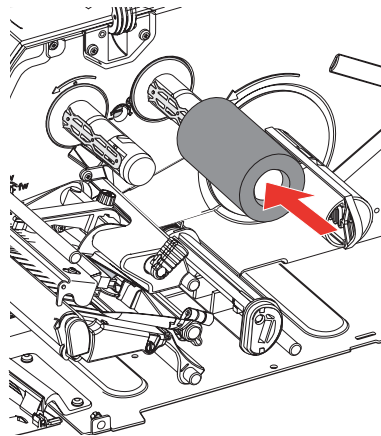
1 Open the printer front and side doors.
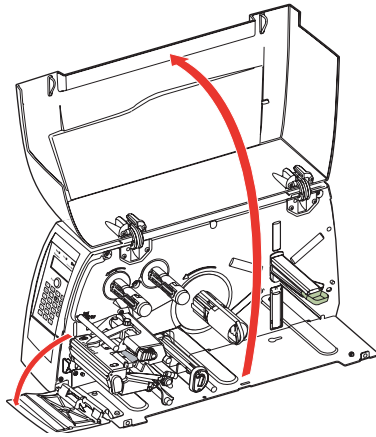
2 Turn the printhead lift lever clockwise to raise the printhead.
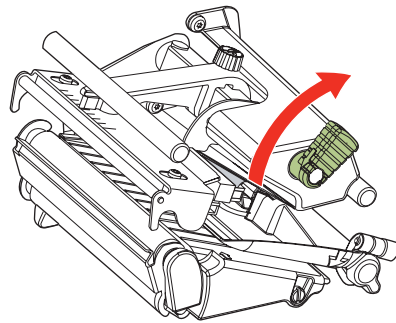
3 Get the roll of thermal transfer ribbon from the EasyADC shipping box.

4 Remove the wrapper from the 2-part ribbon and cardboard core package.

5 Slide the ribbon onto the supply hub so the shiny side faces up when the ribbon is routed through the print mechanism.
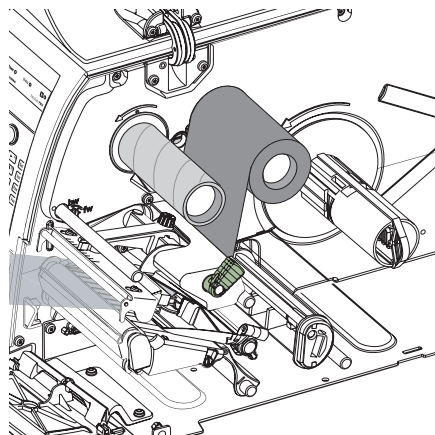
6 Route the ribbon through the print mechanism under the transparent upper LSS guide. Pull out about 20 cm (8 in) of ribbon leader.
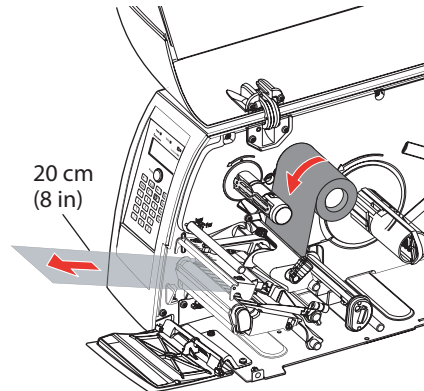
7 Without releasing the ribbon, turn the printhead lift lever clockwise to engage the printhead and lock the ribbon.
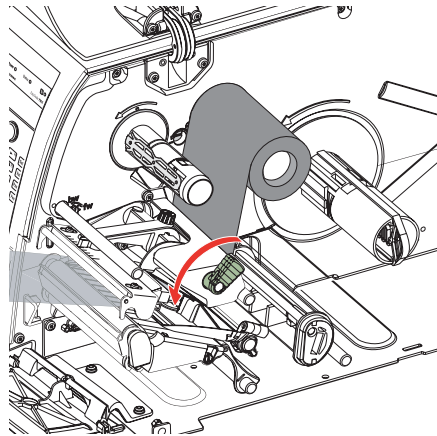
8 Slide the cardboard core onto the ribbon rewind hub.

9 Bring the end of the ribbon back over the printhead and around the cardboard core. Press the adhesive end of the ribbon onto the core, make sure to line up the sides of the ribbon with the edges of the core.
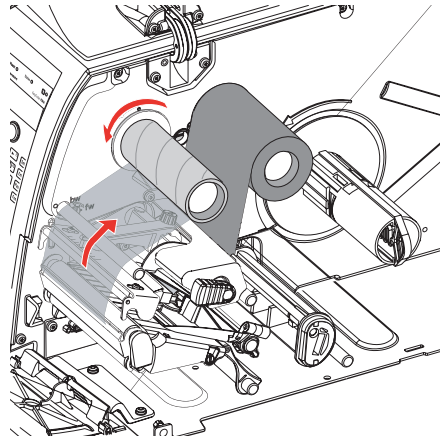
Turn the printhead lever clockwise to release the ribbon. Manually advance the ribbon until all of the metallic leader has passed the printhead and the ribbon becomes tight.
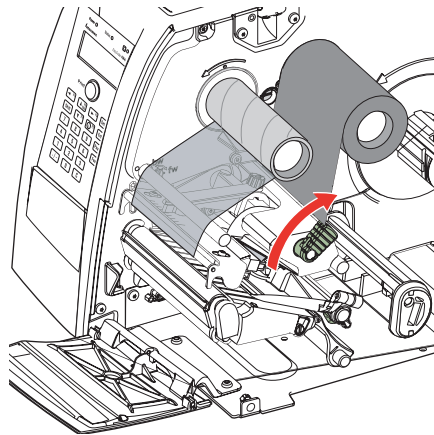
Removing the Low Edge Guide

Do the following to remove the installed low edge guide:

1 Tilt the low edge guide so it is parallel to the mounting arm.

2 Pull the edge guide toward the front of the printer and unhook the guide by rotating it counterclockwise as seen below.
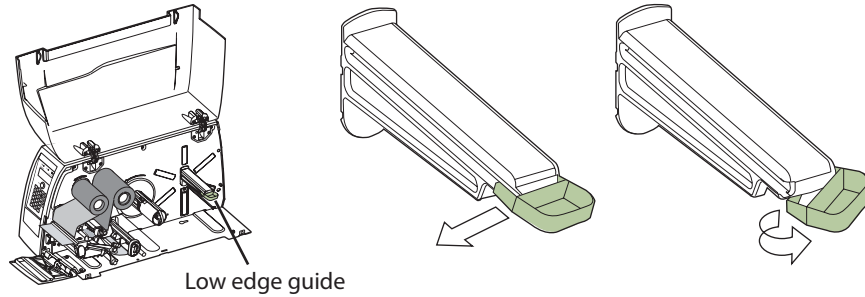
Low edge guide

3 Install the high edge guide by reversing steps 1 and 2. For help, see "Media Supply Roll Post" in Chapter 2 of the *EasyCoder PM4i Bar Code Label Printer User's Guide*.
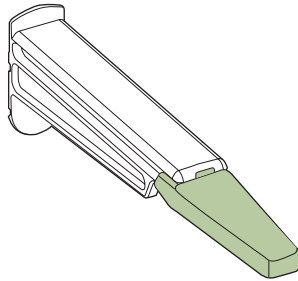
Installing the Media

1 Get a roll of 4x6-inch media from the EasyADC shipping box.

2 Place the roll on the supply post and push it all the way to the bottom of the post.
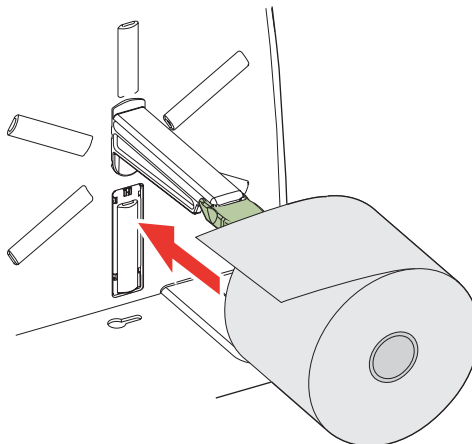
3 Fold up the edge guide and slide it next to the edge of the media roll to hold the roll in place on the supply post.

4 Route the media through the print mechanism, keeping the media as close to the middle wall of the printer as possible. The label path here is also illustrated inside the printer lid.
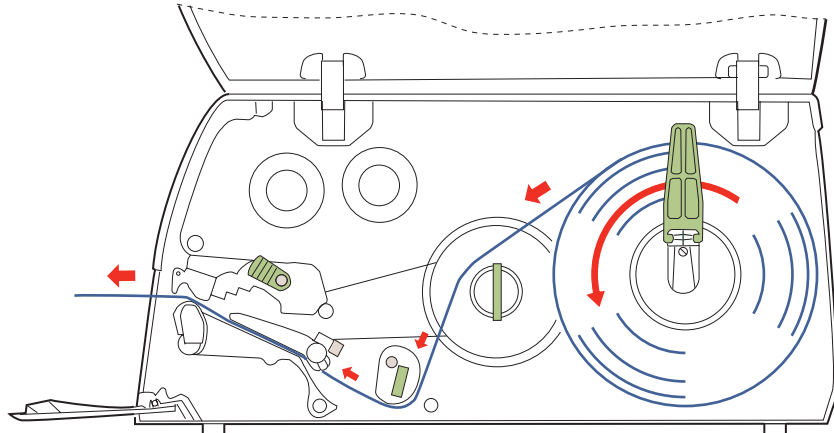
5 Turn the printhead lever counterclockwise to engage the printhead.
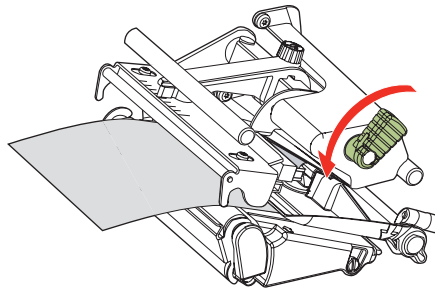
6 Adjust the position of the green edge guide so the media is guided with a minimum of play and lock the nut.
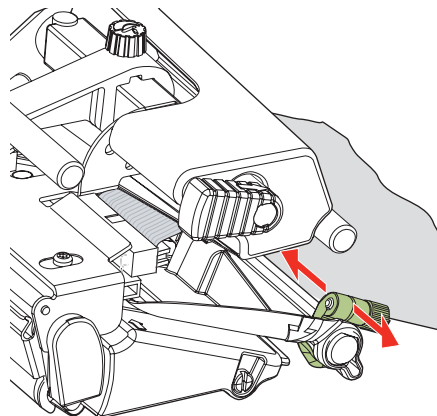
7 Adjust the position of the edge guide on the label slack absorber according to the width of the media.
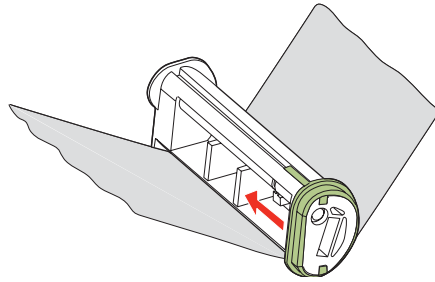
8 Close the front and side doors, making sure that the media runs through the front door slot.
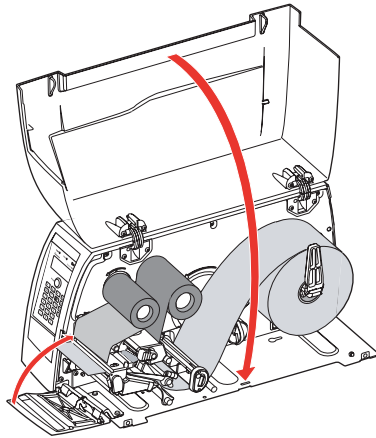
Activating the PM4i Printer

Turn on the PM4i. The display on the front of the printer shows initialization messages. When initialization is complete, the SmartSystems Console looks for the printer and connects it to the network. When the printer is connected, it pulls the excess ribbon back in and prints a test label. The red error light turns off, and the Intermec Ready-To-Work blue light stays on, indicating that the PM4i is configured correctly.

If the test label does not print and the red error light stays on, there is a problem connecting the printer. See "Resetting the WA22 to Factory Defaults" on page 87 to correct this connection.

Configuring the CK30s

These instructions assume your CK30s are set up for your network. If not, then go to "Setting Up the AC2 and CK30s" on page 14.

If the CK30s did not turn on when you installed batteries, press ¹⁄o to turn them on. When the CK30s turn on, the Setup Assistant screen appears.
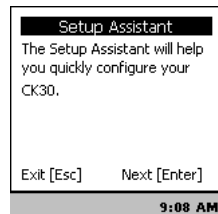
Follow the next procedure to configure the CK30s. You will use the following keys, illustrated below, in working with the CK30.
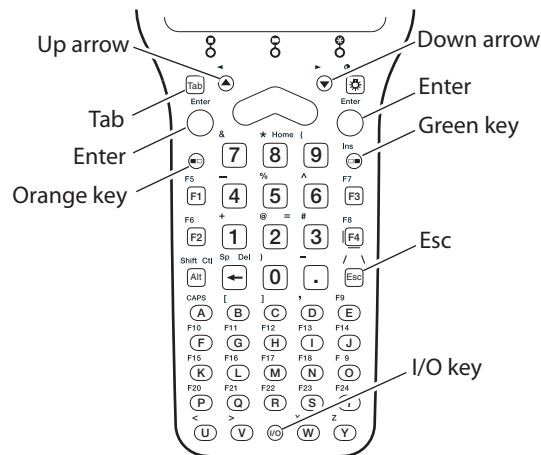
To configure the CK30s:

1 Press **Enter** for the ION Client screen.

2 Press ▲ to choose **Yes**, then press **Enter** for progress messages to appear.

3 Press **Enter** when the Setup - Complete screen appears.

4 After the CK30 reboots, the blue light on the CK30 blinks as the CK30 tries to establish contact with the WA22. This contact may take a few minutes. When contact is established, the EasyADC login screen appears on the CK30 display and the blue light stops blinking and switches to a solid blue.

5 Press ◼▭, ▭◼, [**1**], [**3**], then [**1**] to set the date:

   a Press **Enter**.

   b Use **Tab** to switch fields and ▲ and ▼ to set the date.

   c Press **Enter**, then **Esc** to return to the Device Settings screen.

6 Press [**2**] to set the time:

    a Press **Enter**.

    b Use **Tab** to switch fields and ▲ and ▼ to set the time.

    c Press **Enter**, then **Esc** to return to the Device Settings screen.

7 Press **Esc** until you exit the Configuration Utility. When prompted to have your settings persist through a cold-boot, press **Enter**. Press **Esc** when the System Main Menu appears. When the EasyADC login screen appears, you are ready to login.

Starting the EasyADC Data Collection Manager
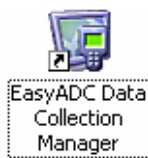
If the Data Collection Manager is started on your system, close the application, then start it again. From the desktop, select **Start** > **Programs** > **Intermec** > **EasyADC Data Collection Manager** > **EasyADC Data Collection Manager**, or double-click the **EasyADC Data Collection Manager** icon on the desktop.

After you have thoroughly tested your EasyADC installation and trained your staff, you are ready to go live with the EasyADC. To go live, you simply switch from your test database to your active database.

To switch to your active database

1 From the EasyADC Data Collection Manager, select **File** > **Configuration Options** > **SAP Database Options**.

2 Enter your **Database Server Name** (either the machine name or the IP address) of the machine where your database is located.

3 Enter the **Database User Name** and **Database Password** (and verify the password) of your database administrator.

4 Enter the **Company Name** of your company's database to use, then click **Save** for the EasyADC to use the active database.

Go to Chapter 4, "Using the EasyADC® Data Collection Manager" on page 49 to learn more about using this application.

Setting Security

1 To set the security for your system, right-click the WA22 access point icon in the "\SmartSystems Console\Discovered Devices" folder, then select **Security** to access its Security Level.
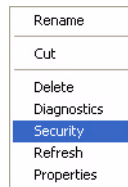
2 Click **Max** to set the security level to maximum, then click **OK**.

Your installation of the EasyADC is complete! For more information on operating your Intermec hardware products, see the user's manual or quick start guide for that product. Complete manuals for your Intermec products are available as PDF files on the CDs. Browse for the "\Manuals" folder.

Using the SmartSystems Console

Now that the SmartSystems Console and EasyADC Data Collection Manager are installed and running, you can use the SmartSystems Console to monitor the status of each component in the system.

1 Right-click the SmartSystems Console icon in the Windows system tray, then select **Explore** to initiate the SmartSystems Console.
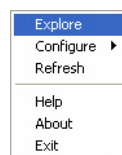
2 In the SmartSystems Console, click **Discover** to add devices to the "\SmartSystems Console\Discovered Devices" folder.
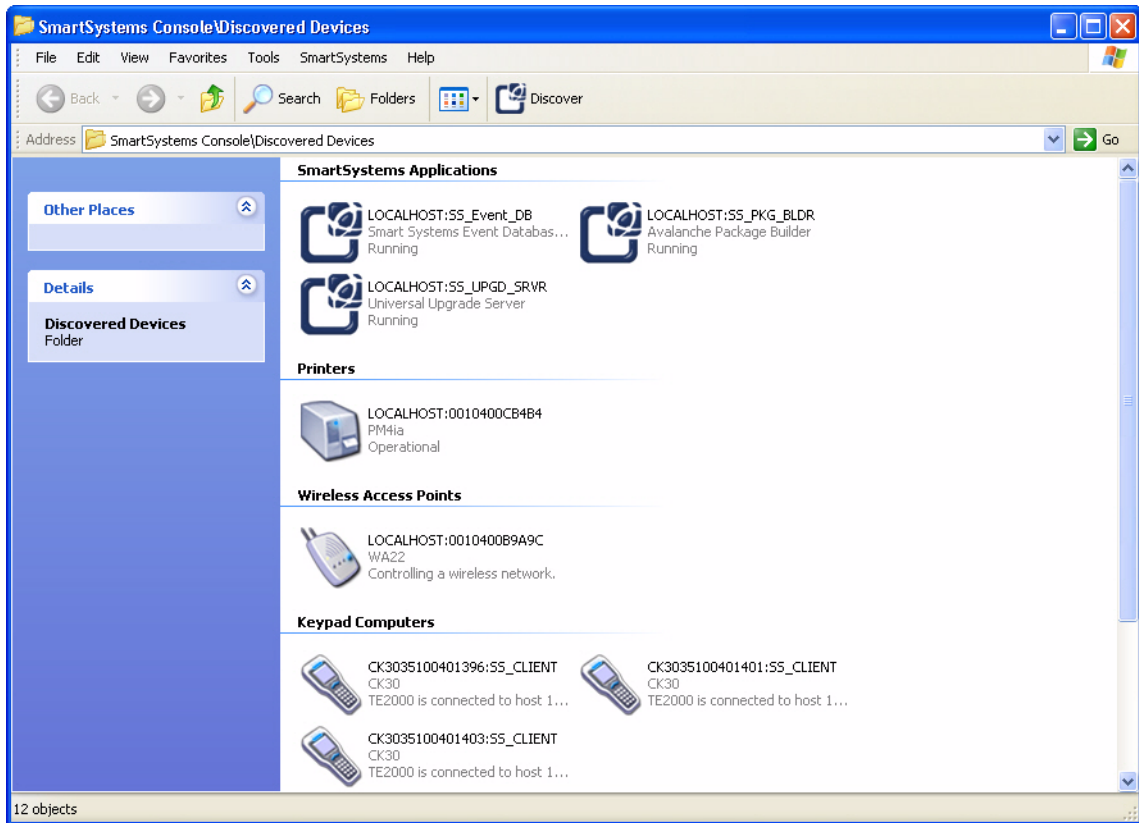
Or, click **SmartSystems** > **Add Devices** to initiate the EasyADC Configuration Wizard which scans your network for additional devices to add to the "\SmartSystems Console\Discovered Devices" folder.
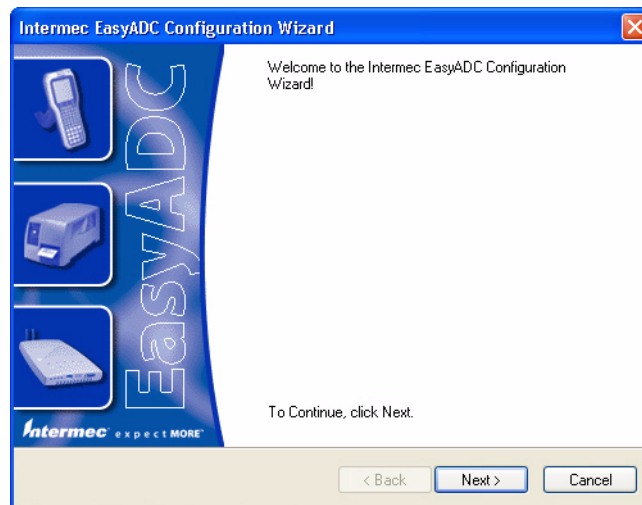
For more information, see the *SmartSystems Console Online Manual*. In any SmartSystems Console screen, select **SmartSystems** > **Help**.

Uninstalling the Software

To uninstall SmartSystems and EasyADC, you need to restore the default hardware settings for all components and then uninstall the SmartSystems Console and EasyADC Data Collection Manager software.

Follow this procedure carefully. Restore the CK30s, WA22, and PM4i devices to their default conditions before you uninstall the SmartSystems and EasyADC software. **Uninstalling the software before restoring the hardware defaults requires you to return components to Intermec Technologies for repair.**

Note: Although your server and client software are not affected by uninstalling SmartSystems and EasyADC, be sure to know the name of your server. You need the server name to install the software.

Closing Applications

Close these applications on the EasyADC PC:

- SmartSystems Console
- EasyADC Data Collection Manager
- LabelShop PRO 6
- your SAP Business One client

Resetting Defaults

1 Restore the CK30 defaults by pressing ▢◼, ◼▢, **[1]**, **[6]**, **[ENT]** to select Yes, then the CK30 performs a cold boot. Press **⅟o** to turn off the CK30.

2 Restore the defaults on the WA22 as follows:

   a In the SmartSystems Console, select **SmartSystems** > **Restore Defaults** from the toolbar.

   b Click **Next**, click **Yes**, then click **Finish**.

3 Restore the defaults on the PM4i as follows:

   a Press **Setup**, then press the right arrow key until **Test/Service** appears.

   b Press the down arrow key, then the right arrow key until **Memory Reset** appears.

   c Press the down arrow key for "All" to appear, then press **Enter** to select the option to reset All memory.

   d Press **Setup** to exit the setup menu. The PM4i initializes and resets.

4 Right-click the **SmartSystems Console** icon in the system tray, then select **Exit**.

Removing Programs

1 From the desktop, select **Start** > **Settings** > **Control Panel**, then click the **Add or Remove Programs** icon.

2 For each of the following (in this order), select the program name, click **Remove**, then follow the prompts to remove each:

  a Microsoft .NET Framework

  b SmartSystems Console

  c EasyADC Data Collection Manager

  d LabelShop PRO

3 Close the Add or Remove Programs window.

4 From the desktop, click the **My Computer** icon, then delete the "C:\Program Files\Intermec" folder.

For More Information

Browse for the "Manuals" folder on your CD, or visit the Intermec website at www.intermec.com to download current PDF manuals. To order printed versions of the Intermec manuals, contact your Intermec representative.

See the *EasyADC Service and Support Card* for specific information about maintaining your EasyADC. If you need assistance, call 1-800-755-5505, select the option for technical support, then the option for SMB™ products.

3 Using the CK30 Handheld Computers

The following information is in this chapter:

The CK30 Keypad

Your EasyADC® CK30 Handheld Computer has a 52-key full numeric keypad as shown in the next illustration.
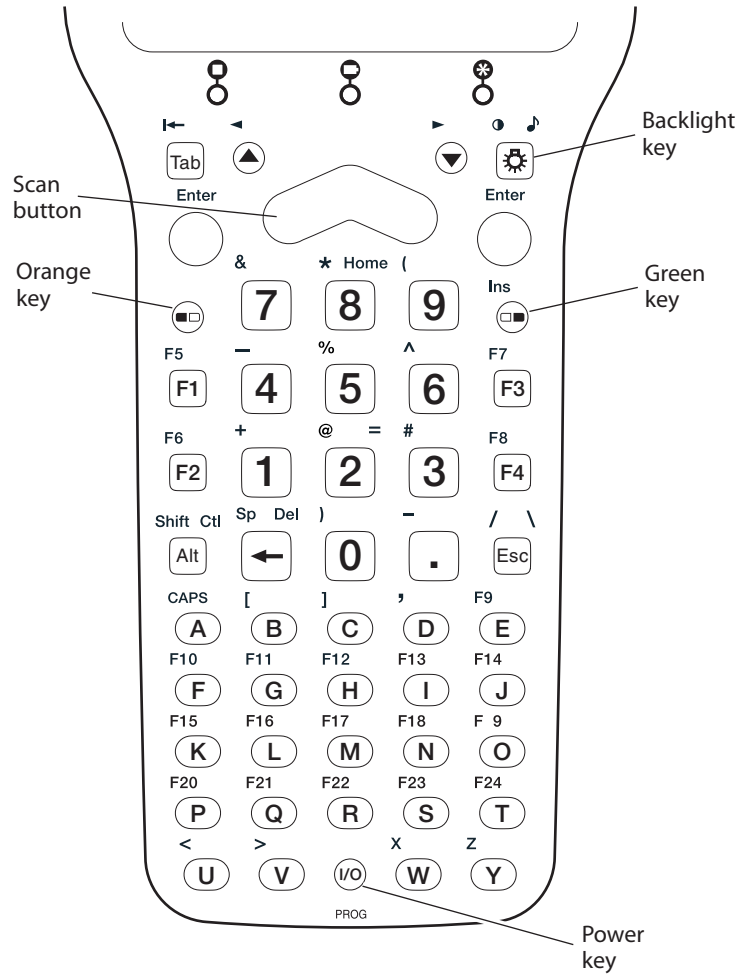
CK30 52-key Full Numeric Keypad

This chapter describes how to use this keypad to navigate through the EasyADC Inventory Transactions.

To learn how to use the keypad, including how to use the color-coded keys and how to capitalize characters, see the *CK30 Handheld Computer User's Manual* (P/N 073528).

A Diagram of CK30 Functions

Down Arrow:
Scroll to next entry

Up Arrow:
Scroll to previous entry

Activates scanning laser

Orange +⬆
Scroll to previous
page

Orange +⬇
Scroll to next page

Orange Key:
Acts as a Shift key to
activate alternate keys

Back light

Enter key

F1:
Posts transactions.

F3:
View selections

F4:
Saves serial number
selections.

Esc key

F2:
See a list of entries

Back Space:
1. Deletes last character
   typed
2. Acts as a forward
   space if the Orange
   Key was pressed.

Power button
Suspend/Resume

Tips for Working with EasyADC Inventory Transactions

The next tables contain helpful information on using capitalization, entering data, and using special keys in the CK30 Inventory Transactions.

General Guidelines for Working in the CK30 Inventory Transactions

Topic	Description
Case sensitivity	All CK30 inventory transaction options are case-sensitive. When you key a field in uppercase, the database is updated in uppercase. If you key an inventory name in lowercase and the database has it stored in uppercase, the item cannot be found.
Selecting an option	To select an option from any CK30 inventory transaction, you press the number associated with the option.
Entering data	There are several ways to "enter data" with the CK30: • Scan a bar code. • Type the data on the keypad, then press **Enter**. • Scroll through a scroll list to the item, then press **Enter**.

Scrollable Lists in CK30 Inventory Transactions

Characters	Description
<▲ ▼>	These characters appear when there is a scrollable list from which to select. To move through the list, press the left arrow (press the orange ■▭ key and ▲) or the right arrow (press the orange ■▭ key and ▼). When you find the desired selection (or when the correct value is displayed), Press **Enter** to select the currently displayed value. You may also key or scan the value on these screens.

Using Special Keys in CK30 Inventory Transactions

Special Key	Description *Note that these are also available on an Options line or near the bottom of the screen.*
Esc	Press **Esc** to return to the last logical screen. If you are on the first screen of an option (such as deliver sales order), pressing **Esc** returns you to the Main Menu. Data may or may not be discarded, depending on the situation.
F1	Press this key to post your transaction when you are done with your current data entry routine. For example, the [**F1**] option appears after receiving items in **Good Receipts PO**. Pressing [**F1**] means that you are done receiving a PO and are ready to update your server.
F2	Press this key to see a list of entries from which a selection may be made.
F3	Press this key to view your selections which have already been made.
F4	Press this key to save the current serial number selections.

Logging On and Off

When you turn on an EasyADC CK30, a login screen appears.

To log on the CK30

The user name and password may be case-sensitive, depending on your system. Intermec recommends using all uppercase user names and passwords, since toggling capitalization on the CK30 requires extra keystrokes. Be sure to enter the user name and password from your ERP system.

1 Type a valid user name in the **Enter User Name** field, then press **Enter**.

2 Type a password in the **Enter Password** field, then press **Enter**.

To log off the CK30

From the Main Menu, press [**0**] for the login screen.

Overview of EasyADC Inventory Transactions

This describes how to use the CK30 keypad to move through the EasyADC Inventory Transactions.

Main Menu

The **Main Menu** appears after you log in successfully and when you exit an option, such as **Good Receipt PO**. To select an option from any CK30 inventory transaction, press the number associated with the option. The options on the Main Menu are described in the next few pages.

Goods Receipt PO

You use the **Good Receipt PO** option to receive items against a valid Purchase Order.

Here is an overview of a typical receiving process with the CK30:

1 The product arrives on pallets in the receiving area and is verified against the Vendor Packing Slip.

2 Log into the CK30, press [**1**] to select **Good Receipt PO** from the Main Menu.

3 Enter the PO Number to receive against by scanning a bar code or typing the number and pressing **Enter**.

4 Scan the first item you want to receive, then enter the quantity to receive for the item. The labels then print from the PM4i.

5 When finished, press [**F1**] to post the Receiving Transaction Entry.

6 The items are staged in the receiving area for the put-away process.
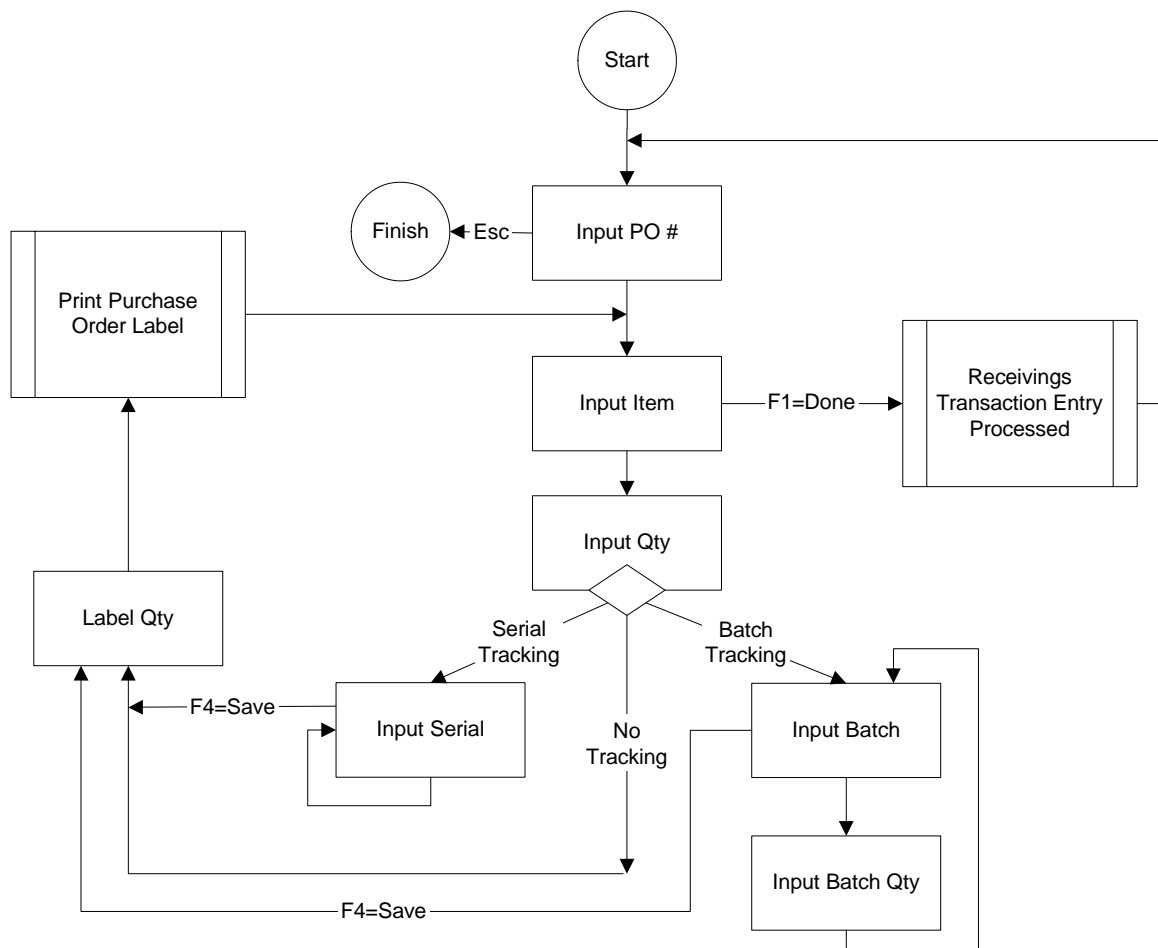
Receiving for Purchase Order Processing: *This diagram illustrates the general information flow on the CK30.*

Delivery Sales Order

You use the **Delivery SO** (**Sales Order**) option to indicate whether a shipment or delivery of goods occurred. Creating a Delivery SO reduces actual stock levels. The Delivery SO is linked to a Sales Order.

Here is an overview of a typical sales order fulfillment with the CK30 when the picking tickets are given to warehouse personnel:

1 Log into the CK30, then press [**2**] to select **Delivery SO** from the Main Menu.

2 Scan the Sales Order Document Number Barcode on the pick ticket, then scroll through the list of items until you find the item to pick.

3 In the warehouse, find the item to pick, scan its item bar code, type the quantity picked, then press **Enter**.

4 Continue the scanning process until there are no more items to pick on the sales order.

5 When finished, press [**F1**] to post the transaction.

6 When prompted, enter the number of boxes for which the label is printed, then press **Enter**. The labels then print from the PM4i.
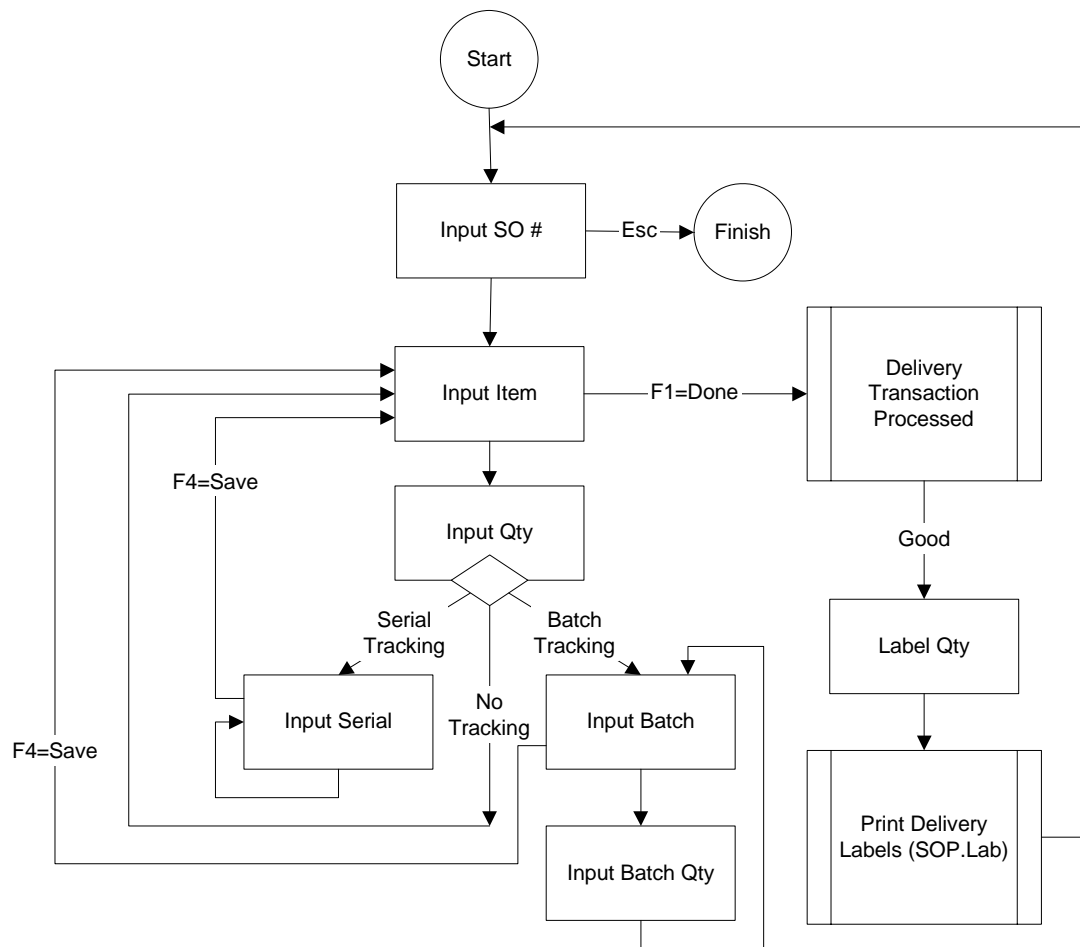
Goods Receipt and Goods Issue

It is possible to post a goods movement without referring to a customer or supplier. These movements are not the result of a procurement or sales process. Within the system, these movements are known as Goods Receipt and Goods Issues.

Goods Receipt

You use the **Goods Receipt** option when the company receives product that does not have a cost associated with it being added to the inventory. Thus, the stock level of that product is increased and the inventory account is debited while the inventory variance gain or loss account is credited. Here is an overview of a typical goods receipt with the CK30:

**1** Log into the CK30, then press [**3**] to select **Goods Receipt**.

2 Enter item numbers and their quantities. The labels then print from the PM4i.

3 When finished, press [**F1**] to post the transaction. No additional steps are needed.
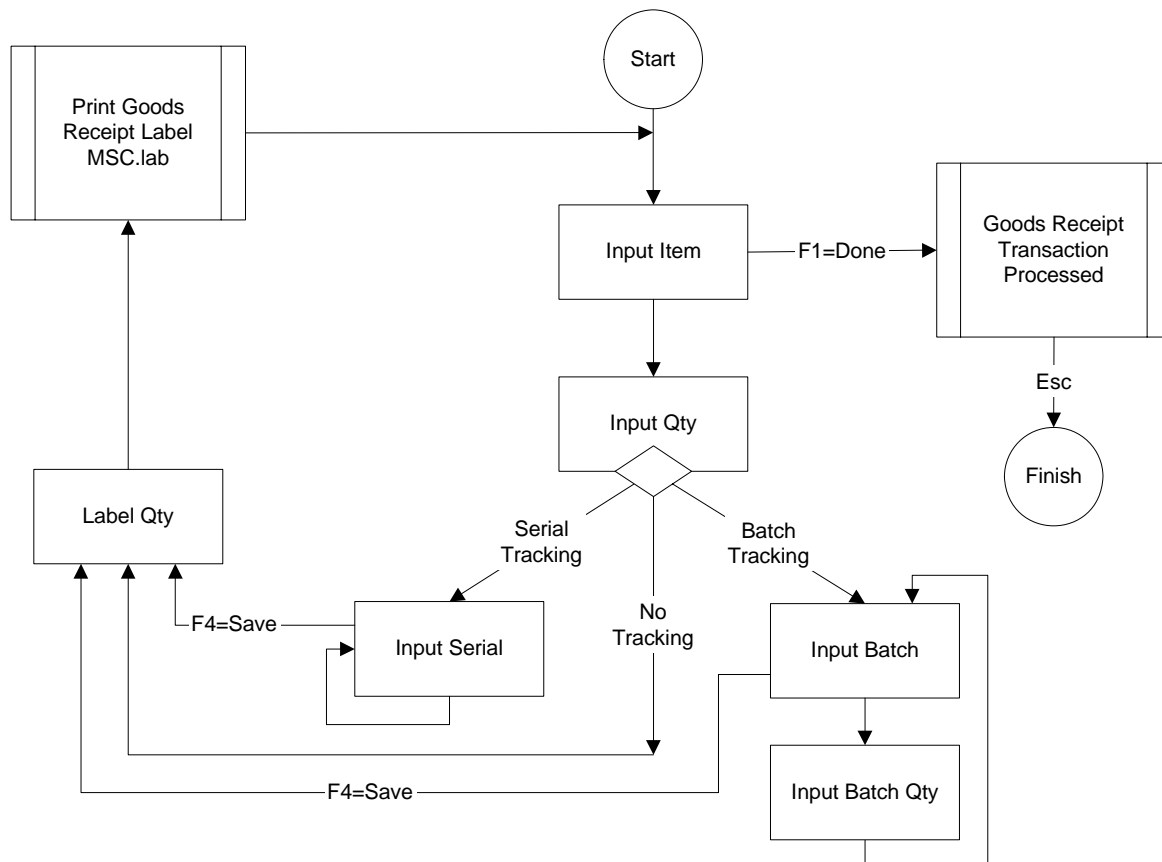
Goods Issue

You use the **Goods Issue** option when your company supplies product that does not have direct cost associated with the product leaving inventory. Thus, the stock level of that product is decreased and the inventory account is credited while the inventory variance gain or loss account is debited. Here is an overview of a typical goods issue with the CK30:
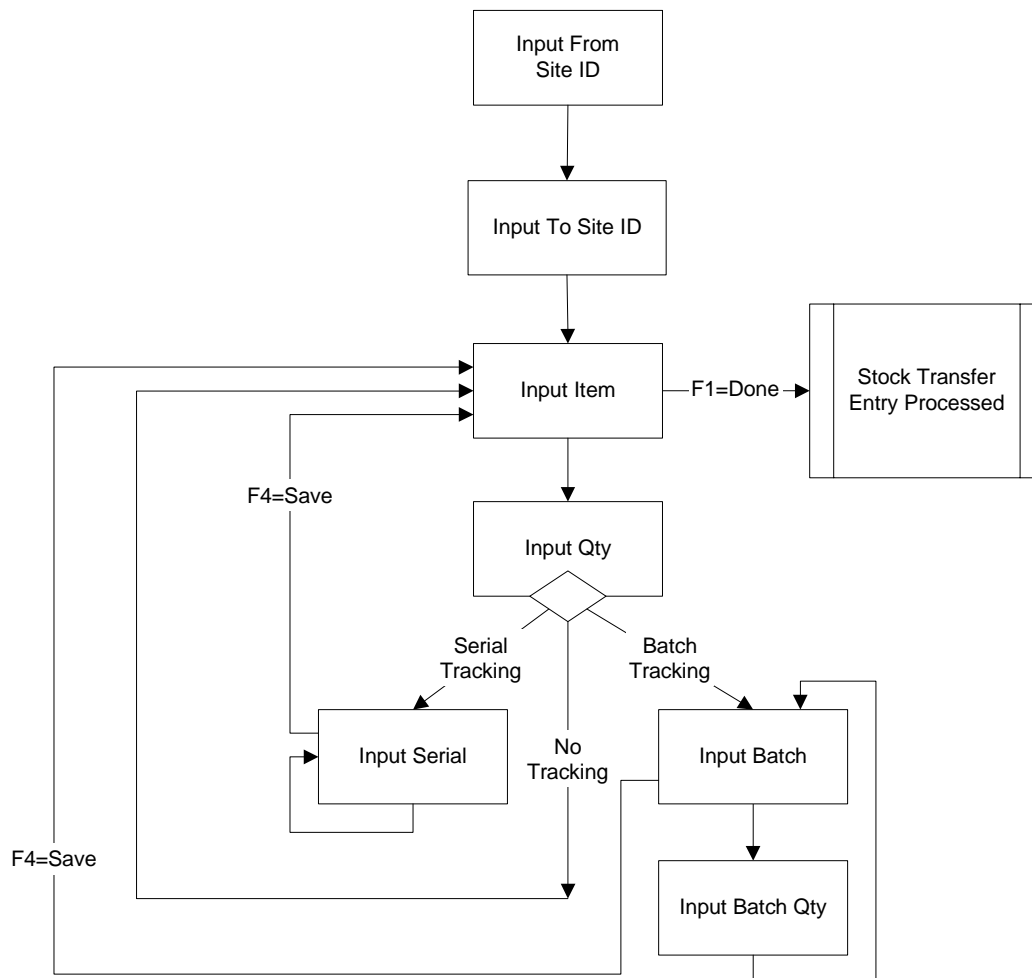
1 Log into the CK30, then press [**4**] to select **Goods Issue**.

2 Enter item numbers and their quantities.

3 When finished, press [**F1**] to post the transaction. No additional steps are needed.
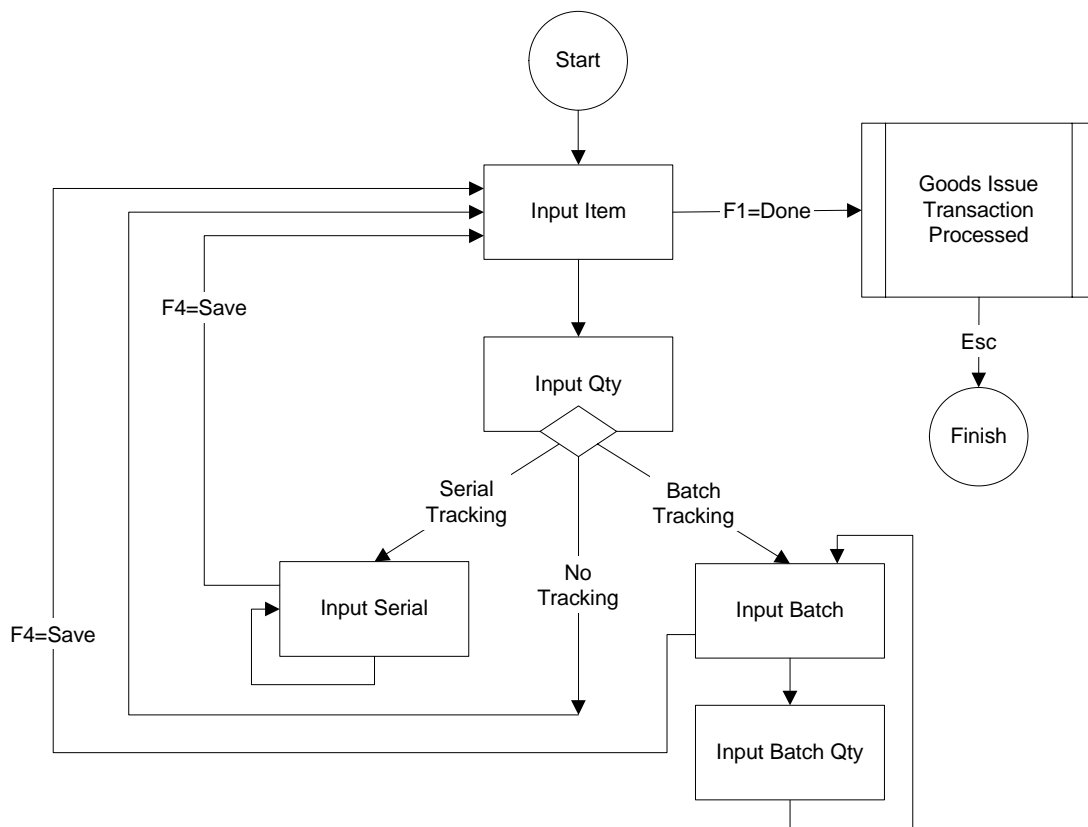
Stock Transfer

You use the **Stock Transfer** option to move inventory from one location or site to another, for example from the main warehouse to the remote warehouse. When you make a stock transfer, the account where the stock comes from is debited and the account where the stock goes to is credited. Here is an overview of a typical stock transfer with the CK30:

1 Log in to the CK30, then press [**5**] to select **Stock Transfer** from the Main Menu.

2 Enter the originating (or "from") site, and the destination (or "to") site for the transfer.

3 Scan the item number bar code from the item, then type in the quantity to transfer.

4 When finished, press [**F1**] to post the transfer.

```
                    ┌─────────────────┐
                    │   Input From    │
                    │    Site ID      │
                    └────────┬────────┘
                             │
                             ▼
                    ┌─────────────────┐
                    │ Input To Site ID│
                    └────────┬────────┘
                             │
                             ▼
                    ┌─────────────┐   F1=Done   ┌─────────────────┐
                    │  Input Item │────────────▶│ Stock Transfer  │
                    └──────┬──────┘             │ Entry Processed │
                           │                    └─────────────────┘
                           ▼
                    ┌─────────────┐
       F4=Save      │  Input Qty  │
                    └──────◇──────┘
              Serial  ╱        ╲  Batch
            Tracking ╱          ╲ Tracking
                    ▼     No      ▼
            ┌──────────┐ Tracking ┌──────────┐
            │  Input   │          │  Input   │
            │  Serial  │          │  Batch   │
            └──────────┘          └────┬─────┘
                                       ▼
       F4=Save                  ┌──────────────┐
                                │ Input Batch  │
                                │     Qty      │
                                └──────────────┘
```

Queries

You use **Queries** to check the database, such as inventory status, purchase orders, or sales orders.

When you select **Queries** from the Main Menu by pressing [**6**] on the CK30, a menu appears which offers the options described in this table.

Options on the Queries Menu

Option	Description
Inventory Status	This shows inventory quantities for any selected item.
Purchase Orders	This option lets you select a purchase order from a list of all open purchase orders to view.
Sales Orders	This lets you select a sales order from a list of all open sales orders.

Count Inventory

The Count Inventory feature only appears in the CK30 Main Menu after you start the inventory count from the EasyADC Data Collection Manager. See "Doing the Warehouse Inventory" on page 67 for information.

Use this feature to collect inventory counts by item and warehouse.

1 From the EasyADC Data Collection Manager, select **Inventory** > **Warehouse Maintenance**. Verify the correct warehouse is selected in the drop-down list, then click **Count Inventory** to start the count.
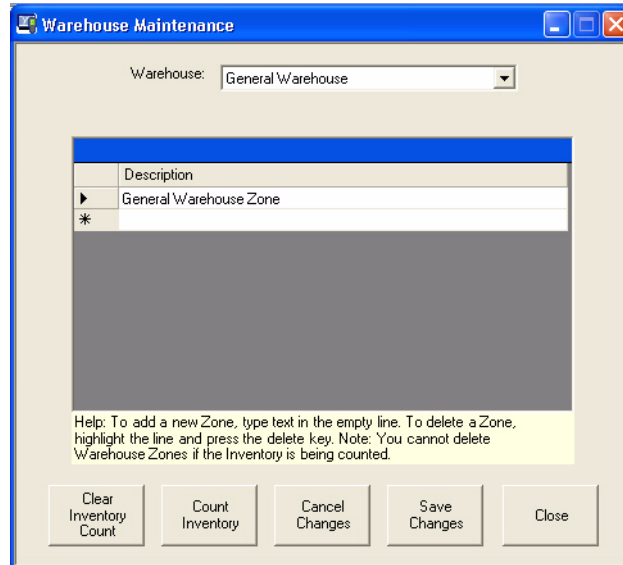
2 Log into the CK30, press [**7**] **Count Inventory** from the Main Menu, scroll to the warehouse zone to which to send the inventory count, press **Enter**, then enter the quantity for that warehouse zone.

3 When finished, press [**F1**] to post the inventory.
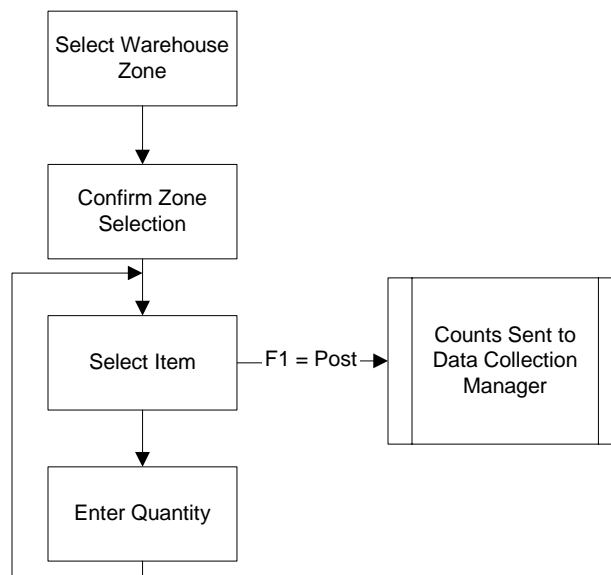
Build Item Cross-Reference

The Cross-Reference information resides in the EasyADC Data Collection Manager and does not update the SAP database. This feature only appears in the CK30 Main Menu after you enable cross-reference building from the EasyADC Data Collection Manager. See "Build Item Cross-Reference" on page 47 for more information.

Use this to pair alternate item numbers with item numbers found in SAP. You can use the item numbers instead of SAP item numbers in any transaction.

1 From the EasyADC Data Collection Manager, select **File** > **Configuration Options > ClientUI Options**. Check **Allow Building Cross-Reference Information**, then click **Save**.
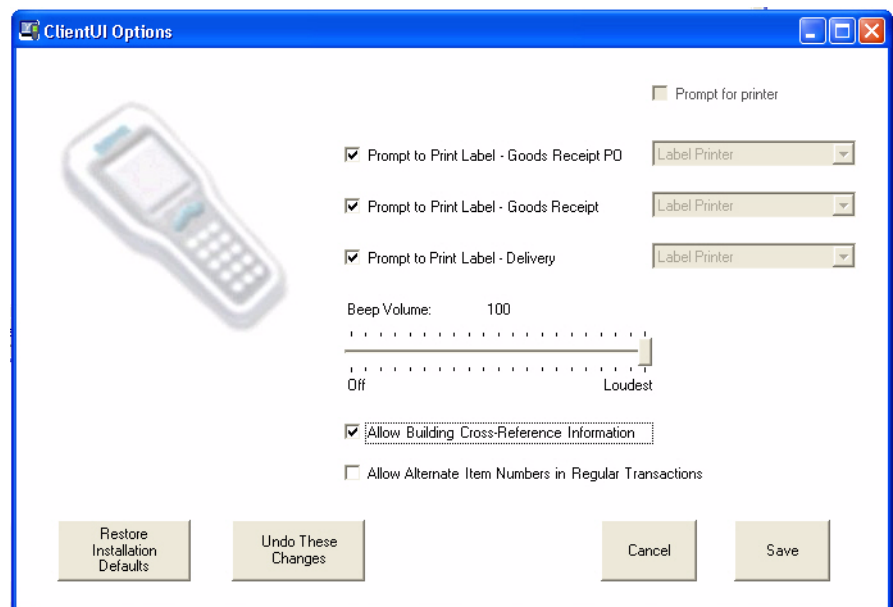
2 Log into the CK30, press **[A] Item Cross-Ref** from the Main Menu.

3 Scan or enter an SAP item number, then key in or scan the alternate item numbers (these must be unique), press **Enter**, then press **[F4]** to save your entries.

4 When finished, press **[F1]** to post the cross-reference.
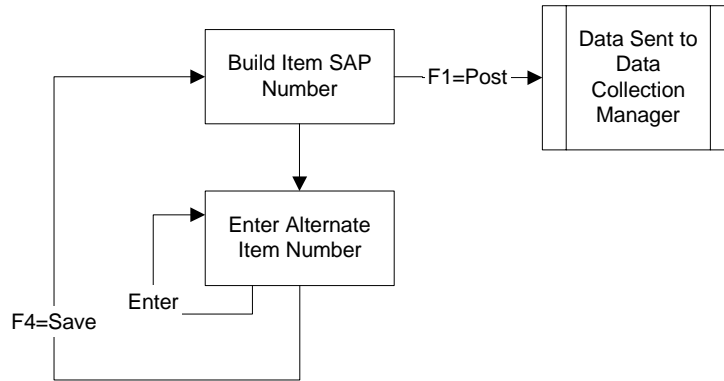
4 Using the EasyADC® Data Collection Manager

You will find these sections in this chapter:

- Starting the EasyADC Data Collection Manager (page 50)
- Designing Labels (page 50)
- Using the Remote Terminal Emulator (page 55)
- Using the System Manager (page 56)
- Viewing Log and Error Log Information (page 61)
- Running the Benchmark Reports (page 63)
- Doing the Warehouse Inventory (page 67)

Starting the EasyADC Data Collection Manager

There are two ways to start the EasyADC Data Collection Manager on the EasyADC PC. From the desktop, select **Start** > **Programs** > **Intermec** > **EasyADC Data Collection Manager** > **EasyADC Data Collection Manager**, or double-click the **EasyADC Data Collection Manager** icon on the desktop.

The Telnet server is needed for the EasyADC Data Collection Manager to operate properly. Should your service be disabled, go to "Starting the Telnet Server Automatically" on page 90 to ensure your service is set to start automatically before running the EasyADC Data Collection Manager.

Designing Labels

EasyADC comes with a default label format (or template) for each applicable module, which is specified on the corresponding tab. The associated file names are listed in the following table:

Label Manager Default Label Formats

Default Label Format	Associated File Name
Purchase Orders	POP.lab
Delivery	SOP.lab
Goods, Vendor information	MSC.lab

The files are stored in the "C:\Program Files\Intermec\EasyADC-SBO Data Collection Manager\Labels" folder. In the EasyADC Data Collection Manager, select **File** > **Configuration Options** > **Label Templates** to view these labels. For help, see the table on the next page.

You can modify default label files if you are using label sizes other than the current default (4" wide x 6" high) label size. Before you do, Intermec recommends that you save a copy of the original files first.

You can also use LabelShop® PRO 6 to create your own labels. Various data elements (fields) are available for printing when designing labels from both tables and values from the windows within the program. The type of data accessible do vary by module (tab) selected.

Note: Changes to the label format are not in use until the next time the EasyADC Data Collection Manager is restarted.

When designing labels, you must reference particular fields properly to have them print on a label format. The required structure for field names differs between table data and values on the Label Manager screens, but both types are presented here.

Goods Receipt PO	Provides the path to the default POP.lab file. Click **Browse** to go to a different location.
Goods Receipt	Provides the path to the default MSC.lab file. Click **Browse** to go to a different location.
Delivery Sales Order	Provides the path to the default SPO.lab file. Click **Browse** to go to a different location.
Company Name	Enter the company name that is to appear on the label.
Address Line 1	Enter the company's address that is to appear on line 1 for the address on the label.
Address Line 2	Enter the company's address that is to appear on line 2 for the address on the label.
Address Line 3	Enter the company's city, state and zip code to appear on the bottom line of the label.
Restore Installation Default	Click this to return all Label Templates information to their defaults.
Undo These Changes	Click this to clear any changes you made since you last clicked **Save**.
Cancel	Click this to clear any changes you made since you last clicked **Save**, then exit to close.
Save	Click this to save all changes, then exit to close.

## Goods Receipts Purchase Order Label

This transaction allows the printing of labels, one for each transacted item. That is, for each quantity based item, one label is printed per item number. For each serialized item, one label prints per serial number. You can print duplicates for any of these items.

LabelShop PRO 6 Bar Code Items	Description
ITEMNBR	Prints the item number and bar code.
ITEMDESC	Prints the first 50 characters of the item description.
QUANTITY	Prints the received quantity for quantity based items. Prints a quantity of one for serialized items.
SERIAL_BATCH_NBR	Prints the serial number and bar code for serialized items (managed by serial number).

LabelShop PRO 6 Bar Code Items	Description
SERIAL_BATCH_LBL	Prints the serial number and bar code for serial items on the label.
COMPANY NAME ADDRESS 1 ADDRESS 2 ADDRESS 3	Prints the company name and its address.
PONUMBER	SAP Business One purchase order and associated bar codes.
VENDORNBR	Prints the vendor ID and bar code.
WHSCODE	Prints the warehouse code.
WHSNAME	Prints the name of the warehouse.
VENDORNAME	Prints the name of the vendor.

Delivery Sales Order Label

This prints a label for complete transactions, which include item numbers for quantity-based items, and serial numbers for serialized items. You can print duplicates for any of these items.

LabelShop PRO 6 Bar Code Items	Description
SONUMBER	Prints the sales order number and bar code.
XX	A counter from 1 to YY, such as "label 2 of 4."
YY	Total boxes of labels requested.
DELIVERYNBR	Prints the deliver number.
COMPANY NAME ADDRESS 1 ADDRESS 2 ADDRESS 3	Prints the company name and address.
CUSTOMERNBR	Prints the customer bar code.
CUSTOMERNAME CUSTOMERADDR1 CUSTOMERADDR2 CUSTOMERADDR3	Prints the customer name and address.

Goods Receipts Label Contents

This transaction allows the printing of labels, one for each transacted item. That is, for each quantity based item, one label is printed per item number. For each serialized item, one label prints per serial number. You can print duplicates for any of these items.

LabelShop PRO 6 Bar Code Items	Description
ITEMNBR	Prints the item number and bar code.
ITEMDESC	Prints the first 50 characters of the item description.
QUANTITY	Prints received quantity for quantity-based items and quantities of one for serialized items.
SERIAL_BATCH_NBR	Prints the serial number and bar code for serialized items (managed by serial number).
SERIAL_BATCH_LBL	Prints the serial number and bar code for serial items on the label.
COMPANY NAME ADDRESS 1 ADDRESS 2 ADDRESS 3	Prints the company name and address.
WHSCODE	Prints the warehouse code.
WHSNAME	Prints the name of the warehouse.

Using LabelShop PRO

In this example, the Purchase Orders label format file (POP.Lab) is opened and is modified to include a new **Vendor Name** field.

1 From the desktop, select **Start** > **Programs** > **Intermec LabelShop PRO 6** > **LabelShop Pro 6** to access the application.

2 Right-click **Form** in the left column, then select **Add**.
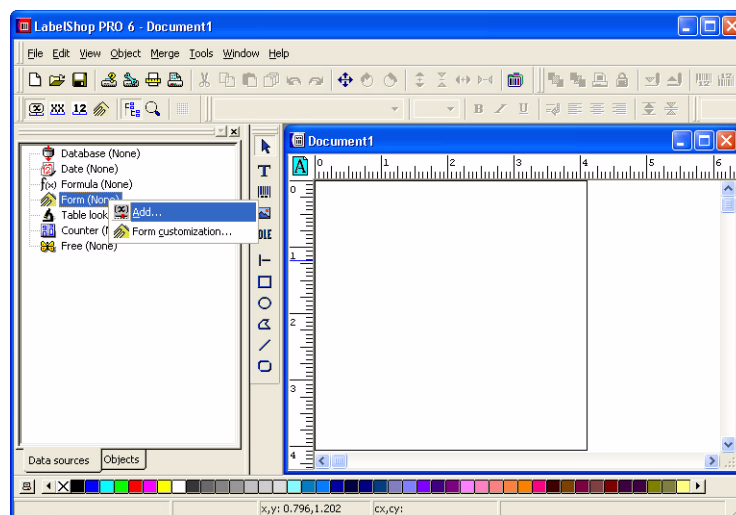
A field is automatically added with an assigned name.
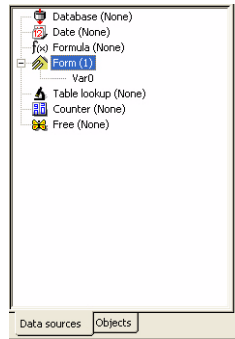
3 To place the field on the label, select to highlight the new field, click the **Barcode** icon in the center *(shown to the left)*, click anywhere on the label format screen on the right, then enter the required information.
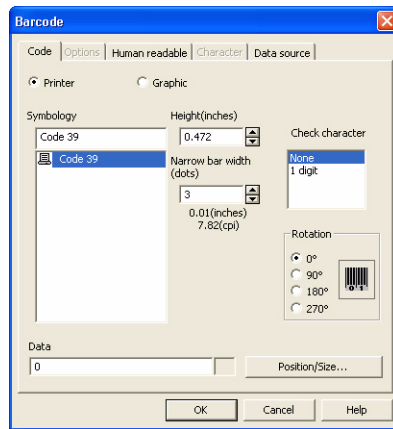
4 To specify that the bar code should print the assigned value, click the **Data source** tab, click **Variable data** for the type, click **(+)** to expand **Form**, then select the correct field name.
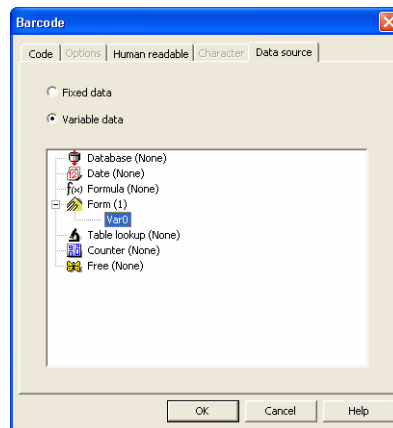
When information is specified, the new field is placed on the label format, which you can then modify as desired. See the LabelShop PRO online help.

Using the Remote Terminal Emulator

The Remote Terminal Emulator is a PC-based terminal emulation program that simulates the TE 2000 terminal emulation application running on CK30s.

To access the Remote Terminal Emulator, select **Remote Terminal** from the EasyADC Data Collection Manager menu bar. Note that the keyboard controls are the same as on the CK30. Use your arrow keys to navigate and the **Enter** key to enter data.

Using the System Manager

This manages CK30 processes, licenses, and item cross-references.

Client Processes

The **System Manager** menu bar option in the EasyADC Data Collection Manager lets you view CK30 information in a Client Processes window, which starts up immediately when the EasyADC Data Collection Manager is launched.
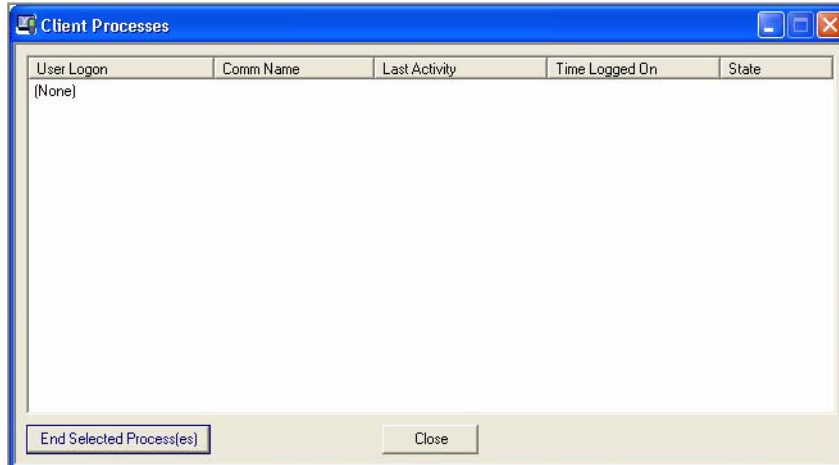
Should the Microsoft Telnet application not release its attachment to your CK30s (showing all sessions already in use), and another person is not able to access the Telnet application, click **End Selected Process(es)** to access the End Process window.
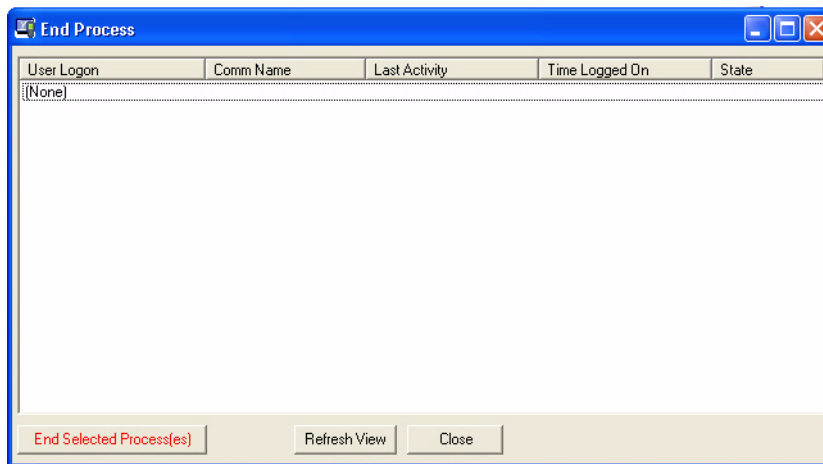
Select to highlight the processes, then click **End Selected Process(es)** to break their Telnet sessions and free up sessions for others to use. Click **Refresh View** to see what processes remain, and click **Close** to return to the Client Processes window.

To set preferences for the Systems Manager, from the EasyADC Data Collection Manager main screen, select **File** > **Configuration Options** > **System Manager Options**, then set preferences, as needed. For help, see below.
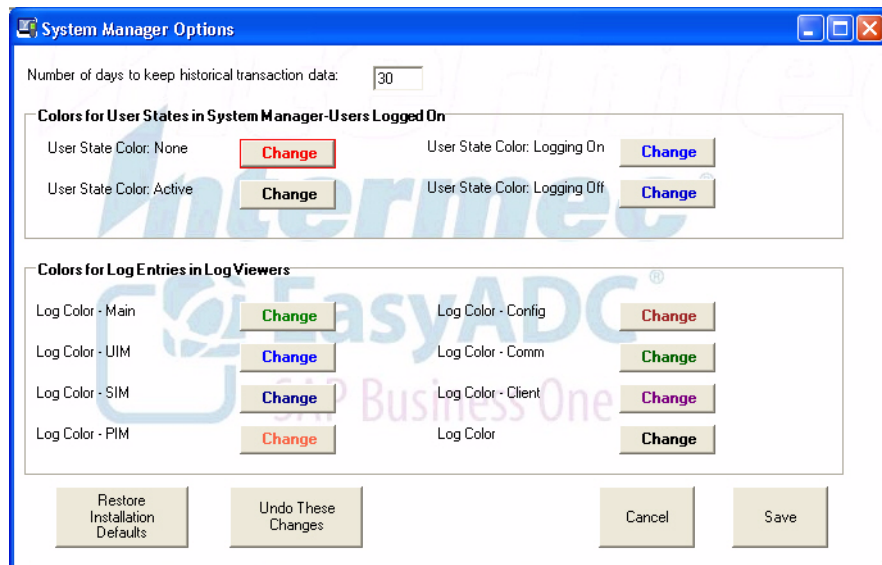
|	
User State Color: None	Click **Change** to the right to adjust the appearance of a user when disconnected.
User State Color: Active	Click **Change** to the right to adjust the appearance of a user when active.
User State Color: Logging On	Click **Change** to the right to adjust the appearance of a user when logging on.
User State Color: Logging Off	Click **Change** to the right to adjust the appearance of a user when logging off.
Log Color - Main	Click **Change** to the right to adjust the appearance of the main log entries.
Log Color - UIM	Click **Change** to the right to adjust the appearance of the UIM log entries.
Log Color - SIM	Click **Change** to the right to adjust the appearance of the SIM log entries.
Log Color - PIM	Click **Change** to the right to adjust the appearance of the PIM log entries.
Log Color - Config	Click **Change** to the right to adjust the appearance of configuration log entries.
Log Color - Comm	Click **Change** to the right to adjust the appearance of communication log entries.
Log Color - Client	Click **Change** to the right to adjust the appearance of client log entries.
Log Color	Click **Change** to the right to adjust the appearance of miscellaneous log entries.
Restore Installation Defaults	Click this to return user state and log entry colors back to their original colors.
Undo These Changes	Click this to erase what changes were made before the last save.
Cancel	Click this to exit the System Manager Options without saving any changes made.
Save	Click this to update the System Manager settings with the changes made. and exit the System Manager Options.

License Information

Licensing determines the number of CK30s running the client applications allowed to connect to the SAP Business One application through the Easy-ADC Data Collection Manager. Two Product Authorization Keys (PAKs) are automatically configured with the product.

You can call the Intermec Customer Service at 1-800-755-5505 to purchase additional licenses, which are delivered on printed certificates. The system makes use of Intermec's PAKs to provide you with 25-character keys for your application.

To view current license information load additional licenses from PAK data, select **System Manager** > **License Information**. The total licenses owned including the two supplied with the system, and the current number of available logons (the number of additional CK30s that could connect at that point in time are shown. This screen is updated if additional licenses are entered.

Click **Close** to exit this information.
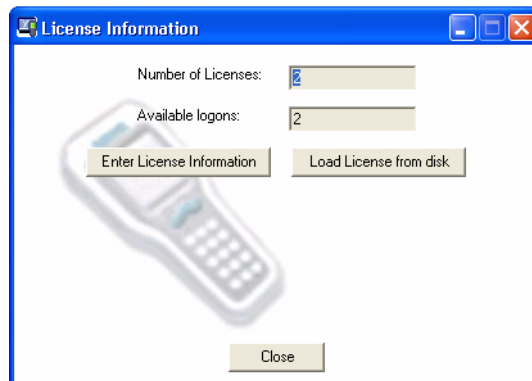
Enter License Information
To enter your 25-key character PAK license, click **Enter License Information**, key in the characters, then click **Submit License Number**.
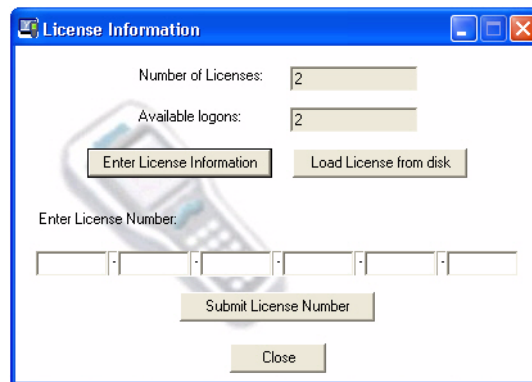
Load License from disk

To load your license from a disk, insert the disk in your EasyADC PC, then click **Load License from disk**. If your additional licenses are not installed automatically, browse to the location of your license file (licpak.txt), then double-click the file to install its information.
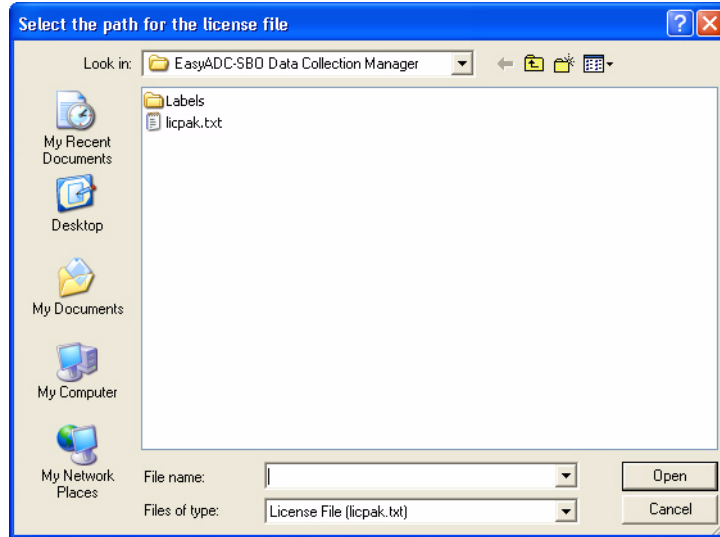
Item Cross-Reference

Use this to pair alternate item numbers with item numbers found in SAP. *Note that the information here does not update the SAP database.* Each row in the table contains an SAP item number which must be a valid, inventoried SAP item, an alternate item number that is unique in the database, and an "unusable" flag that indicates a validation problem with the entry.

Unusable entries are retained and ignored when validating item numbers for remote terminal transactions. This table is validated each time the Data Collection Manager is started and when you click **Validate Items**.
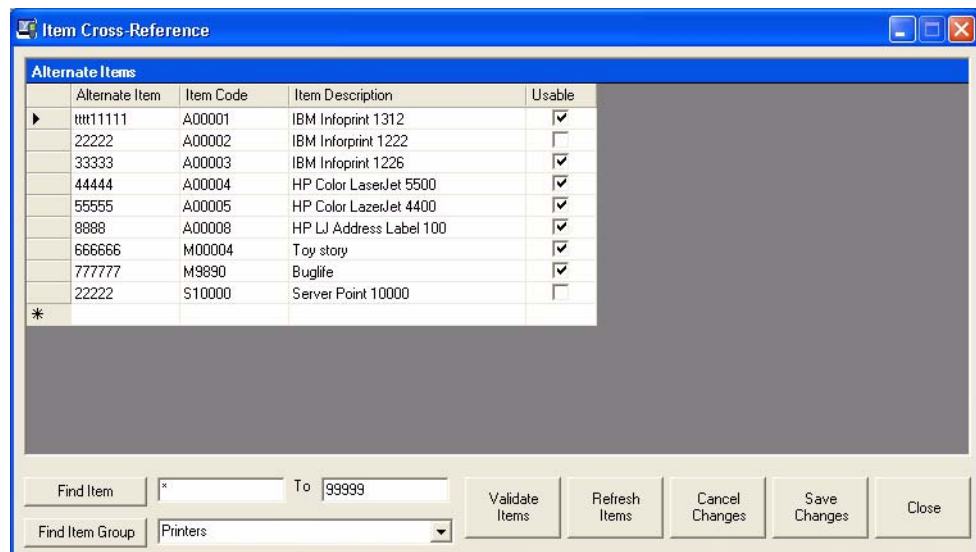
You can do new entries - first identify one or more SAP numbers in the **Item Code** column, then assign respective alternate item numbers in the **Alternate Items** column. You can enter a specific **Item Code**, query for a range of SAP item numbers using **Find Item**, or query an item group from within SAP using **Find Item Group** - then enter their respective alternate item numbers. When data is saved, entries without alternate item numbers are automatically purged.

Alternate Item	Enter an alternate item number for the SAP item in this row.
Item Code	The SAP item number assigned to the item in this row.
Item Description	Description of the SAP item.
Usable	This is checked by the system after a validation to indicate that neither alternate item number nor the SAP item number is duplicated and the SAP item number is valid.
Find Item	Enter the range of SAP item numbers to locate within the SAP database. If you do not know what to enter, you can use an asterisk as a wildcard.
Find Item Group	Select a group from the drop-down list to locate within the SAP database.
Validate Items	Click this to verify whether assigned alternate item numbers are unique. If there are any duplicates, or if an SAP item number is invalid, the **Usable** check box is cleared.
Refresh Items	Click this to renew the list after you make manual changes, or to include any new data received while the Item Cross-Reference window is open. *Note that this removes any items not assigned alternate item numbers.*
Cancel Changes	Click this, then **Yes** to undo any alternate item entries you had entered, but not saved to the list.
Save Changes	Click this to save any changes made to the list.
Close	Click this to exit the Item Cross-Reference window.

Viewing Log and Error Log Information

Two logs are provided to assist in diagnosing problems. A technical support person may request information from these logs. Both logs are cleared after reaching specified sizes to conserve space.

The Log is also used primarily for troubleshooting. Its text file is called EasyADC-SBO.log and is located in the "C:\Program Files\Intermec\Easy-ADC-SBO Data Collection Manager\Log" folder. To view this log, start the EasyADC Data Collection Manager, then select **Log** > **Log View**.
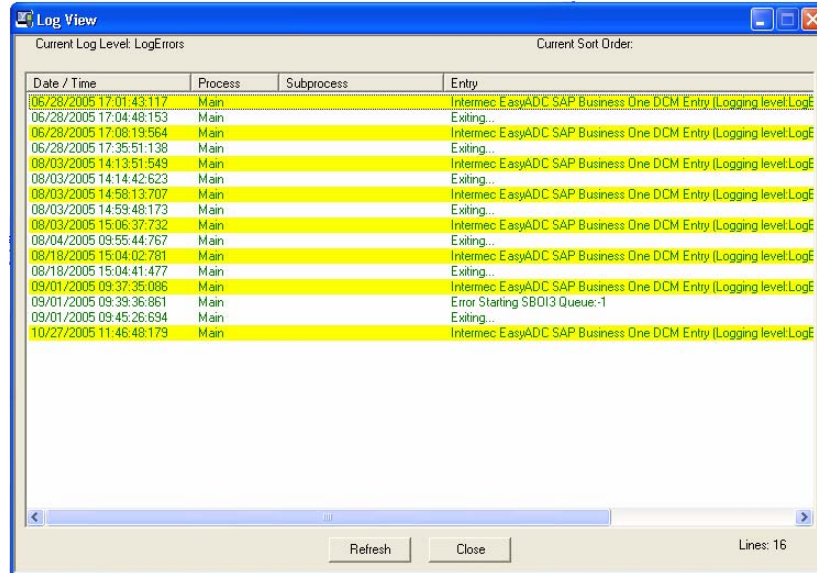
The error log text file is called EasyADC-SBOError.log and is located in the "C:\Program Files\Intermec\EasyADC-SBO Data Collection Management\Log" folder. To view this log, select **Log** > **Error Log View**.
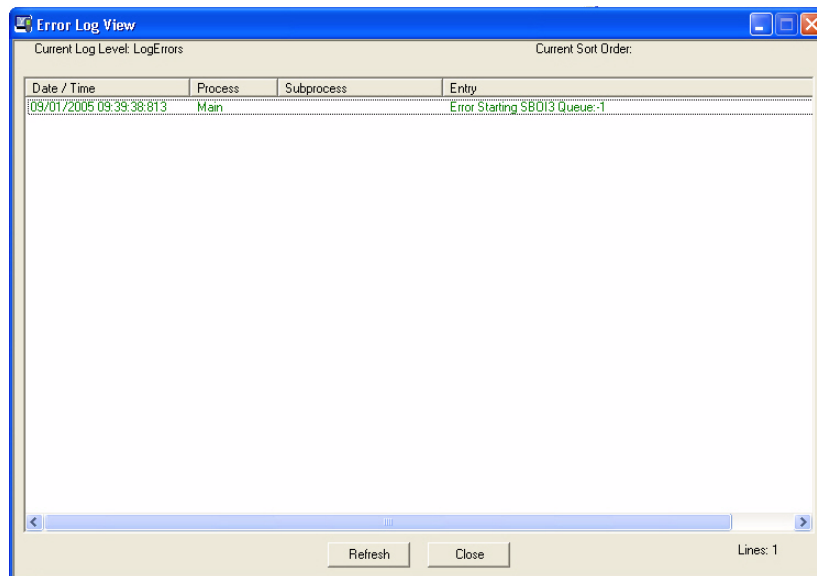
To configure your log files, such as set default sizes, select **File** > **Configuration Options** > **Log Options**, then set preferences as needed. For help, see the following table.
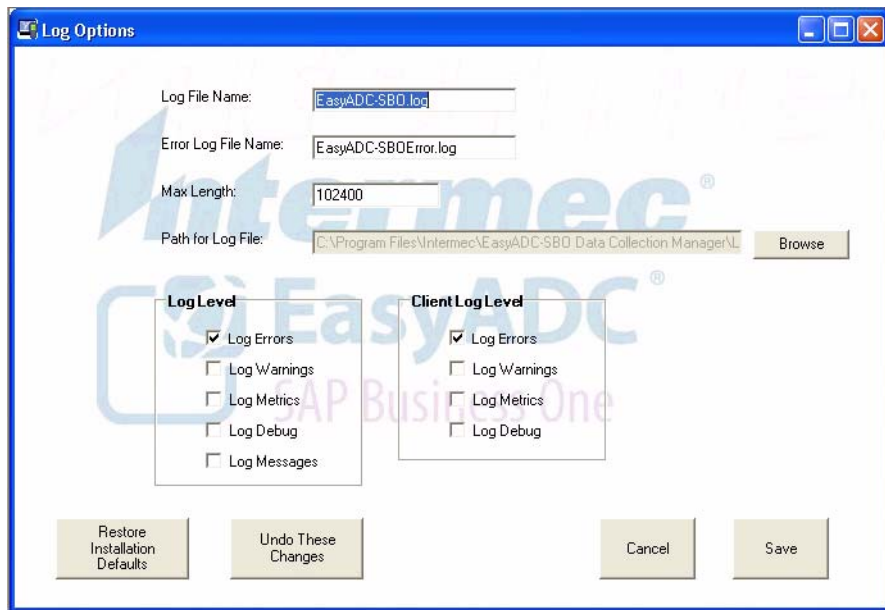
Log File Name	Provides the default file name for the log file. You can change this file name, but be sure to keep the .log extension.
Error Log File Name	Provides the default file name for the error log file. You can change this file name, but be sure to keep the .log extension.
Max Length	Provides the size of the log files at which the system clears the log files. The default size is 102400. You can enter the size that best works for your network.
Path for Log File	Provides the default location where the log files are stored. Click **Browse** to change the location of this storage.
Log Level check boxes	Check the types of messages to store in the log file.
Client Log Level check boxes	Check whether to store errors, warnings, metrics, or debug messages in the log file.
Restore Installation Defaults	Click this to return all of the Lot Options information to their defaults. You will be prompted to verify this restoration.
Undo These Changes	Click this to clear any changes you made since you last clicked the **Save** button.
Cancel	Click this to clear any changes you made since you last clicked the **Save** button, then exit to return to the EasyADC Data Collection Manager.
Save	Click this to save all of your changes, then exit to return to the EasyADC Data Collection Manager.

Running the Benchmark Reports

Eight reports are installed with the EasyADC Data Collection Manager and summarize timely business transactions. By default, daily reports start at 6 a.m. and include 12 60-minute reporting periods, weekly reports also start at 6 a.m. and include 7 24-hour calendar days. Information from these reports are saved and retained for 30 days. You can customize and add additional reports as needed for your network.

Configure

Select **Report** > **Configure** to review, change, delete, and add to the reports shown. Click **Close** to exit.

Preview Report

To get a sneak peek of what how a report is to appear, select the report in question from the **Report Name** drop-down list, then click **Preview Report**, which opens to today's date.

If you want to switch to another date, click the drop-down arrow for a calendar, make your selection, then click **Close**.
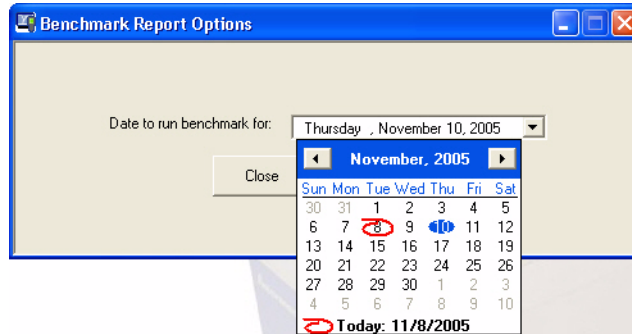
Click **Run Report** to see the preview, click **Close** to exit. For more details on the report, check **Expanded Report**. Go to page 66 for a sample screen.

Add New

You can customize your own reports to add to the list of benchmark reports. Select the features for this report, then click **Save** to add this report to the benchmark. *Note the information provided here also applies to the **Copy Report** and **Edit Report** options. Minutes are in 15-minute increments.*
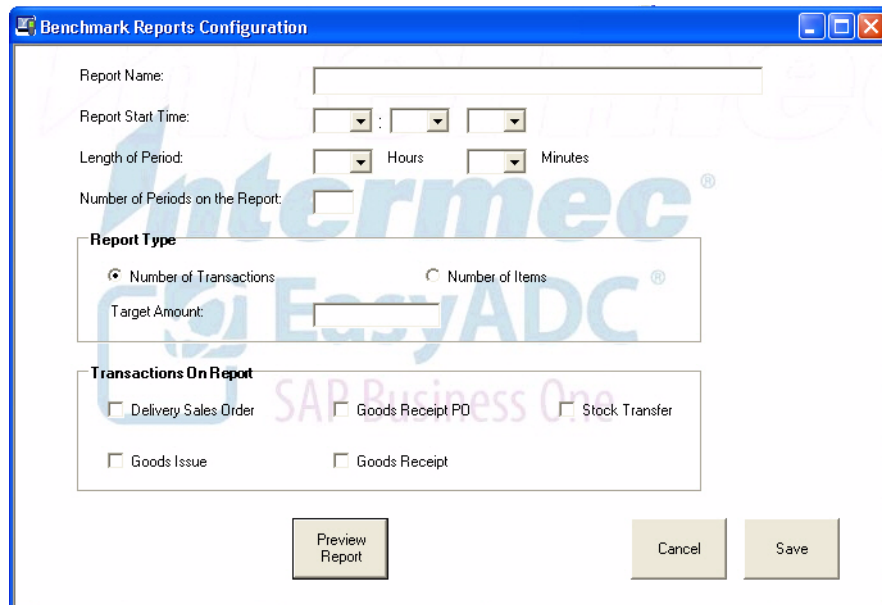
Report Name	Enter a unique name that accurately describes this report.
Report Start Time	Use the three drop-down arrows to set the start time when data is collected for the report.
Length of Period	Use the **Hours** and **Minutes** drop-down arrows to set the length of time per period.
Number of Periods . . .	Enter the number of periods to show on this report.
Report Type	Select either **Number of Transactions** or **Number of Items**, then enter the target amount.
Transactions On Report	Check the items to appear on the report.

Copy Report

You can take an existing benchmark report with its features intact and assign a new name. Select the report to copy from the **Report Name** drop-down list, then click **Copy Report**. Assign the new unique name, make any adjustments needed for the new report, then click **Save** to add the new report to the benchmark. *See the table under **Add New** for information.*

Edit Report

Click this to edit the report you select from the **Report Name** drop-down list. *Note the report name is grayed-out, you cannot change the name for this report. See the table under **Add New** for information.*

Delete

To delete a report from the benchmark, select the report from the **Report Name** drop-down list, then click **Delete**. Click **Yes** at the prompt to verify the deletion.
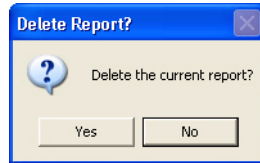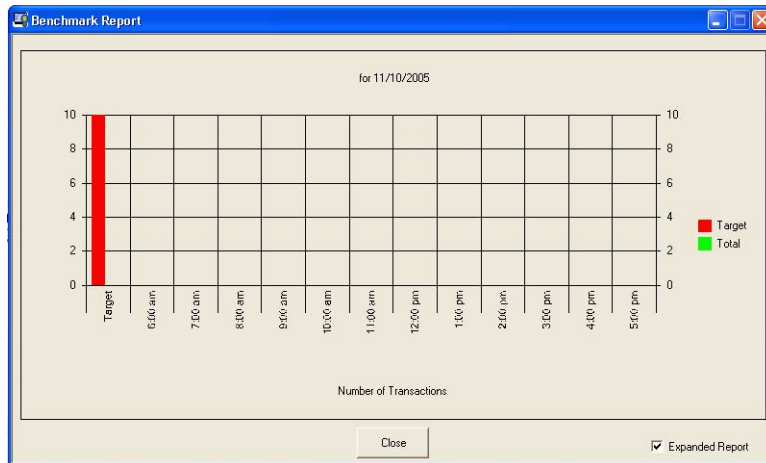

Run Benchmark

To view an existing report, select **Report** > **Run Benchmark**, select an option, select a date, then click **Run Report**.
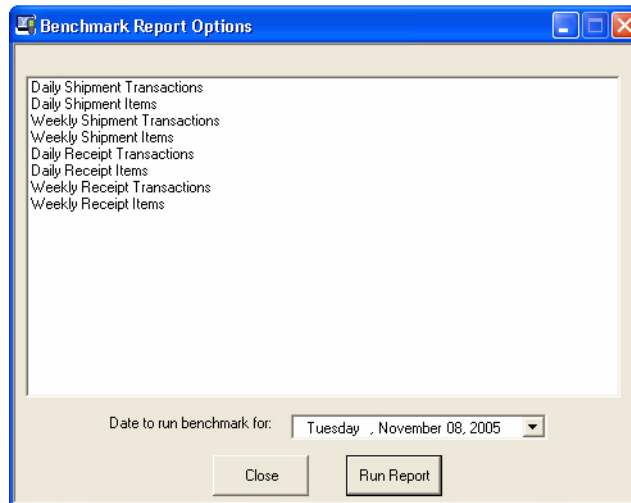
Note the report's target value is shown as the first bar in the chart. The height of the chart is cumulative, with the bar to the right including all data to its left, plus data for its time period.
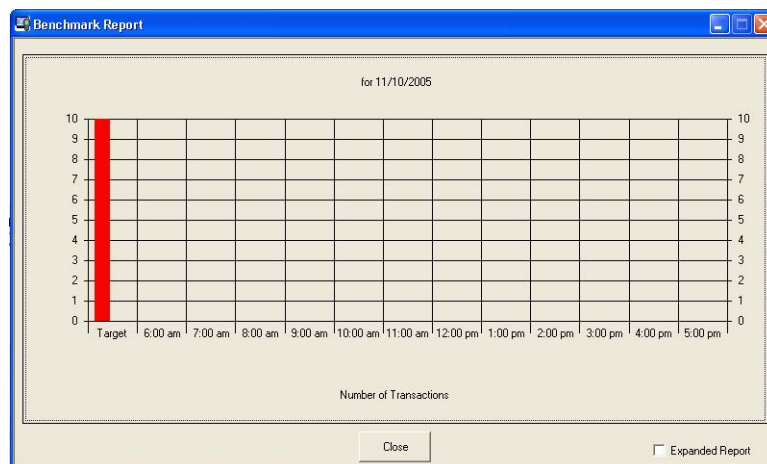
You can check **Expanded Data** to show additional details for this report.

Export Data

Use this to send data saved from these benchmark reports to a location you designate on your EasyADC PC. Select **Report** > **Export Data**, select the path, enter the file name, then click **Save** to assign the export text file.
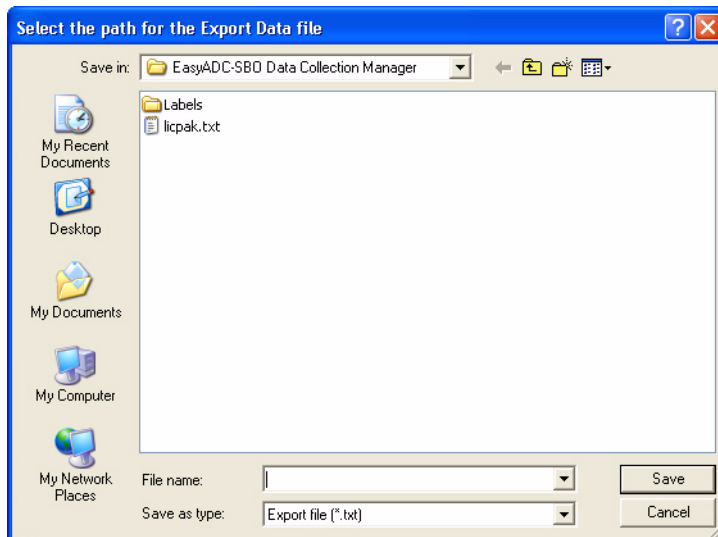

Doing the Warehouse Inventory

The EasyADC Data Collection Manager collects inventory counts by item, warehouse, and counting zone (as set on your CK30s). You can establish one or more "counting zones" for known warehouses to manage the counting process. At least one zone must exist at all times. You may not remove these zones while counting is enabled, but you can add and rename these zones at any time. The SAP database is queried for recognized warehouses each time the function is entered.

Warehouse Maintenance

To access and add to the list of warehouse zones, select **Inventory** > **Warehouse Maintenance**.
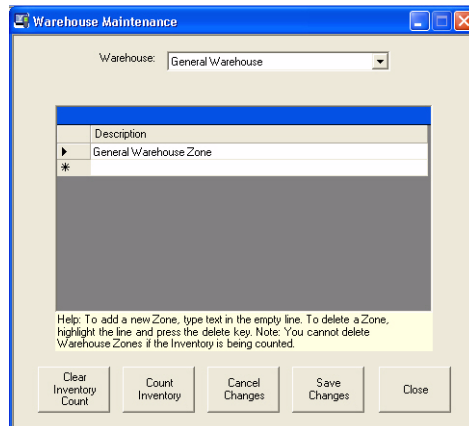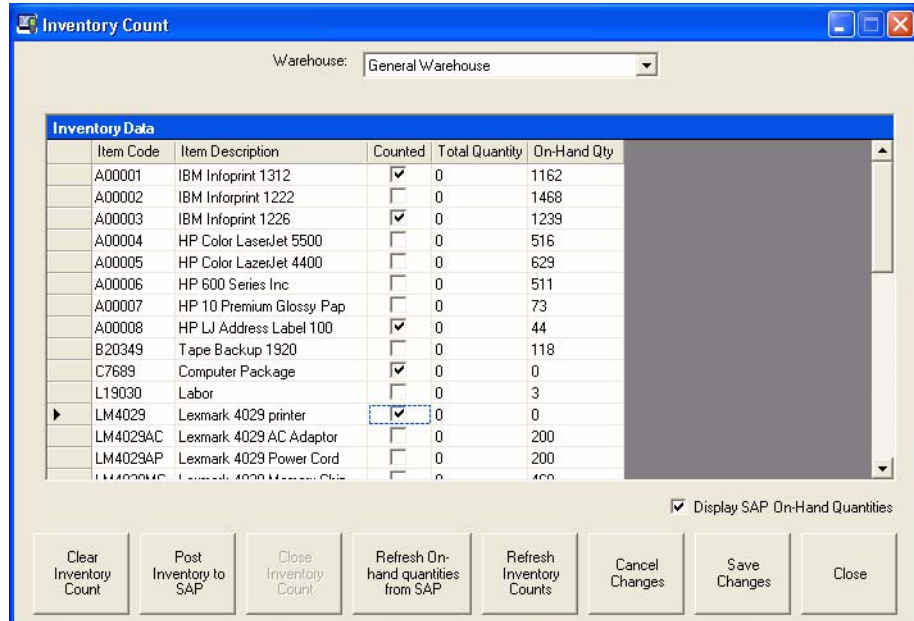

Data stays in the database until counting is closed and posted to the SAP database. This information remains until you click **Clear Inventory Count** or **Count Inventory**. Zones not counted are posted automatically and duplicates are reserved for manual resolution.

Warehouse	Select from the drop-down list the zone to which to perform an inventory count.
Description	Includes zones selected from the warehouse drop-down and any zones you enter manually.
Clear Inventory Count	Click this, then click **Yes** to erase its inventory count from the database.
Count Inventory	Click this, then click **Yes** to perform an inventory count.
Cancel Changes	Click this, then click **Yes** to undo any manual entries you made to the zone list.
Save Changes	Click this, then click **Yes** to save any manual changes you made to the list.

Inventory Count

The information presented here is time-sensitive. For each item posted to SAP, it is placed in the Stock Posting under Inventory Transactions. Go into SAP to accept the transaction or reconcile any differences for the inventory amounts to take affect.

Counted	This is checked when one or more values are returned from the CK30 transaction, including a counted zero.
Display SAP On-Hand Quantities	Check this to include the quantities available onhand in the SAP database, which are shown in the **On-Hand Qty** column.
Clear Inventory Count	Click this, then click **Yes** to erase its inventory count from the database.
Post Inventory to SAP	Sends information checked in the **Counted** column to the SAP database, then click whether to clear that counted value from the inventory count. If changes were made, but not saved, then click **Yes** at the prompt to save the changes before posting the information.
Close Inventory Count	When enabled, you can click this, then click **Yes** to end an inventory count.
Refresh On-hand quantities from SAP	Click this to update the **On-Hand Qty** column.
Refresh Inventory Counts	Click this to display current counted values after receiving new counts or making manual changes without saving them.
Cancel Changes	Click this, then click **Yes** to undo any manual entries you made to the inventory count.
Save Changes	Click this to save any manual changes you made to the inventory count.

Go to "Count Inventory" on page 46 to validate this information from your CK30s.

# 5 Using the SmartSystems™ Console

You will find these sections in this chapter:

- Starting the SmartSystems Console (page 72)
- Monitoring Devices (page 72)
- Viewing the Troubleshooting Tips (page 73)
- Enabling Email Notification (page 73)
- Configuring the Network Security Level (page 74)
- Adding New Devices (page 74)
- Resetting an Access Point to its Factory Defaults (page 74)
- Updating System Software (page 75)
- Updating the Discovered Devices Folder (page 75)

Starting the SmartSystems Console

The SmartSystems Console allows you to monitor and manage all the hardware devices in the EasyADC. The Console runs on your dedicated Easy-ADC PC and lets you perform management tasks. From the Windows desktop, select **Start** > **Programs** > **Intermec** > **SmartSystem** > **Console**.

The Console icon appears in the Windows system tray (lower-right corner of the desktop). When the devices in EasyADC are operating normally, the Console icon appears as shown.
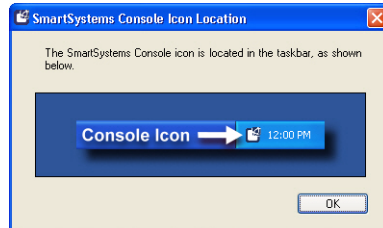
If there is a problem or status change with any device in the system, the Console icon assumes another symbol. See "Images Appear With Console Icon" on page 78 for help.

Monitoring Devices

To monitor hardware devices in EasyADC, you must display the SmartSystems Console screen. There are two ways to display this screen, either double-click the Console icon, or right-click the Console icon, then select **Explore** from the menu, which opens the Console to the "SmartSystems/Discovered Devices" folder. Click each device to display information. If you see a troubleshooting message, see the online tips to handle each issue.
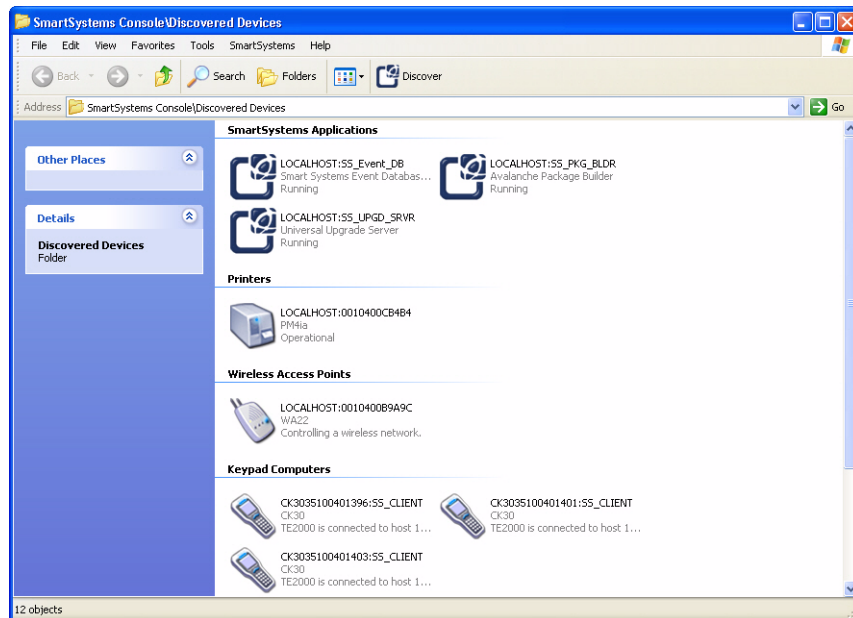
Viewing the Troubleshooting Tips

Comprehensive troubleshooting tips are available online via the SmartSystems Console. To view the tips, right-click an icon for its pop-up menu, then select **Diagnostics**.

Enabling Email Notification

With the Console, you can configure EasyADC to send email when any device status changes. You can receive email every time a CK30 roams out of range, or every time the PM4i runs out of media. To further customize email notification, see the online help. To enable email notification:

1   Right-click the **SmartSystems Console** icon in the Windows system tray.

2   Select **Configure** > **SmartSystems Console** for the SmartSystems Console Configuration screen. Enter the **SMTP Server** and **Return Address** information, then check **Enable Email Notification** at the bottom of the screen.
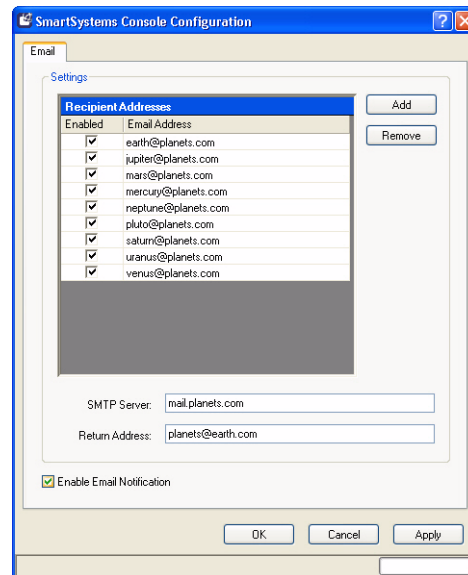
3   Click **Add** for the Add an Email Address dialog box, type an email address, then click **OK**. The email address appears in the list and is checked **Enabled**.
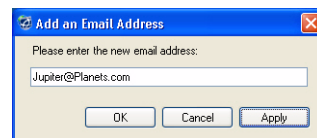
4   Continue adding email addresses, as needed. When finished, click **OK** to close the SmartSystems Console Configuration screen.

Configuring the Network Security Level

The Console lets you configures network security for EasyADC.

To configure the network security level

1   Right-click the WA22 access point icon for a pop-up menu, then select **Security** to access the Security Level.

2   Move the indicator to **Min** or **Max**, pending on your network security needs, then click **OK**:

  • **Min** indicates the network is secure, but that devices may be added.

  • **Max** indicates that the network is so secure that no new devices may be added. Do not choose **Max** until you have finished installing devices in your system.

Adding New Devices

You can add CK30s or WA22s from a dedicated EasyADC PC.

To add a new device

1   Select **SmartSystems** > **Add Device**(s) from the SmartSystems Console.

2   Follow the prompts as the Intermec EasyADC Configuration Wizard walks you through the process.

3   If you are adding a CK30, the Console automatically sets the Network Security Level to **Min** to allow the device to add to the system. See the previous page for instructions on resetting the Network Security Level to **Max**.

Resetting an Access Point to its Factory Defaults

The Console lets you reset an access point to its factory defaults from your dedicated EasyADC PC. To reset the access point to factory defaults, select **SmartSystems** > **Restore Defaults** from the toolbar, then follow the prompts as the Intermec EasyADC Configuration Wizard walks you through the process.

Updating System Software

You can use the WA22 to synchronize the dispersal of new system software and configuration files for the CK30, WA22, and PM4i devices in EasyADC.

When you copy new system software and configuration files to the EasyADC software library, "C:\Program Files\Intermec\EasyADC Configuration Wizard\IONLibrary," any update files are synchronized with the WA22. The next time the target device talks to the server in the WA22, it receives the updates:

- The CK30 can receive TE 2000 configuration updates (via an updated CONFIG.DAT file) or general CK30 configuration updates.

- The WA22 can receive firmware updates.

- The PM4i can receive firmware and configuration updates.

To update the system software in a CK30, WA22, or PM4i, download the latest system software from the Intermec web site (see your Intermec representative for information), then use the drag-and-drop method as described in the SmartSystems Online Manual.

Updating the Discovered Devices Folder

By default, the SmartSystems Console queries the status of every device shown in the **Discovered Devices** folder every fifteen minutes. You can select **SmartSystems** > **Add Devices** to scan for additional devices, or right-click any where in the folder for a pop-up menu, then select **Refresh** to get the latest status.

6 Troubleshooting

You will find these sections in this chapter:

Images Appear With Console Icon

If any device in EasyADC develops a problem that requires attention, a red stop sign or a yellow triangle with an exclamation point appears on the Console icon displayed in the Windows system tray.

EasyADC Console Status

Icon	Description
	The Console icon indicates that all devices in SmartSystems are configured and operating normally.
	(Warning) The red stop sign indicates that at least one device that was communicating with the Console is no longer communicating. Go to the **Discovered Devices** folder to determine which device needs attention. For help, see "Monitoring Devices" on page 72.
	(Caution) The yellow triangle with the exclamation point indicates that at least one device is not operating and requires attention. Go to the **Discovered Devices** folder to determine which device needs attention. For help, see "Monitoring Devices" on page 72.

Logging In

If you cannot login to the Data Collection Manager or the SAP Business One application, perform each of the following procedures until you discover the cause:

1   Make sure your username and password are valid in the SAP Business One application and that you are set up correctly as a "Superuser." Also, verify that you have a valid SDK Tools license from SAP Business One.

2   Verify your database configuration. From the Data Collection Manager, select **File** > **Configuration Options** >**SAP Database Options**, then verify the database server name, user name, password, and company name.

3   Verify whether the SAP Business One SDK is installed on the designated EasyADC computer. If not, contact your SAP Business One partner of choice for information on loading this SDK.

4   If the "No licenses available for logon" message appears, then you have gone over the number of licenses permitted for your Data Collection Manager. Select **System Manager** > **License Information** to see the total number of licenses and the number available to use. If you need additional Product Authorization Keys (PAKs) or licenses, contact your Intermec representative for more information.

PM4i Printer Connection Error

If the test label does not print on the PM4i Printer and the red error light stays on, there is a problem connecting the printer. Do the following to correct the connection:

1 Double-click the **SmartSystems Console** icon in the system tray.

2 Right-click the printer icon and select **Delete.**
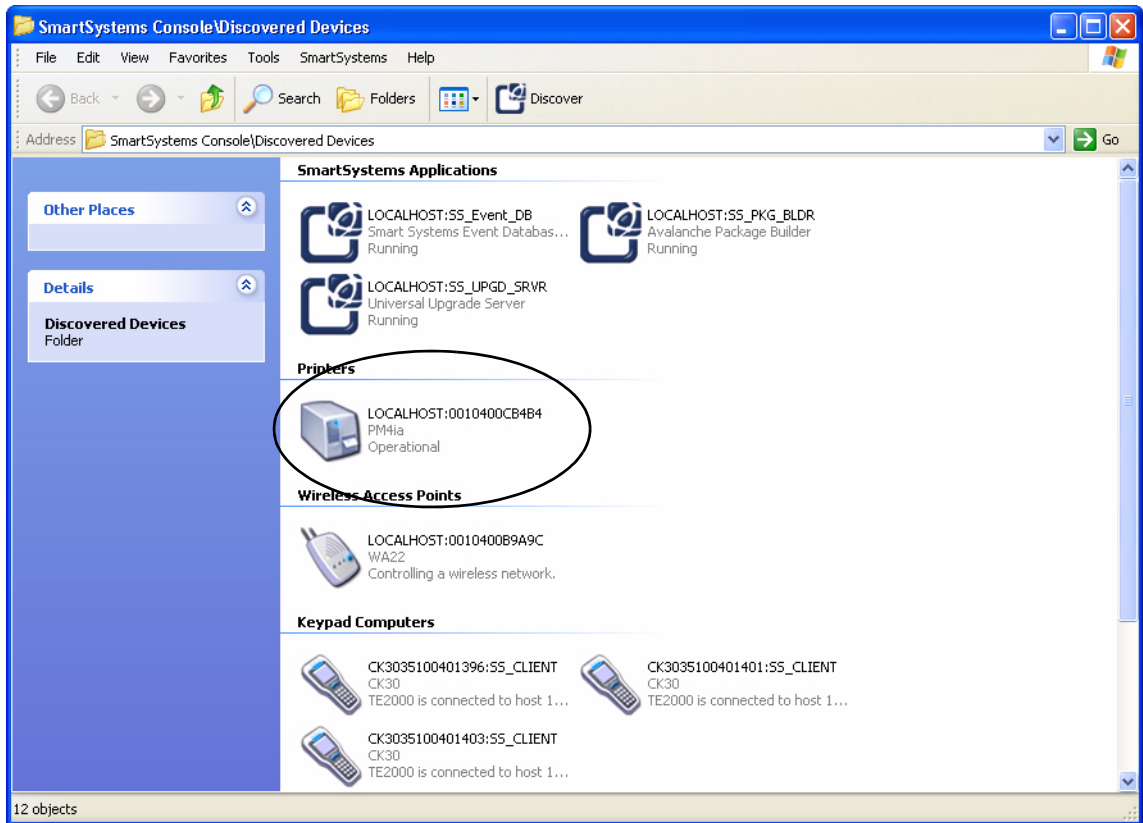
3 Right-click the **SmartSystems Console** icon in the system tray, then select **Explore**.

4 The Console looks for the printer and connects it to the network. The PM4i pulls the excess ribbon back in and prints a test label. The red error light turns off and the blue light stays on, indicating the PM4i is configured and added to the network.

5 Right-click the **Discovered Devices** screen and select **Refresh** for the printer icon to appear.

Posting Transactions

When an error occurs posting a transaction, it may be because the Foreign Currency Exchange Rate within SAP Business One was not defined.

Errors occur when you attempt to post a Delivery Sales Order (SO) transaction where the SO was created for a customer that is of the BP "Lead" type instead of the "Customer" type.

Errors occur when you attempt to post a Goods Receipt Purchase Order (PO) when the price was not provided in the PO. This could happen for a item that was not purchased before and the price list to use was set to "Last Purchase Price."

Errors occur when you post transactions that contain serialized items or when items added to the Delivery and Goods Receipt PO were not on the base document (SO or PO).

Try entering the same information and post the transaction within the SAP Business One application to determine whether any errors are reported. If these errors still occur, then contact your Intermec representative or your SAP Business One partner for more information.

Printing Labels

If your PM4i is not printing any labels, check the following until you determine the cause:

1 Verify whether the PM4i is discovered and is available on the network. Its Ready-To-Work™ indicator (blue light) should be steady.

2 Within the Data Collection Manager log file, if the log level is set to "Log Debug," you should see an entry indicating the Printer Interface Manager (PIM) was started successfully. If not, verify the paths to the label files. From the Data Collection Manager, select **File** > **Configuration Options** > **Label Templates**. Verify the pathnames of each of the three label files. Make sure these files exist at these locations, otherwise update the path settings to the appropriate location.

3 From the Data Collection Manager, select **File** > **Configuration Options** > **Label Printer Options**. Verify at least one printer is selected. If not, then add a label printer.
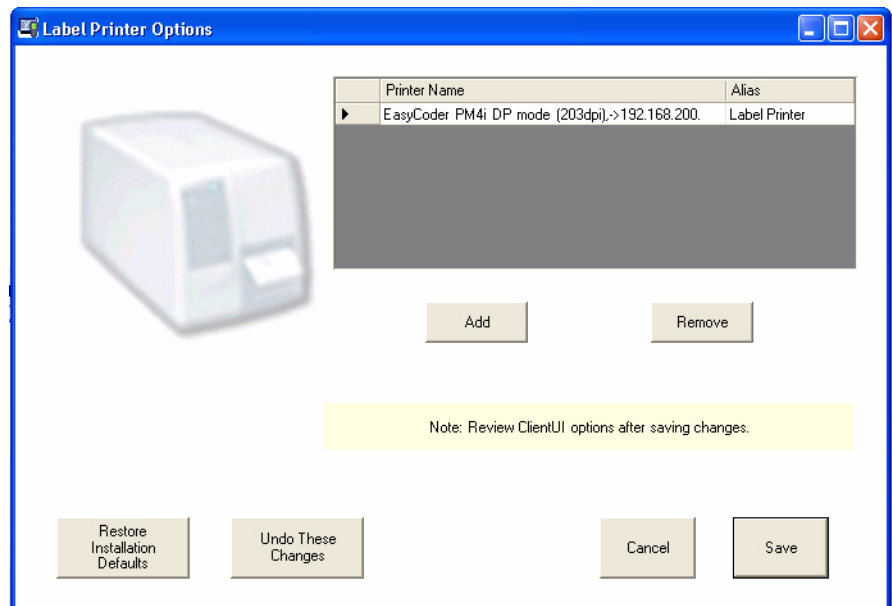
4 Verify whether the printer is added to the LabelShop PRO application. From your PC desktop, select **Start** > **Programs** > **Intermec LabelShop PRO 6** > **LabelShop PRO 6**. From the application, select **File** > **Select printer**.

You should see an entry similar to the following. Verify its IP address and port.
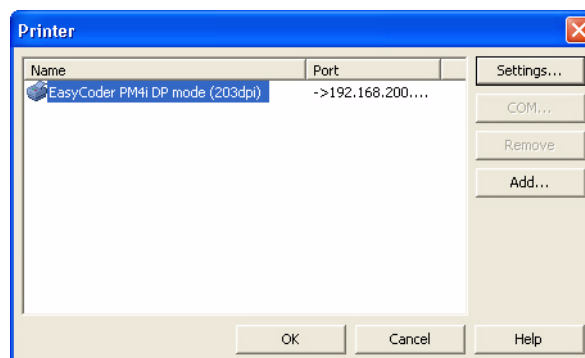
5 If you have multiple printers and the label is not printing or is printing from the wrong printer, select **File** > **Configuration Options** > **ClientUI Options**, then verify that a valid and desired label printer is selected for each label type.
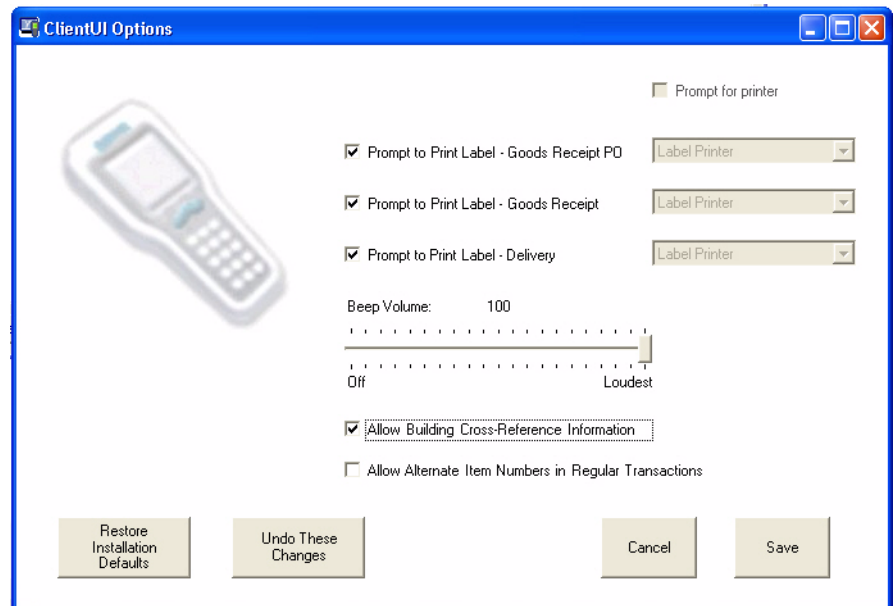
6 If **Prompt for printer** is checked, and you changed any printer name (alias) while logged in the system through a CK30 or the Remote Terminal Emulator, exit the transaction and try the transaction again to refresh the list of printers.

7 Attempt loading one the default label files and printing a test label from within LabelShop PRO.

8 Make sure the PM4i is discovered, configured and added to the LabelShop Pro application as "EasyCoder PM4i DP mode (203 dpi)." Shut down, then restart the EasyADC Data Collection Manager.

9 If some characters are getting replaced on the label, make sure the hardware key or dongle is plugged into your designated EasyADC PC in a USB port.

10 If the company name and address information printed on the label is not correct, then you need to enter the correct information in the EasyADC Data Collection Manager. From the application, select **File** > **Configuration Options** > **Label Templates**, then enter the correct "Company Information for Label" information.

Ready-To-Work™ Indicator on EasyADC Devices

CK30, WA22, and PM4i devices all have a blue light called Intermec Ready-To-Work indicators that may blink or shut off. Should this occur, go to your "SmartSystems\Discovered Devices" folder and view the icons shown there. The following table shows what may be the significance of each icon.

Device and Status	EasyADC Console Icons	Description
CK30 Offline		The CK30 is offline, it is not in communication, and its status is unknown. The CK30 may need your attention.
CK30 Off		TE 2000 application was not loaded successfully.
CK30 Blinking		The CK30 is not connected to the host. For example, the CK30 may have roamed out of range of the EasyADC WA22 access point.
CK30 On		A connection in your application is established and all network connections are active. You can use TE 2000.
WA22 Off		The WA22 is not operational or it was not booted.
WA22 Blinking		The WA22 is searching for the root access point in EasyADC.
WA22 On		The WA22 found a root access point or it became the root access point. The WA22 is ready for use in EasyADC.
PM4i Off		The printer is not ready.
PM4i Blinking		The printer is not ready. For example, the printer may need media. See the display window on the printer for information.
PM4i On		The printer is ready for use in EasyADC.

Resetting the WA22 to Factory Defaults

If your previous attempts to reset the WA22 to its factory defaults have failed, then Intermec recommends that you use the **Mobile**LAN Access Utility.

These instructions are to give you a general idea of how to use the **Mobile**LAN Access Utility. For specific instructions, see the **Mobile**LAN Access Utility online help.

You can download the MobileLAN Access Utility from the Intermec web site. Contact your Intermec representative about this URL.

To use the utility if you know the IP address of the WA22

1 Start the **Mobile**LAN Access Utility, then click **Restore to factory defaults**.

2 Enter the IP address.

3 Power cycle the WA22.

4 Click **Restore**. This could take up to a minute as the WA22 is restored to its defaults.

To use the utility if you do NOT know the IP address of the WA22

1 Look at the WA22 configuration label to learn the Ethernet MAC address of the WA22, then specify the new IP address and the MAC address of the WA22.

2 Power cycle the WA22, then click **Set**.

3 Perform the steps in the previous procedure to restore the WA22 to its factory defaults.

Starting the CK30 Application

The Microsoft Telnet Server with Windows XP only supports ten connections. If the Telnet Sever is reporting ten connections, then when the eleventh connection is attempted, the server fails and the following text flashes on the CK30 screen. When you see this message, try steps 1 and 2 for possible solutions.

```
Parsing autolog script
```

1 If a device cannot connect and the connection limit is not reached, verify whether telnet server connections are set to "tlntadmn -s all."

   Also verify whether the telnet server's maximum connection configuration is set to "tlntadmn" and the maxconn setting value is set to "10."

   To change the maximum connections, issue the "tlntadmn config maxconn=10" command. On Windows XP, 10 is the highest setting supported.

2 If the telnet server reports more connections than what is actually supported, there may be some "orphaned" sessions. This could occur when the device reboots, goes out a range for too long a period, loses its connection, and establishes a new connection. Identify these orphaned processes, then terminate them through the "End Process(es)" procedure in the EasyADC Data Collection Manager (see "Using the System Manager" on page 56 for more information).

   You can also use the telnet server "tlntadmn -s all" utility to remove these orphaned processes. Look for any telnet sessions with duplicate IP addresses, then end the entries with the longest "tlntadmn -k <id>" IdleTime, where <id> is the telnet session ID.

3 If you have problems connecting from the CK30, see "Using the Remote Terminal Emulator" on page 55 to simulate the CK30. If successful, check for firewalls and whether they are stopped or configured correctly.

4 If the emulator is unsuccessful, verify whether the telnet server is enabled and running. If the service is disabled, set the services startup type to "manual" (see "Starting the Telnet Server Automatically" on page 90), then either start the service or start the EasyADC Data Collection Manager, which attempts to start the telnet server. Run the "tlntadmn" command. If the state is not set to "Running," then run the "tlntadmn start" command.

5 If the telnet server is running, verify whether the "TelnetClients" user group was created along with the "SBOClient" local user, and whether the "SBOClient" is a member of the "TelnetClients" group. If not, either run the installation again or add the "TelnetClients" user group manually. The "SBOClient" user password is "SBO_Client_1234" and it is case sensitive.

6 If the device does not automatically attempt to connect (a message similar to "Parsing autolog script" appears), verify whether the

AUTOLOG.SCR file exists on the device in the "\CK_FFS" folder. If not, reset the device back to factory defaults.

7 If it appears that the device establishes a telnet session but does not automatically start the application, verify whether the LOGIN.CMD file exists in the "\Windows\System32" directory. Also check the contents of this file, it should attempt to change the current directory to the installation directory (where the EasyADC Data Collection Manager was installed), then execute the UI.EXE application. If not, either create, modify, or reinstall the UI.EXE file.

# Starting the Telnet Server Automatically

The Telnet server is needed for the EasyADC Data Collection Manager to operate properly. Should your service be disabled, you need to do the following to ensure your service is set to start automatically before running the EasyADC Data Collection Manager.

Shut down your EasyADC Data Collection Manager before doing the following:

1 From your desktop, right-click the **My Computer** icon, then select **Manage** to access the Computer Management dialog.

2 On the left, click (+) to expand **Services and Applications**, then double-click **Services**. Tap the **Standard** tab on the bottom.
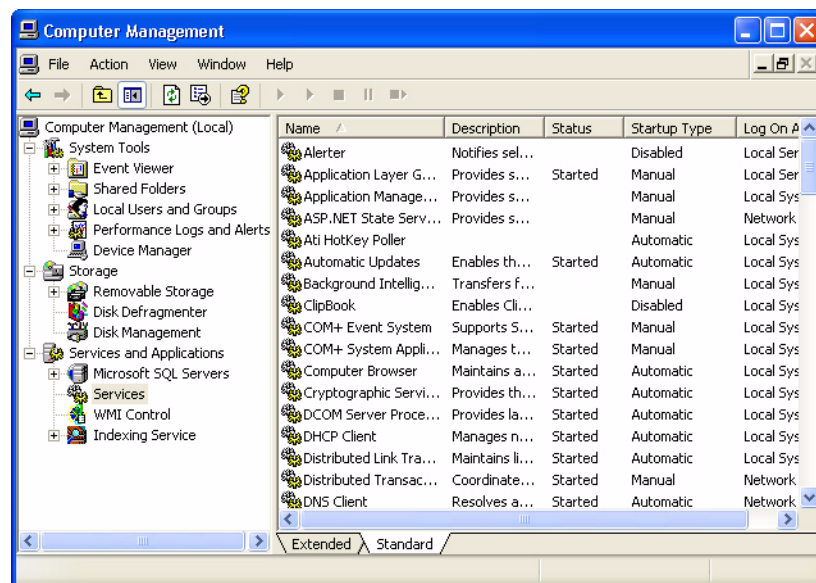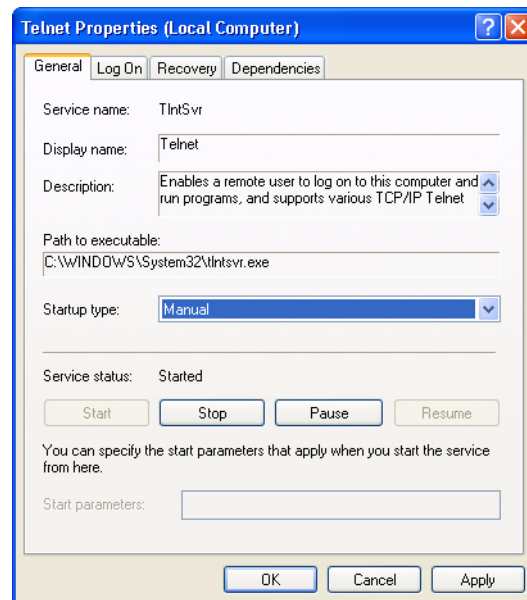
3 Scroll through the list of services for the "Telnet" entry, select to highlight, do a right-click, then select **Properties**.
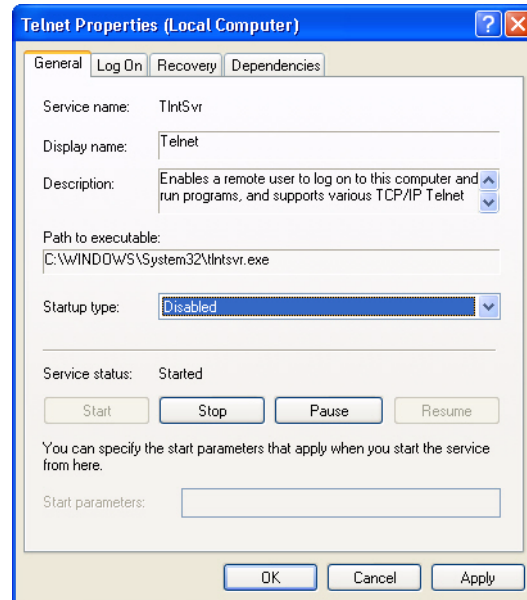
4 If the Startup type drop-down list is set to "Disabled," change the value to "Manual," click **Apply**, then click **OK**.

Other Issues

Below are more troubleshooting tips to assist any issues you may encounter:

DLLs

Two DLLs are installed (SSLEAY32.DLL and LIBEAY32.DLL) for use in SmartSystems and EasyADC. Other programs do install DLLs with similar file names. Intermec compiles additional functions into its DLLs, when other applications use a subset of the functionality Intermec uses. The issue is that some applications install these two DLLs in the "\Windows\System32" directory or other directories that appear in the search path before the Intermec DLLs.
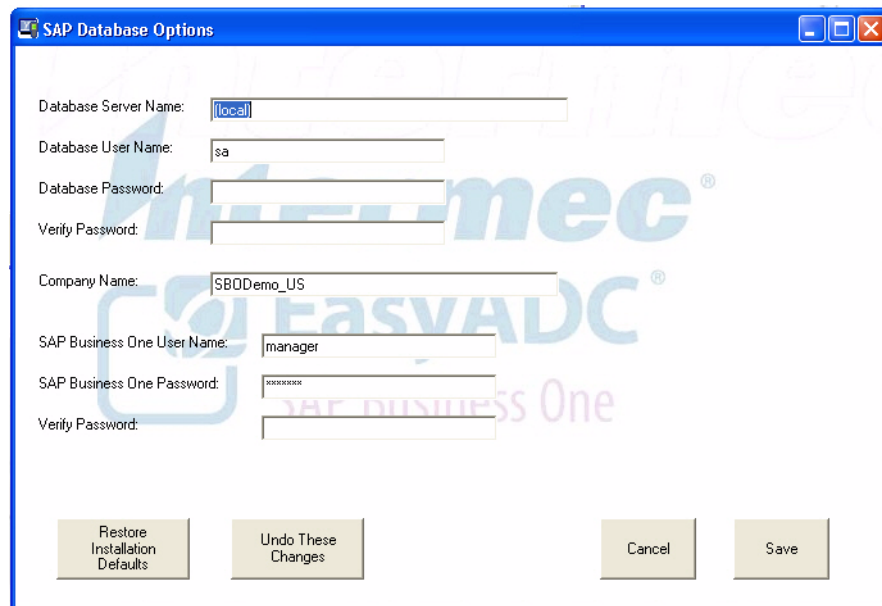
Search for, then rename all but Intermec instances of these two DLLs to something such as SSLEAY32.SAV and LIBEAY32.SAV. Copy the Intermec DLLs to each location with these renamed files, then reboot the designated EasyADC PC.

IQueue Service

If you see "Error: EasyADC/SmartSystems is not properly running! Correct the problem and restart the system," the IQueue service is not running. Restart the Intermec Core Messaging Server service.

Chapter 6 — Troubleshooting

SAP Database Options

If errors are logged or reported within the Inventory Count or Item Cross Reference, and a log entry indicates an error opening the SIM Interface; the Inventory Count option is not available on the CK30 though its warehouse count is enabled; or the InventoryCountOpen broadcast message is empty, then the SAP Business One name and password fields are invalid. From the Data Collection Manager, select **File** > **Configuration Options** > **SAP Database Options** to verify these values.

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