Astra 6400 & 6450

OWNER'S GUIDE

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TABLE OF CONTENTS

CHAPTER 1. Getting Started

Introduction

Thank you for purchasing the UMAX Astra series scanner. This manual covers both the Astra 6400 and Astra 6450. The Astra 6450 includes a Universal Transparency Cover (UTC) for scanning transparent media. The UTC is an optional accessory on the Astra 6400.

The Astra 6400/6450 scanner is equipped with a FireWire/IEEE-1394 connector. The FireWire/IEEE-1394 interface connectors allow you to make a fast and easy connection to your computer. FireWire/IEEE-1394 connectors are found on the new Macintosh G3/G4 and iMac DV computers and PC computers equipped with FireWire/IEEE-1394 connectivity. A FireWire/1394 card is included for use on PC computers and your new scanner.

In addition to being easy-to-connect, this scanner is also easy-to-use. Simply follow the instructions in this guide and you'll be scanning in no time. With the powerful software included with your scanner, you can create, edit and archive scanned images, e-mail or fax images to friends or clients, or create your own Web site gallery. Get ready to unleash your creativity with the UMAX Astra 6400/6450 scanner.

Unpacking the Scanner

Your scanner package includes the cables and software you need to get the scanner up and running. The scanner package should contain all of the items listed below. If you do not find all of the listed items, immediately contact the retailer from whom you purchased the scanner, or contact UMAX. For information about contacting UMAX directly, refer to *Chapter 6. How to Get Help*.

Package Contents

• UMAX Astra 6400/6450 Color Flatbed Scanner (built-in Universal Transparency Cover included with Astra 6450)

- FireWire/1394 Interface Card (for PC only)
- FireWire/IEEE-1394 Interface Cable
- Owner's Manual
- Quick Start Guide
- Power Adapter
- Slide Holder (included with Astra 6450)
- Adobe® Photoshop® LE CD-ROM
- UMAX Scanner CD-ROM. This CD-ROM contains software for Caere® OmniPage® LE OCR, NewSoft® Presto! PageManager (full version), NewSoft® Presto! PageType™ (full version, PC), UMAX Copy Utility (PC), Scanning Solutions electronic book

Getting to Know Your Scanner

To gain a complete understanding of the information contained in this manual, it is important that you become familiar with your scanner. The graphics below identify the key scanner components.

Astra 6400/6450 Scanner Elements

Scanner Lid
Cover that protects the object glass.

Object Glass
Glass surface on which documents or images are placed.

Universal Transparency Cover (included with 6450)
Provides top lighting when scanning slides.

Power Indicator
Illuminates to indicate that the scanner is powered on.

Scan, Copy and Custom (OCR or E-Mail**) Buttons**
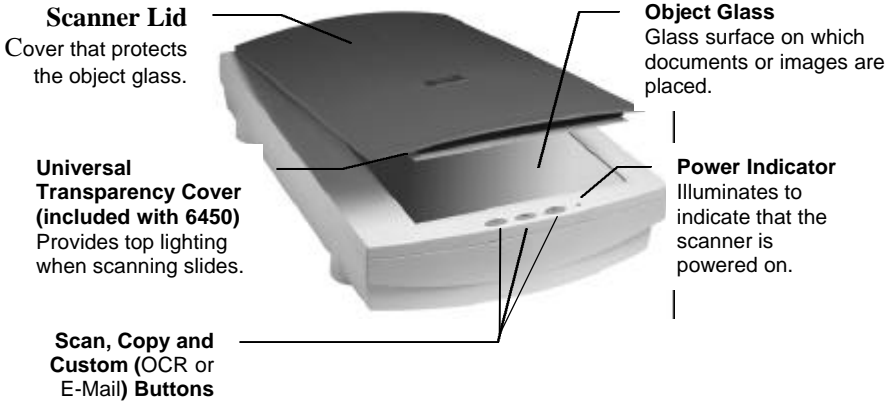
Astra 6400/6450 Back Panel

FireWire/IEEE-1394 Connector

Transparency Receptacle

Power Adapter Receptacle
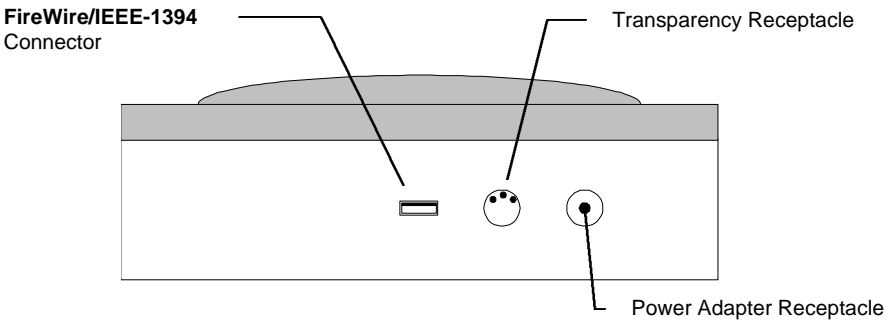
System Requirements

This section defines the minimum system requirements necessary to operate the Astra 6400/6450 scanner. Please refer to the section below that applies to your computer type.

PC Requirements

- An IBM-compatible PC with a Pentium processor or above
- Microsoft® Windows 98 SE/Windows 2000 or above
- Firewire/IEEE-1394 port (or available PCI slot to use included card)
- 64 MB RAM
- CD-ROM drive
- 250+ MB of available hard disk space

Macintosh Requirements

- iMac DV or New Power Mac G3/G4
- Firewire/IEEE-1394 port
- 64 MB RAM memory
- Macintosh OS 9.0 or higher
- CD-ROM drive
- 250+ MB of available hard disk space

Installing the Software

Installing Adobe Photoshop LE on the PC

1. Insert the Adobe Photoshop LE CD-ROM into your CD-ROM drive.

2. Click the **Start** button in the bottom left corner of the desktop.

3. Choose **Run** from the Start menu. The Run dialog box opens.

4. Click the **Browse** button.

5. From the pull-down menu, double click the **Photosle** CD-ROM.

6. Double-click on the language you want to install.

7. Double click the **Photosle** folder to open it.

8. Click on **Setup.exe** to highlight it, and click the **Open** button. The path to the Setup.exe file appears in the Open text box in the Run dialog box.

9. Click **OK** to launch the Setup file. Follow the screen prompts.

10. When the User Information dialog box appears, enter your personal information and the software serial number that appears in the upper right corner of the Photoshop registration card. You can find the registration card in the CD-ROM case.

11. Continue with the installation process by following the remaining screen prompts.

Installing Adobe Photoshop LE on the Macintosh

1. Disable any virus-protection extensions and restart your computer.

2. Insert the Adobe Photoshop LE CD-ROM into your CD-ROM drive. The Photoshop LE CD-ROM content window appears.

3. Double-click the **Adobe Photoshop LE** icon. The Photoshop LE window appears.

4. Double-click the **Install Photoshop LE** icon. Follow the screen prompts.

5. When the User Information dialog box appears, enter your personal information and the software serial number that appears in the upper right corner of the Photoshop registration card. You can find the registration card in the CD-ROM case.

6. Click the **Install Now…** button.

7. Continue with the installation process by following the remaining screen prompts.

Installing VistaScan and Other Bundled Software (Presto! PageManager, Presto! PageType, Presto! ImageFolio, OmniPage LE and Online Manuals)

1. Insert the UMAX Scanner CD into your computer's CD-ROM drive after you have finished installing the software on the Photoshop LE CD. If the Setup process begins automatically, go to step 2. If not, please see below;

    For PC Users: If your computer does not automatically start the Setup process, click the **Start** button in the lower left corner of your screen. Next, select the **Run** button. In the dialog box that appears type d:/setup (where "d" is the letter for your CD-ROM drive) and select **OK**. The Setup program will start automatically.

    For Mac Users: If your computer does not automatically start the Setup process, with the UMAX VistaScan window open on your desktop, double-click on the **UMAX CD Installer** icon to launch the Setup program.

2. Follow the on-screen instructions to complete the installation process. Be certain to register the scanner when asked. Registering the scanner gives you access to the password for the e-book *Scanner Solutions.* See below for more information.

Scanner Solutions e-book

The Scanner Solutions e-book is a complete, full color electronic version of the original hard copy book providing useful information and tips on the subject of scanning.

1. Complete the product registration as instructed during the VistaScan install. Or you can register the scanner on our Web site at www.umax.com. During registration, you will be given a **case-sensitive** password. Write it down for later reference.

2. The e-book *scannersolutions.pdf* can be found in the *ebook* folder on the VistaScan CD. It can be viewed by using Adobe Acrobat Reader and the password provided during registration.

About The Scanner's FireWire/IEEE-1394 Connectors

Newer computers (both PC and Macintosh) may rely on FireWire/IEEE-1394 technology as a method of communication between the computer and its peripherals.

Checking Your Computer's Connectors

To connect your scanner to your computer, f7irst locate the FireWire/IEEE-1394 connection on your computer.

- A FireWire/IEEE-1394 port is a small slot approximately ½" long and ¼" tall.

- Next to the FireWire/1394 port on a Macintosh computer, you should find the FireWire/1394 symbol

Setting Up – General Information

NOTE: Proper scanner hardware installation depends on installing the software first. If you have not installed the software that came bundled with the scanner, refer to *Installing the Software* earlier in this chapter for instructions.

Installing the FireWire/1394 Card (for PC)

1. Make sure computer's power is turned off. Remove the case according to the system manual's directions.
2. Insert the FireWire/1394 card in an empty PCI slot. Gently but firmly push it down until it is seated in the PCI slot.
3. Screw the bracket to the chassis to secure the card. Replace the computer's case and turn on the power.
4. Windows 98 SE/2000 will now detect the addition of the new hardware and ask to search for a driver. Select **Next**.
5. Windows will ask, "What do you want Windows to do?" Click on the option "Search for best driver for your device". Select **Next**.

6. Insert your Windows 98 SE/2000 CD into your CD-ROM drive. Select the "CD-ROM drive" option and click **Next**.
7. Windows will search the CD for the FireWire/1394 driver. After it finds the driver on the CD, select **Next** to install it.
8. After the driver installation is complete, select **Finish**. You'll be instructed to reboot your computer.

Note: The included FireWire/1394 PCI card is intended for use with the Astra 6400 and Astra 6450 scanners. Although other FireWire/1394 peripherals should work with the included FireWire/1394 card, UMAX is able to support the compatibility of the card only with the Astra 6400 and Astra 6450 scanners.

Connecting the Cables

Find a suitable location near your computer to place the scanner. **CAUTION:** Make sure the surface is flat. Operating your scanner on an uneven surface can damage the internal components.

1. Locate the FireWire cable that is provided with the Astra 6400/6450. Plug one end of the connector firmly into the FireWire/IEEE-1394 port on the back of the computer.

2. Plug the other end of the cable into the FireWire/IEEE-1394 port on back of the scanner.

Connecting the Universal Transparency Cover Cable (included with Astra 6450 optional on Astra 6400)

1. Locate the UTC cable connected to the back end of the UTC cover.

Universal Transparency Cover

UTC Cable
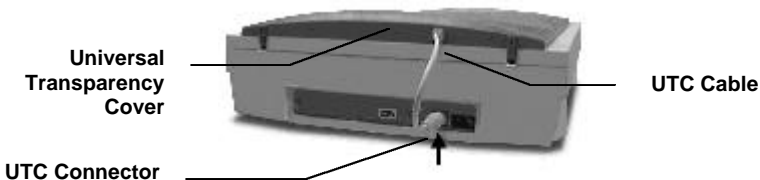
UTC Connector

2. Plug the UTC cable connector into the round three-pin DIN connector on the scanner's back panel.

Connecting the Power Adapter

1. Plug the scanner's power adapter into an electrical outlet.

2. Insert the other end of this cable into the power adapter receptacle on the rear panel of the scanner. The power indicator on the front panel of the scanner should now be illuminated.

3. Turn your computer on.

CHAPTER 2. Your First Scan

Before you begin your first scan, please install the bundled software and hardware. Refer to *Chapter 1. Getting Started*, for software and hardware installation instructions.

Using the Astra 6400/6450, there are three ways to scan an image:

1. Using third party application software to acquire your image. Application software is Adobe Photoshop LE for example.

2. Scan directly to file or application from the VistaScan driver.

3. Use the "Scan" button on the scanner to scan your image.

Scanning with Adobe Photoshop LE application software

1. Double click on Adobe Photoshop LE icon to open it.

2. Choose **Import** from the File menu.

3. Choose **Select Twain_32 Source**

4. Choose **VistaScan32 VX.XX.** This will establish the Astra 6400/6450 driver as the driver Photoshop will use.

5. Choose **Import,** and then select **TWAIN_32**

6. The scanner driver "VistaScan" will be activated and appear. The driver should display the "Beginner" interface. If not, click

7. Place the image to be scanned on the object glass.

8. Click the **Preview** button.

9. Using the crop features, set the desired scan area. See *VistaScan Beginner Interface* below for more information on selecting the scan area.

10. Click the icon that represents the type of media you are scanning.

11. VistaScan closes and the scanned image appears in Photoshop.

12. Modify the image using the Photoshop tools.

13. Choose **Save As** from the File menu to save the scanned image. Enter the file name, save location and file type (ie. JPG, TIFF, etc)

CHAPTER 3. Scanning Basics

VistaScan is the primary program or driver you use to scan with your Astra 6400/6450 scanner. It is a TWAIN-compliant program, which means that it can be run from other programs that support scanning, like Caere OmniPage and others. It is also a stand-alone program, which allows you to scan images for a variety of uses, even without launching another program first.

Setting VistaScan Preferences

VistaScan "Preferences" controls the Astra 6400/6450's default scan settings. Generally there is no need modify the settings every time you use the scanner.

To access the VistaScan Preferences, first launch the VistaScan driver, click the **Preferences** icon in the upper right corner of the VistaScan window. The preference icon is a scanner with a lightning bolt.

The Preferences cover three areas:

- General
- Scan Destination
- Scanner Information

A tab at the top of the Preferences window indicates each VistaScan preference group. To view the Preference settings for an area, click on the associated tab.

General

The General tab contains preference settings that control color matching and color correction, and whether to display the ruler and tips.
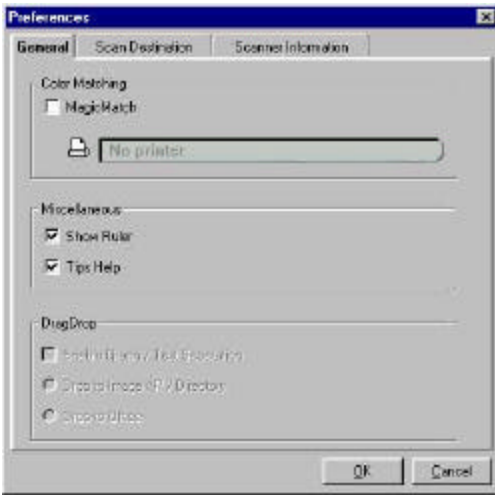
Color Matching/Correction

Color Matching allows you to fine-tune the colors of scanned images so that they emulate the colors of your original source documents as closely as possible. This is accomplished using MagicMatch.

When you click on the MagicMatch checkbox (so a checkmark appears) the Profile List displays. A profile is a list of applicable calibration profiles, which MagicMatch uses to render a final output image. If a printer or calibration profile is not chosen, MagicMatch will calibrate the image to optimize its display on a monitor.

MagicMatch only functions when you are scanning in color mode. When you are using Magic Match, it automatically disables the Level/Curve and Color Adjustment/Balance settings in the VistaScan Advanced window.

Show Ruler

The Show Ruler command displays or hides the rulers that border the top and left sides of the Preview window. These rulers correspond to the rulers on your scanner's object glass. Clicking on the **Show Ruler** checkbox turns off (removes the checkmark) and hides the ruler. Clicking on the checkbox again turns the feature on (displays a checkmark) and shows the ruler.

Tips Help

The Tips Help option determines whether tips are displayed when you pause with your cursor over a VistaScan option. Click on the **Tips Help** box to enable tips (displays a checkmark). When a checkmark appears, clicking the checkbox disables the tips and removes the checkmark.

Scan Destination

The options in this Preferences tab specify how scanned images are stored, printed, faxed, transferred to another application, or transmitted via e-mail.
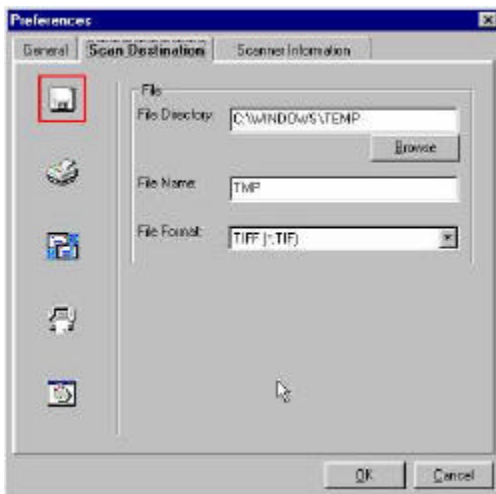
File

To set the location for your stored images:

1. Click on the **File** icon. The file preferences appear to the right of the Scan To icon set.

2. Enter the directory in which you want to store the scanned image file, in the File Directory text box. If you are not sure of the directory path, click the **Browse** button to locate the desired directory.

3. Enter the file name under which you want to store the scanned image files (such as TMP) in the **File Name** text box.

4. Select the file format in which you want to save scanned images from the **File Format** drop down list.

Printer

To specify which printer to use when printing scanned images:

1. Click on the **Printer** icon. The printer currently selected as the default appears to the right of the Scan To icon set.

2. If you want to change any of the printer settings, click on the **Properties** button. The standard Print Setup dialog box opens. Make any changes you want, and then click **OK** to return to the Preference settings.

E-mail

To specify which e-mail application to use when you e-mail scanned images:

1. Click on the **E-mail** icon. The e-mail preferences appear to the right of the Scan To icon set.

2. Click on the button next to the e-mail software you are using Microsoft Exchange and Lotus cc:Mail are the two supported e-mail programs.

3. Select the image format you want to use when you attach scanned images to your email application from the **Image Format** drop down list.

Fax

1. Click on the **Fax** icon. The fax driver (or printer driver if a fax driver is not selected) currently selected as the default appears to the right of the Scan To icon set.

2. If you want to change any of the settings, click on the **Properties** button. The standard Print Setup dialog box opens. Make any changes you want, and then click **OK** to return to the Preference settings.

Application

1. Click on the **Application** icon. The application preferences appear to the right of the Scan To icon set.

2. Enter the application name to which you want to send the scanned image files (such as Presto! PageManager) in the **Application Name** text box.

3. Enter the file name of the application executable in the **File Name** text box. If you are not sure of the directory path, click the **Browse** button to locate the correct path.

4. Select the image format in which you want to save scanned images from the **Image Format** drop down list.

Scanner Information

The Scanner Information tab displays important information about your scanner.
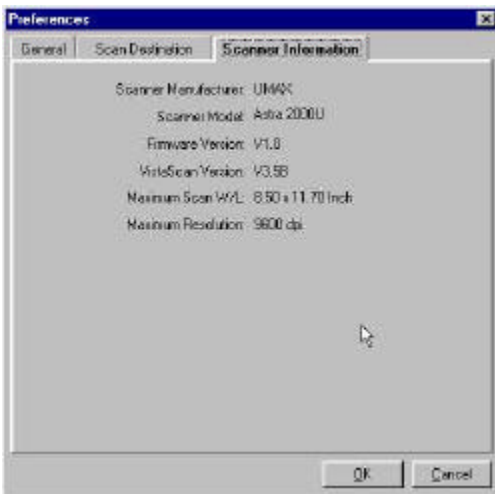
The information includes:

- Scanner Manufacturer
- Scanner Model
- Firmware Version
- VistaScan Version
- Maximum Scan Width and Length
- Maximum Resolution

VistaScan Beginner Window Features

The VistaScan Beginner window appears when you launch VistaScan. The features of the VistaScan Beginner window let you scan a wide variety of documents, photos, and graphics. Just click a button.
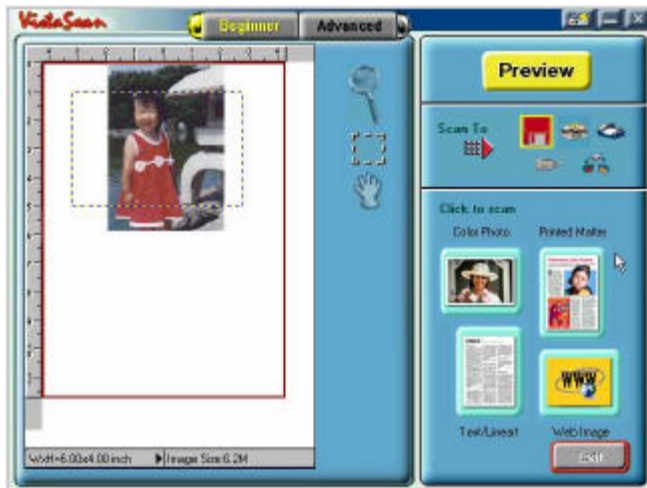
Scanning an item via the Beginner window consists of just a few steps:

1. Perform a preview scan of the item to be scanned by clicking the **Preview** button. The item is quickly scanned at low-resolution, and is displayed in the Preview window (on the left side of the VistaScan Beginner window).

2. Select what you want to do with the image after it is scanned using the Scan To icons.

3. Specify what kind of image you are going to scan, and start the final scan process using the Click To Scan icons.

Performing the Preview Scan

The Preview feature lets you scan an item at low-resolution so you can define the specific area to be scanned when you scan at higher resolution.

To preview the item you are going to scan:

1. Place the item you want to scan facedown on the object glass, under the inverted triangle that appears in the center of the rear ruler.

2. Click the **Preview** button on the right side of the Beginner window.

    The image is quickly scanned and displayed in the Preview window.

There are three Preview tools in the VistaScan Beginner window.
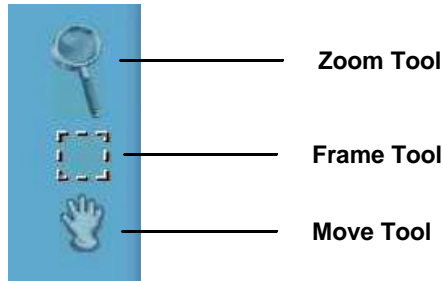
Zoom tool – Lets you enlarge or reduce the view of the image in the Preview window. To use the Zoom tool:

Once the preview image appears in the Preview window, click on the **Magnifying Glass** icon.

Move your cursor into the Preview window and click. The image enlarges. To reduce the view size, press the shift key (the command key on the Macintosh) and click in the Preview window.

Frame tool – Lets you select the portion of the image displayed in the Preview window you want scanned in the final scan step.

You can size the selection frame by clicking on the **Frame** tool and placing your cursor over one of the four edges of the frame (which changes the cursor shape to a two-headed arrow), drag the Frame inward to reduce the size, or outward to increase the size.

You can also move a selected frame by positioning the cursor inside the frame (which changes the cursor shape to a four-direction arrow), and dragging the frame to another location in the Preview window.

Move tool – Lets you move an image in the Preview window so you can see portions that are not visible because the image is zoomed too large to display completely. Click on the **Move** tool. Put the cursor inside the Preview window (which changes the cursor shape to a hand). Scroll the image view by clicking and dragging the cursor.

Selecting the Scan to Device or Application

To specify the device or application to which you want to send the scanned item, click on the icon that represents this device or application.

The icons include:

File – stores the scanned image in a file using the file name specified in the VistaScan Preferences.

Print – prints the scanned item on the default printer.

Fax – faxes the scanned item using your fax driver.

Application – sends the scanned item to the application specified in the VistaScan Preferences.

E-mail – sends the scanned item as a graphic file to your Microsoft Exchange or Lotus cc:Mail e-mail application. (**NOTE:** Other e-mail applications are not supported.)

Defining the Type of Image to Scan

The Beginner window provides you with pre-defined scanning options so you can quickly and easily scan any of the following items:

- Color Photos – use this setting when you want to scan color or black and white photos
- Printed Matter – use this setting when you want to scan something that has been printed like a brochure, magazine, etc.
- Text/Lineart documents – use this setting when you want to scan the text contained in a document, or when you want to scan simple lineart graphics
- Web Images – use this setting when you want to scan graphics and then use them on the web

To specify the type of image you are going to scan, click on the icon that represents the type of item you want to scan.
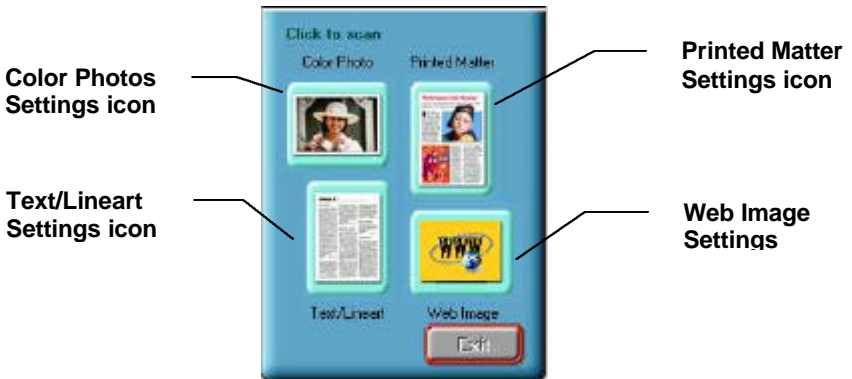
Clicking on any of these icons automatically starts the final scan process using the pre-defined scan settings. The scanned image is saved or sent to the device or application you specified by clicking on the Scan To icon.

VistaScan Advanced Features

The VistaScan Advanced window gives you the ability to adjust the scan setting individually so you can customize the settings for the type of document you are going to scan. If you are a novice computer user, you may want to use the VistaScan Beginner window until you are more familiar with VistaScan and the scanning process. The Beginner window options are preset to provide a quick and easy way to scan images.

If you are an experienced computer user with some scanning experience, you can use the features contained in the Advanced window to optimize the scan process for the specific item you are going to scan.

The Advanced window contains the following tools and features you can use to scan documents:

- Original Document Source Settings
- Image Mode Settings
- Resolution Settings
- Descreen Settings
- Filter Settings
- Scaling Options
- Auto Adjustment Setting
- Scan Control Unit
- Multiple Scan Mode Settings
- Color Adjustment Feature Panel

Changing the Original Document Source

The Original Document Source setting identifies the item you want to scan.

You can choose from the following settings:

Flatbed Reflective: Scans paper originals (non-transparencies) e.g., photographs, documents, and brochures.

UTA (Transmissive): Scans 4" x 5" or smaller photo transparencies.

UTA (Negative): Scans 4" x 5" photographic negatives.

Auto Doc Feeder: The Automatic Document Feeder option is not available for this scanner.

NOTE: For more information about scanning photo transparencies or negatives, refer to the *Universal Transparency Cover (UTC)* section of this manual.

Changing the Image Mode

VistaScan can scan a wide variety of image types.

True Color, RGB: Scans a full color photo or document. The RGB indicates the colors of Red, Green and Blue. This setting creates larger files than the B/W Photo setting.

True Color, CMYK: Converts RGB (video) color data into CMYK (printed) color data using a special color transformation process. When scanning is completed the CMYK image is ready for printing on a CMYK color printer.

NOTE: Most ink jet printers use RGB rather than CMYK printing.

256 Colors: Scans color images using 256 colors. The 256 color images take up less memory and hard disk space than the True Color RGB option.

Web Photo: Scans an image at the appropriate resolution for display on the monitor.

B/W Photo: Scans black-and-white photos using 256 shades of gray (ranging from white to black) so you get smooth shade transitions in your scanned image.

B/W Document: Scans text documents, black-and-white line art, and other black-and-white documents. This selection creates the smallest file sizes.

FAX: Scans at the appropriate resolution for faxing.

OCR: Scans at the appropriate settings for optimal OCR recognition.

True Color 42-bit RGB: Scans a full-color photo or document using 42-bits of information to define each pixel. The RGB indicates the colors of Red, Green and Blue. This setting creates larger file sizes than the True Color RGB setting.

B/W Photo, 14-bit: Scans a black-and-white photo using 14-bits of data to define each pixel. This setting produces more gray shade accuracy than the B/W Photo option, but also produces larger file sizes.

NOTE: Not all graphic applications support 42-bit graphic files. To determine whether the software you want to use is capable of working with 42-bit graphics, refer to your software documentation.

Changing the Resolution Setting

Scanning resolution is measured in dots per inch (DPI). Resolution determines the amount of information the scanner will capture in a scanned image. The higher the resolution, the finer the image detail, and the larger the file sizes.
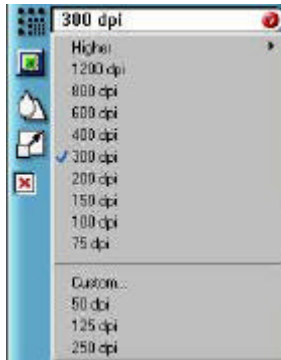
VistaScan lets you choose from the following resolution settings:

- Higher – this option opens a drop down menu that contains higher resolution settings which include 9600, 8400, 7200, 6000, 4800, 3600, 2400, 1800, and 1600 dpi selections.
- 1200
- 800
- 600
- 400
- 300
- 200
- 150
- 100
- 75
- Custom

The following table gives you an idea of the file sizes you can expect based on the original image size and the resolution setting you specify. These values are based on scanning images in 24-bit, True Color RGB mode. Image sizes shown below are given in megabytes.

Table 1. Resolution/File-Size Guidelines

Resolution (dots per inch)	Image Size 4x5	Image Size 5x7	Image Size 8.5x11
72	0.30	0.53	1.39
100	0.58	1.00	2.68
200	2.29	4.01	10.70
300	5.15	9.01	24.10
400	9.16	16.00	42.80
600	20.60	36.10	96.30
800	36.60	64.10	171.20
1200	82.40	144.20	385.20

NOTE: Choosing the True Color RGB 36-bit setting captures more data than the 24-bit setting. This means that the file sizes listed above will be larger if you scanned images using the True Color 42-bit RGB setting.

Choosing the Best Resolution for Your Scanning Project

To choose the best resolution for scanning, determine what you are going to do with the image once it is scanned. Matching your scanning resolution to the image use will give you the best image for that purpose and will keep the file sizes to the minimum needed.

Table 2. Recommended Resolutions

Image Use	Recommended Resolution
Printing	300 – 600*
Viewing on the Screen	72
Viewing on the Web	72
OCR, B/W	300
Pre-Press	600
Enlarging or reducing	600

* Depending on the resolution of your printer

Using Custom Resolution Settings

You can also specify custom resolution settings that you can use when you scan. The maximum custom resolution setting you can define is 2400 dpi. To define the custom resolution settings:

1. Choose the **Custom…** option from the Resolution drop down menu. The Custom Resolution window opens.
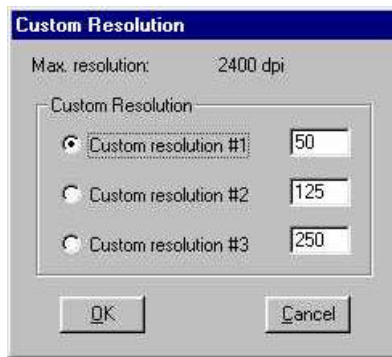
2. Enter the desired resolution setting (between 50 and 2400 dpi) in the Custom resolution #1 text box.

3. Repeat step 2 to define the Custom resolution #2 and Custom resolution #3 settings.

4. Click **OK**. The settings you defined appear on the Resolution setting drop down menu, under the Custom heading.

Changing the Descreen Feature

The Descreen option helps eliminate the patterns that can appear when you scan printed images found in magazines, brochures, catalogues, etc. This is accomplished by changing the number of lines that appear in every inch (lines per inch) of the scanned image.

The Descreen feature is unavailable when you have chosen the B/W Document, Fax or OCR resolution settings.

To change the Descreen setting:

1. Click the **Descreen** option to display the drop down menu.

Custom Descreen

Descreen lpi range: 35..400 lpi

Custom Descreen

- ⊙ Custom descreen lpi #1   `50`
- ○ Custom descreen lpi #2   `125`
- ○ Custom descreen lpi #3   `250`

OK   Cancel

2. Choose one of the descreen options:

   No Descreen — No Descreening.

   Magazine — Specifies 133 lines per inch. This option smoothes the fine dot pattern found in glossy magazines.

   Newspaper — Specifies 85 lines per inch. Smoothes the coarse grain pattern commonly found in newspaper images.

   Art print — Specifies 175 lines per inch. Smoothes the fine dot pattern found in high quality art prints.

   Custom — Opens the Custom Descreen window, which allows you to specify a custom line screen value. Refer to the *Using Custom Descreen Settings* section for information to set custom descreen values.

Using Custom Descreen Settings

You can also specify custom descreen settings that you can use when you want to change the lines per inch setting to eliminate patterns that are generated while scanning printed images. You can enter custom settings that range from 35 to 400 lines per inch. To define the custom descreen settings:

1. Choose the **Custom…** option from the Descreen drop down menu. The Custom Descreen window opens.

2. Enter the desired lines per inch setting (between 35 and 400 lpi) in the Custom descreen lpi #1 text box.

3. Repeat step 2 to define the Custom descreen #2 and Custom descreen #3 settings.

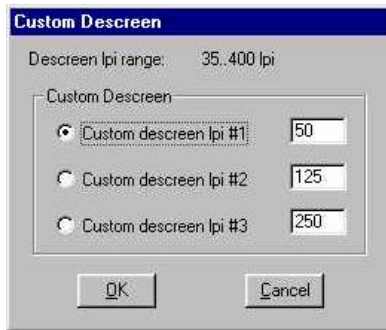4. Click **OK**. The settings you defined appear on the Descreen setting drop down menu, under the Custom heading.

Changing the Filter Setting

Image filters are used to soften or sharpen edges and boundaries of an image.
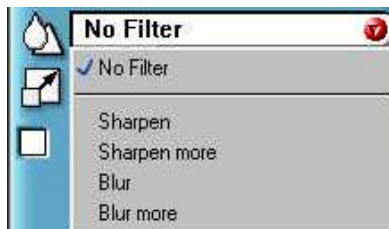
VistaScan provides the following filter options:

No Filter — Use this option when you do not want to sharpen or blur the image.

Sharpen — Use this option to sharpen lines that may be fuzzy or not clean in the original image.

Sharpen More — Use this option when you want to sharpen the image more than the standard Sharpen filter does.

Blur — Use this option when you want to soften the edges of an image.

Blur More — Use this option when you want to soften the edges more than the Blur filter does.

Changing the Scale Factor

Scaling lets you automatically enlarge or reduce an image from its original size (100%) as it is scanned. The scale factor affects the size of the scanned image and the printed scan output.
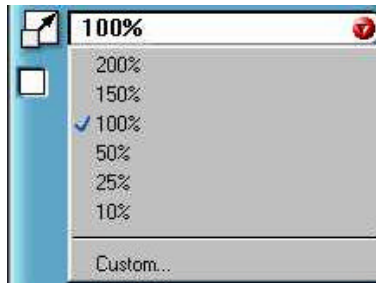
You can scale the image using any of the scale factors listed below:

- 200%
- 150%
- 100%
- 50%
- 25%
- 10%
- Custom

You can also specify a custom scale factor by choosing the Custom option from the Scaling drop down menu. See the *Using Custom Scaling Settings* section for more information about specifying a custom scale factor.

Using Custom Scale Settings

You can specify custom scaling settings to use when you scan. To define the custom scaling settings:

1. Choose the **Custom…** option from the Scaling drop down menu. The Custom Scaling window opens.
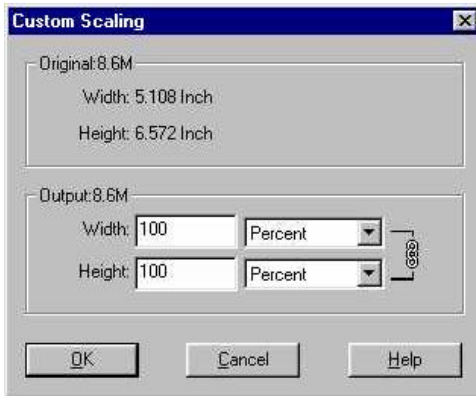
2. Enter the desired scale factor in either the Width or Height text box. When locked, (🔒) width and height entries are identical. The width and height fields are dynamic, updating one field automatically changes the other field. If the scale output size is unlocked (🔓), you can set the width and height output dimensions individually.

3. To change the unit of measure, click on the down arrow next to Height and/or Width text boxes to display the possible settings. You can choose from Inch, Centimeter, Pixel or Percent.

4. Click **OK**.

Using the Auto Adjustment Feature

Auto Adjustment provides a simple way to adjust the light and dark values of a color or grayscale image you want to scan.

To automatically adjust the light and dark values:

1. Place the item you want to scan on the scanner object glass.

2. Click the **Preview** button from the VistaScan Advanced window.

3. Select an area that you want to adjust using the **Frame** tool.

   You can edit the **Preview image** before scanning the final image using the "Zoom Tool" and the "Frame Selection Tool." To find out more about how to use these tools, click on the user tips text that appears when your cursor pauses over the tool.

   NOTE: To use VistaScan online help you must have a browser installed on the system.

4. Click the **Auto Adjustment** check box. The selected area is adjusted and the preview image refreshes, displaying the results you can expect when you perform the final scan.

Using the Scan Control Unit

The Scan Control unit contains the Preview and Scan buttons, and the Scan To options.

Selecting the Scan to Device or Application

To specify the device or application to which you want to send the scanned item:

1. Click on the arrow above the Scan To text on the Scan Control unit. The Scan Control unit panel slides back to display the Scan To icons.

Click on the icon that represents the device or application to which you want to send the scanned item. The icons include:

> **File** — stores the scanned image in a file using the file name specified in the VistaScan Preferences.

> **Print —** prints the scanned item on the default printer.

> **Fax** — faxes the scanned item using your fax driver.

> **Application** — sends the scanned item to the applications specified in the VistaScan Preferences.

> **E-mail** — sends the scanned item as a graphic file to your Microsoft Exchange or Lotus cc:Mail e-mail application.

Using the Multiple Scan Mode

You can select multiple portions of the image you scanned in Preview mode using the Multiple Frame tool.
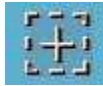
The Multiple Frame tool allows you to create two or more selection frames in the Preview Window.

To create more than one selection frame:

1. After you have scanned an image in Preview scan mode, click on the **Multiple Frame** tool.

2. Select the area you want contained in the first frame by clicking on the point at which you want to begin the frame, and then dragging the tool diagonally until the area of interest is contained in the marquis box.

3. Click outside of a selected area to save the frame. To create other frames, repeat steps 1 and 2 until you have created all the desired frames.

4. After you create a frame, the Single Frame tool is automatically selected so you can resize or move the frame you just created.

To select one of the frames you created, double-click on the desired frame. The frame border of the active frame changes to a marquis style frame (dotted lines). Once a frame is selected, double-click on a frame to display the Job Information window for that image, which contains the image information.

To remove a selected frame:

1. Click on the **Job List** button. Thumbnails of the selected frames appear in the job list window.
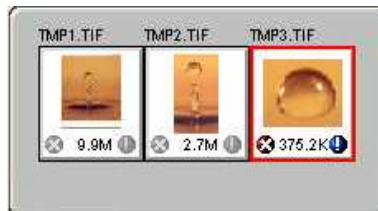
2. Click on the thumbnail of the frame you want to remove. A red box appears around the selected thumbnail. The frame in the Preview window associated with the thumbnail changes to a dashed outline.

3. Click on the **X** button, located in the bottom-left corner of the thumbnail, to remove the frame.

4. One frame will always remain and cannot be deleted.

Using the Color Adjustment Features

The Color Adjustment features allow you to make adjustments to the colors and/or tones in an image. The following lists the color adjustment settings you can modify:

*   Brightness, contrast, highlights, shadows, and gamma
*   Image tones
*   Color balance

• Rotation/Invert

To access the color adjustment features, click the **Color Adjustment** icon from the VistaScan Advanced window.

Adjusting Image Brightness, Contrast, Highlights and Shadows

When you click on the Brightness/Contrast tab from the Color Adjustment panel a series of slide bars appear. Adjust the associated tones by dragging the slider in one of the bars to the left or the right.
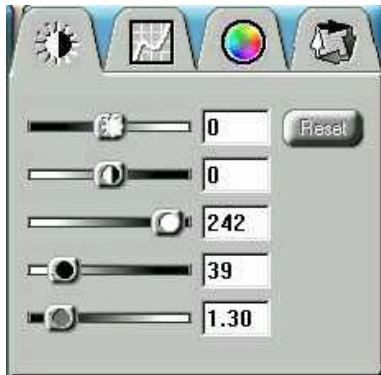
Using the Brightness Bar

This setting determines the overall intensity level (gray level) of an image. Moving the slider on the scroll bar to the right increases the brightness. Moving it to the left decreases the brightness. The default setting is zero 0. The maximum brightness setting is 100, the minimum setting is –100.

Using the Contrast Bar

This setting controls the difference between light and dark areas in an image. Moving the slider on the scroll bar to the right increases the gray shades between light and dark areas. Moving it to the left decreases gray shades between light and dark areas. The default setting is zero 0. The maximum contrast setting is 100, the minimum setting is –100.

Highlight Bar

This setting defines the lightest (whitest) tones in the scanned image. If you broaden the range that includes the highlight points, the pixels within the newly specified range to be remapped allowing you to see more details in a color/gray image.

Moving the slider on the scroll bar to the left increases the brightness. Moving it to the right decreases the brightness. The default setting is 255. The maximum highlight setting is 255; the minimum setting is 1 (white).

Shadow Bar

The Shadow bar defines the darkest tones in the scanned image. Moving the slider on the scroll bar to the left increases the brightness in shadowed areas. Moving it to the right decreases the brightness in shadowed areas. The default setting is 0. The maximum shadow setting is 254 (black); the minimum setting is 0.

Gamma Bar

The Gamma bar alters the mid-range gray tones in the scanned image. All optical devices, such as monitors and scanners, have some variance in their light sensitivity characteristics. To get a scanned image with good results, VistaScan provides gamma adjustment capabilities so you can compensate for this variance in your scanner.

Moving the slider on the scroll bar to the right increases the brightness of the mid-range gray tones. Moving it to the left decreases the brightness of the mid-range gray tones. The default setting is 1.2.

Reset Button

Click the **Reset** button to cancel the changes and return the value to the default setting.

Adjusting the Image Tones

The Curve command is another way to make precise adjustments in the highlight, midtones, or shadow levels in your images. Using this feature corrects the gray/color values in an image. You change the values by altering the shape of the curve that represents the brightness values of pixels.
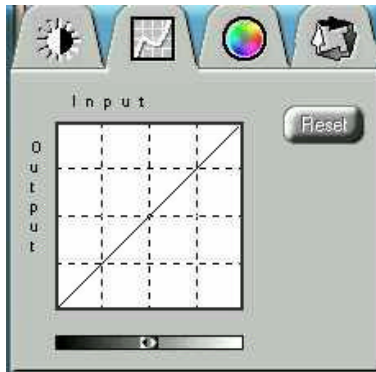
Click **Reset** to cancel the changes and return the value to the default setting.

Adjusting the Color Balance

The Color Adjustment feature controls the hue and saturation of a particular color.

When you click on the Color Balance tab from the Color Adjustments panel, a continuous color spectrum wheel appears.
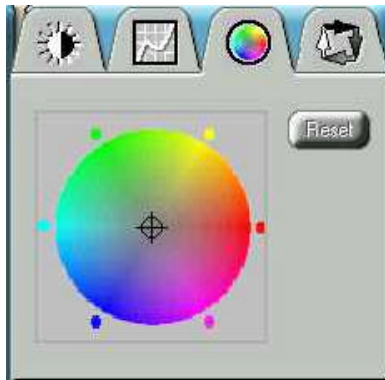
When you click in the wheel the image tones are shifted to the particular hue that is represented in that area.

Click the **Reset** button to cancel the changes and return the value to default setting.

Rotating/Inverting an Image

You can rotate an image clockwise or counter clockwise, and you can flip images 180 degrees vertically or horizontally.
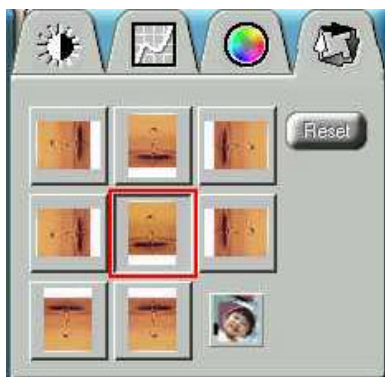
The following lists the possible rotate and flip selections:

- Flip/Rotate Horizontally — flips the image horizontally and rotates it 90 degrees counter clockwise.
- Flip Horizontal — flips the image horizontally.
- Rotate 90 CCW — rotates the image 90 degrees counter clockwise.
- Rotate 90 CW — rotates the image 90 degrees clockwise.
- Normal — does not rotate or flip the image.
- Flip Vertical — flips the image vertically.
- Rotate 180 — rotates the image 180 degrees clockwise.
- Inverts an image — changes all the dark tones in an image to light tones, and all of the light tones to dark tones. This option can NOT be reversed using the Edit menu Undo command.

Clicking on the image that shows the desired orientation rotates or flips the image. Clicking the Reset button cancels the rotate or flip action and returns the image to the original orientation.

Using the Universal Transparency Cover (UTC)

The Astra 6450 scanner is equipped with an UTC, which gives you the capability to scan slides and transparencies. The UTC is optional on the Astra 6400. Negative film normally contains an emulsion that affects the color of the image when scanned. Other transmissive images may appear clear, but negatives often have a muddy, brown, gray or orange tint to the image.

The VistaScan software contains a "negative" option for compensating for the inherent color bias of the emulsions. VistaScan is able to neutralize the cast of whichever emulsion type is applied to the negative, based on the type of the negative.

To achieve the optimum scan from a negative:

- Scan negatives and slides at the highest optical resolution the scanner supports, which is 600 dpi for this scanner. You should also try scanning at 1200 dpi to see which resolution works best for you.

Make sure you select only the image when cropping, and do not include any extra background material. This is the most important step when scanning a negative. Inclusion of the non-image slide material within the cropping area will degrade the scan quality.

Using VistaAccess – Direct Access

VistaAccess is a utility that provides instant access to several VistaScan applications. VistaAccess loads at startup, and can be found in the system tray (PC) or control strip (Mac) as the scanner icon. With VistaAccess, you can open any of the listed applications with a few clicks of your mouse.

To use VistaAccess from the PC

a) Click on the **Start** bar. Click on the **Programs** option. When the Programs pop-up menu appears, click the **VistaScan** option. The VistaScan pop-up menu appears. Click the **VistaAccess** option to display the scanner icon in the Windows Task bar (near the time display in the lower right corner of the window in the system tray).

b) Click the scanner icon in the system tray using your right mouse button. A pop-up menu appears which contains:

- VistaScan
- VistaShuttle
- Copy Utility
- Scanner Test
- Push Button Configuration
- Power Saving On/Off Control
- Find/Refresh Scanner
- Exit

c) Click on one of the listed applications or utilities to launch the software.

d) Click the **Find/Refresh Scanner** option to re-initialize the scanner. Click the **Help** option to view VistaAccess online

help. Click the **Exit** option to remove the scanner icon from the Windows Task bar and close VistaAccess.

To use VistaAccess from the Macintosh:

1. VistaAccess loads at startup. Click on the scanner icon in the lower left corner of the Desktop. A drop down menu appears which contains:

    - VistaScan
    - Push Button Configuration
    - Lamp On/off Control
    - Find/Refresh Scanner

2. Click on one of the listed applications or utilities to launch the software.

3. Click the **Find/Refresh Scanner** option to re-initialize the scanner. Click the **Help** option to view VistaAccess online help. Click the **Exit** option to remove the scanner icon from the Finder area and close VistaAccess.

Turning the Scanner Lamp On and Off

You can turn the scanner lamp on and off using the Power Saving utility built into VistaAccess.

The power saving option is accessible by accessing VistaAccess. See "Using VistaAccess – Direct Access" for more information. Within VistaAccess select **Lamp On/Off Control.** Select the appropriate function to turn the scanner either On or Off. Or enter a time to turn the scanner automatically off after a specified "idle" period.

Using VistaShuttle

VistaShuttle is a PC-based application that provides an easy way for you to create greeting cards, wallpaper for your computer desktop, a screen saver for your computer, e-cards (e-mail greeting cards), and more.

NOTE: VistaShuttle is not compatible with the Macintosh.

To use VistaShuttle to create an E-Card (electronic greeting card you send via e-mail):

1. Click the scanner icon in the system tray (to the far right of the Windows task bar) using your right mouse button. Select the VistaShuttle application from the VistaAccess menu. The VistaShuttle Main window appears.

2. Click on the E-Card icon. The VistaScan Beginner window opens so you can scan an item to include in your electronic greeting card.

3. Lift the scanner's document cover and place your document face-down in the center of the scanner's object glass.

4. Click **Preview** to preview the scanned item. You can edit the Preview image before scanning the final image using the "Zoom Tool" and the "Frame Selection Tool." To find out more about how to use these tools, click on the user tips text that appears when your cursor pauses over the tool.

    NOTE: You must have a browser installed in order to view the VistaScan online help.

5. Click the icon that most closely represents the item you are going to scan in the Click To Scan area of the VistaScan Beginner window.

The item is scanned, and VistaScan automatically closes. After a moment the VistaShuttle E-Card window appears with the scanned item in the default E-Card template.

6. Click on the scanned item to display the image handles. Drag one of the image handles outward to enlarge the image, or inward to reduce the image.

   You can customize the E-Card template frame that surrounds the scanned item, the stamp graphic or the paper type by clicking the desired option from the buttons in the left column.

7. Click and drag any of the E-Card template elements to move them around, creating your own E-Card style.

8. Choose the Add text command from the Text menu (or click on the Text button from the left-hand column). The Text Setting window opens.

9. Enter the E-Card greeting text in the text box.

10. You can modify the font type, font size, font style (bold, italic, underlined), text alignment (left, right or centered), and text color by selecting an option from the dropdown lists or by clicking on the associated icon from the button bar at the top of the E-Card window.

11. Click the **Finish** button to place the text on the card.

12. Click the **Close** button in the upper right corner to close the Text Setting window. You can move the text box around the E-Card until you find the right spot. Click outside the text box to anchor the text to the chosen spot.

13. Click the Mail button from the E-Card window. The Send dialog box appears.

14. Choose your e-mail application from those listed (only Microsoft Exchange and Lotus cc:Mail are supported), and click the Send button to open the application and attach your E-Card to the message.

15. Send your e-mail message.

Using the UMAX Copy Utility

The UMAX Copy utility is a PC-based application that lets you scan and automatically print copies of an image.

NOTE: The UMAX Copy Utility is not Macintosh compatible.

To use the copy utility:

1. Click on the **Start** bar. Click the **Programs** option. When the Programs pop-up menu appears, click the **VistaScan** option. The VistaScan pop-up menu appears. Click the UMAX Copy Utility selection to open the program.

2. The UMAX Copy Utility window appears.
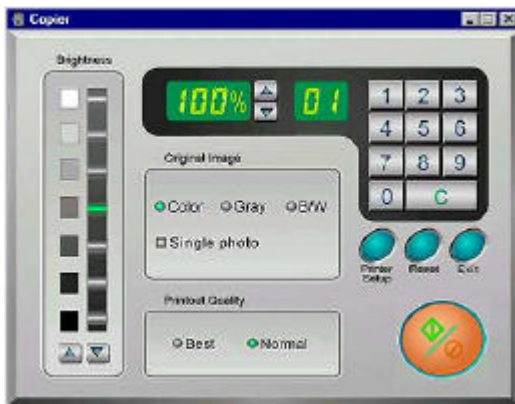
3. Select your copy settings. Click the **Copy** button to make the copies, then click Exit when you are finished.

UMAX Copy Utility Features

Brightness: Lets you select the brightness levels to use when you print the copies of the scanned image. If the image is too dark, click the up arrow to lighten the copy. If the image is too light, click the down arrow to darken the copy.

Original Image: Lets you specify the type of image to be copied — Color, Gray or B/W. The Single Photo option automatically crops unnecessary white space around the image (no matter where the image is placed), and speeds up the scanning.

Printout Quality: Choose Normal for draft quality, or choose Best for high quality images.

- **B/W images** — Selecting Best or Normal produces the same output.
- **Gray images** — Selecting Best uses an enhanced filter to improve image quality but slows down the print speed.
- **Color image** — Selecting Normal uses an enhanced filter to improve color quality; selecting Best uses the MagicMatch function to produce the best image quality.

Printer Setup — Opens the Printer Setup dialog box.

Reset — Returns any settings you have modified to the default settings.

Exit — Returns you to the desktop window.

Numeric Buttons — Lets you specify the number of copies by clicking on the desired number. The number appears to the left.

Scaling — Sets the printout size of your scanned image; the default is 100%.

Copy/Stop — Copy your scanned image by clicking the **Copy** button. When copying begins the button text changes to read Stop. To stop printing copies, click the **Stop** button.

CHAPTER 4. Push Button Scanning

The defining feature of the Astra 6400/6450 is its push button functionality. You can scan an image to e-mail, perform OCR (optical character recognition), or even use the scanner as a copy machine by pushing one of the three buttons on the front panel of the scanner.

You can increase your productivity by accessing all of the normal scanner functions without having to launch the software applications through the onscreen interface.

Before you can use these time-saving functions, you need to configure the settings for each button. Follow the appropriate set of instructions below to configure the variables for each button.

Configuring the Push Buttons

To access the configuration utility for the push buttons, follow the appropriate instructions below:

For PC Users:

1. Click the scanner icon in the Task bar using your right mouse button. A pop-up menu appears which contains:

    - VistaScan
    - VistaShuttle
    - Copy Utility
    - Scanner Test
    - Push Button Configuration
    - Power Saving On/Off Control
    - Find/Refresh Scanner
    - Exit

2. Click the **Push Button Configuration** option.

For Macintosh Users:

a. Click on the scanner icon in the Control Strip located in the lower left corner of the Desktop. A pop-up menu appears which contains:

- VistaScan
- Push Button Configuration
- Lamp On/Off Control
- Find/Refresh Scanner

b. Click on the **Push Button Configuration** option. The Push Button Configuration window appears.

NOTE: There are three icons in the Push Button Configuration window. Each icon represents a separate scanner button function. Clicking on the icon displays a window with variables.

Configuring the Scanner Button Values

1. When the Push Button Configuration utility opens, the scanner settings are automatically displayed. Select the image editing software you want to scan to when you press the Scan push button, by clicking on the arrow to the right of the Scan Destination field. A list of the available applications appears. Choose one of the available applications from the drop-down menu.

2. If the application you want to scan to is not shown in the Scan Destination drop-down list, click the Add button (to the right of the scan Destination drop-down list). The Add Application window opens. Enter the application name in the Application Name text box. Enter the path and the executable file name for the application you want to use in the File Location text box.

If you are not sure of the path or the exact executable name, click the **Browse** button to locate the appropriate file.

3. Click **OK** to return to the Push Button Configuration window. Select the application you added to the Scan Destination drop-down list.

4. Select the type of image you are scanning by clicking on the arrow to the right of the Document Type field and choosing one of the available document types from the drop-down menu.

5. Select the desired resolution by clicking on the arrow to the right of the Resolution field and choosing one of the presets from the drop-down menu.

6. Select a scanning intensity level (brightness) by clicking on the arrow to the right of the Brightness field and choosing the desired brightness level from the drop-down menu.

7. Original indicates the type of material the original image is printed on. Select either Reflective or Transmissive by clicking the arrow to the right of the Original field.

8. Select the size of the original image by clicking on the arrow to the right of the Scan Area field.

9. Click the **OK** button to save the Scan push button configuration settings. These settings will be used whenever you press the Scan button on the front of the scanner.

NOTE: You can also click the Default button to return the values in each field to the default settings. Then click **OK**.

Configuring the Copy Button Values

1. Click the **Copy** icon to open the window that contains the variables you are adjusting.

2. Select the printer driver you want to use to print the copies, by clicking on the arrow to the right of the Copy Destination field.

Choose one of the available printers that is connected to your computer from the drop-down menu.

3. Select the type of image you are scanning by clicking on the arrow to the right of the Document Type field and choosing one of the available document types from the drop-down menu.

4. Select the desired resolution by clicking on the arrow to the right of the Resolution field and choosing one of resolution presets from the drop-down menu.

5. Select a scanning intensity level (brightness) by clicking on the arrow to the right of the Brightness field and choosing the desired brightness level from the drop-down menu.

6. Original indicates the type of material the original image is printed on. Select either Reflective or Transmissive by clicking the arrow to the right of the Original field.

7. Select the file size for the scanned image by clicking on the arrow to the right of the Scan Area field and choosing the desired dimensions from the drop-down menu.

8. Click the **OK** button to save the Copy push button configuration settings. These settings will be used whenever you press the Copy button on the front of the scanner.

    NOTE: You can also click the Default button to return the values in each field to the default settings. Then click **OK** save these values for the copy button.

Configuring the Custom Button Values

1. Click on the **Custom** icon to open the window that contains the variables you are adjusting.

    NOTE: The Custom icon controls the values for both the E-mail and OCR (optical character recognition) features. You configure the variables for each function separately.

To configure the values for the e-mail function:

1. If the E-mail icon is not selected (enclosed in a red box), click the **E-mail** icon.

2. Select the e-mail application (only Microsoft Exchange and Lotus cc:Mail are supported) to send the scanned image to, by clicking on the arrow to the right of the Mail Destination field.

3. Select the type of image you are scanning by clicking on the arrow to the right of the Document Type field and choosing one of the available document types from the drop-down menu.

4. Select the desired resolution by clicking on the arrow to the right of the Resolution field and choosing one of resolution presets from the drop-down menu.

5. Select a scanning intensity level (brightness) by clicking on the arrow to the right of the Brightness field and choosing the desired brightness level from the drop-down menu.

6. Original indicates the type of material the original image is printed on. Select either Reflective or Transmissive by clicking the arrow to the right of the Original field.

7. Select the file size for the scanned image by clicking on the arrow to the right of the Scan Area field and choosing the desired dimensions from the drop-down menu.

8. Click the **OK** button to save the Custom E-mail push button configuration settings. The Custom setting is now configured to scan and send the scanned image to the selected e-mail application.

   To configure the Custom button to scan and OCR a document, refer to the *To configure the values for the OCR (Optical Character Recognition) function* section that follows.

NOTE: You can also click the Default button to return the values in each field to the default settings. Then click **OK** save these values for the e-mail function of the Custom button.

To configure the values for the OCR (optical character recognition) function:

1. If the OCR icon is not selected (enclosed in a red box), click the OCR icon.

2. Select the text editing application to use by clicking on the arrow to the right of the OCR Destination field. Choose an application from the drop-down menu.

    NOTE: You do not need to select values for Document Type, Resolution, Brightness, nor for Scan Area.

3. Original indicates the type of material the original image is printed on. Select either Reflective or Transmissive by clicking the arrow to the right of the Original field.

4. Click the **OK** button to save the Custom OCR push button configuration settings. The Custom setting is now configured to scan, OCR and then send the editable text to the selected OCR Destination application.

To configure the Custom button to scan and e-mail a document, refer to the *To configure the values for the e-mail function* section above.

NOTE: You can also click the Default button to return the values in each field to the default settings. Then click **OK** save these values for the OCR function of the Custom button.

Using the Push Buttons

Once you have configured the variables for each of the push buttons, you can scan images and text by simply pressing one of the buttons on your scanner.

To scan using one of the scanner's push buttons:

1. Press the Scan, Copy, or Custom (i.e. e-mail or OCR) button.

2. A Scan Progress window appears showing you the status of the scanning task.

3. When the scan is complete, the image you scanned appears in the application that you specified when you configured the button.

CHAPTER 5. Scanning Projects

The UMAX Astra 6400/6450 scanner includes bundled software to help you with a variety of tasks. This chapter shows you how to make a personalized calendar, create Web-ready images, and even turn a page of text into an online text document that you can edit.

Using VistaScan to Scan and Print Images

To perform your first scan:

1. Open the VistaScan software application.

For PC Users:

    a. Click on the **Start** bar. Click on the **Programs** option. When the Programs pop-up menu appears, click the **VistaScan** option. The VistaScan pop-up menu appears. Click the **VistaAccess** option to display the scanner icon in the Windows Task bar (near the time display in the lower right corner of the window in the system tray).

    b. Click the scanner icon in the Task bar using your right mouse button. A pop-up menu appears which contains:
- VistaScan
- VistaShuttle
- Copy Utility
- Scanner Test
- Push Button Configuration
- Power Saving On/Off Control
- Find/Refresh Scanner
- Exit

    c. Click on one of the listed applications or utilities to launch the software.

Or you can also:

a. Click on the **Start bar** in the bottom-left corner of the screen.
b. Click **Programs**.
c. Select **VistaScan** from the Programs menu.
d. Select **VistaScan** from the VistaScan menu.

For Macintosh Users:

a. Click on the scanner icon in the control strip located in the lower left corner of the Desktop. A drop down menu appears.

b. Select the VistaScan option from the menu.

Or you can also:

a. Double-click the **Hard Drive** icon.
b. Double-click the **UMAX VistaScan** folder.
c. Double-click the **UMAX VistaScan** application icon to launch VistaScan.

2. The VistaScan Beginner window appears. Lift the scanner's document cover and place your document face-down in the center of the scanner's object glass.

3. Click the **Preview** button to preview the scanned item. You can edit the Preview image before scanning the final image using the "Zoom Tool" and the "Frame Selection Tool." To find out more about how to use these tools, click on the user tips text that appears when your cursor pauses over the tool.

    NOTE: This feature is only available if you have a browser installed.

4. Click the **Printer** icon in the "Scan to" control panel to indicate that you want to scan and print the image.

5. Click one of the four icons in the Click to Scan area of the VistaScan Beginner window. Your selection identifies the type of image you are about to scan and tells VistaScan how to set the scanner options for the best results. The image type selections include: Color photos, Text/lineart, Web Images and Printed Matter settings.

Once you click on the desired image type, the scanner starts scanning the image using the appropriate settings.

For Macintosh Users:

After the scan is complete, a print window appears. Verify that the destination settings are correct and then click the **Print** button.

6. When the scan is complete, the image is printed on your printer.

Using VistaScan to Scan a Photo to E-mail

Scanning an image to e-mail is similar to the procedure described in the *Using VistaScan to Scan and Print Images* section earlier in this guide. Scan to e-mail works with Microsoft Exchange and Lotus CC Mail. Follow steps 1 through 3 as listed in the Scan and Print instructions, then proceed with the following steps:

1. Click the **E-mail** icon to set the scanner settings to the best values for scanning an image to e-mail.

   NOTE: You may need to adjust the destination preferences in the VistaScan Beginner window. For information about setting preferences, refer to *Setting the VistaScan Preferences* section.

2. Click the **Web Image** icon in the Click to Scan area of the VistaScan Beginner window. The scanner starts scanning the image using the appropriate settings for web images.

3. After the image is scanned, a Microsoft Exchange or Lotus cc:Mail e-mail window appears with an icon representing the scanned image embedded in the message area of the window.

   NOTE: For more information about using Microsoft Exchange or Lotus cc:Mail refer to the user documentation that came with the application.

4. Fill out the rest of the standard e-mail information (address, subject, etc.) as you ordinarily would. Send the e-mail.

Using Presto! PageManager to Scan a Form and Edit it with PageType

NOTE: Presto**!** PageType is not a Macintosh-compatible application. The following procedure is for PC users only.

1. Click the **Start** bar in the bottom-left corner of the screen.

2. Click **Programs**.

3. Select **Presto! PageManager** from the Programs menu.

4. Select **Presto! PageManager** from the Presto! PageManager menu.

5. The Presto! PageManager window appears.

6. Choose **Select Source** from the File menu. A window appears, choose **VistaScan**. Select **Acquire** from the File menu. The VistaScan Beginner window appears.

7. Lift the document cover and place the form you want to scan face-down in the center of the object glass of the scanner.

8. Click the **Preview** button.

9. Click the **Text/Lineart** icon in the Click to Scan area to begin the scan.

10. When the scan is complete, click the **Exit** button at the bottom of the window. The scanned image of your form appears in the PageManager Inbox window.

11. Click and drag the scanned form down to the PageType application icon. PageType opens and automatically displays the scanned form.

12. Fill in the form text desired using the PageType tools.

13. Save the image when you have finished editing the form by selecting **Save As** from the File menu and entering the relevant information.

Converting Scanned Text to Editable Text with OmniPage

OmniPage lets you scan an image that contains text and convert it to editable text so you do not have to retype the text. The process differs slightly for PC and Macintosh users. Follow the appropriate instructions for the system that you are using.

Opening OmniPage LE

For PC Users:

1. Click the **Start** bar in the bottom-left corner of the screen.

2. Click **Programs**.

3. Select the **Caere Applications** option.

4. Select **OminPage LE** to launch the application. The OmniPage LE window appears.

For Macintosh Users:

1. Double-click the **Hard Drive** icon.

2. Double-click **OmniPage LE**.

3. Double-click the **OmniPage LE** icon. An OmniPage toolbar appears. (If this toolbar does not appear, click on the **Window** menu and select **Show Toolbar**).

4. Click **Select Scanner** from the Settings menu. Select **UMAX Astra Series** then click **OK**.

Converting Scanned Text with OmniPage LE

1. Position the image you want to scan face-down on the scanner's object glass.

2. From the OmniPage LE window, click the **Scanner** icon and select Flatbed. Click **Done**.

For PC Users:

1. Choose **Acquire Image** from the File menu. Select **Flatbed** from the Paper Path field in the Load Scanner dialog box and then click **Scan** to scan the image. When the scan is complete, the text appears in the OmniPage window.

2. Click the **OCR** button to perform the character recognition.

3. A small dialog box appears. If you have additional pages to scan, click the **Add Pages** button and repeat steps 2 and 3.

4. Click **Stop Scanning** when you have scanned all the desired pages, and enter the file name, file directory and file type (the format in which you want to save the file).

5. Click **OK** to save the recognized text.

For Macintosh Users:

1. Click **Save** to save the converted text.

2. Choose **Exit** from the **File** menu to close OmniPage LE.

3. Open your word processor application. Open the file that you just saved so you can review, edit, cut or copy portions of the text.

CHAPTER 6. How to Get Help

The Astra 6400/6450 scanner has been designed to be reliable, easy-to-install, and easy-to-use. If you encounter any problems while installing or using your scanner, please follow the solutions outlined below.

- Consult the online manual
- Read the troubleshooting section below
- Contact UMAX directly

Using Online Manuals

All bundled software comes with online help, which essentially is an online manual. Read the following information to find out how to access the manuals for each individual software application.

Accessing the UMAX VistaScan Online Manual

For PC Users:

If the VistaScan application is already open, you can locate the manual by clicking on the user tips that pop up when your mouse scrolls over a tool. If VistaScan is not open, follow the instructions below.

1. Click **Start**.

2. Click **Programs**.

3. Click **VistaScan**.

4. Click **VistaScan User's Guide**. Your Internet browser should launch the *VistaScan User's Guide*.

For Macintosh Users:

If the VistaScan application is already open, you can locate the manual by clicking on the "?" icon located in the upper right corner. If VistaScan is not open, follow the instructions below.

1. Double-click the **Hard Drive** icon on the desktop.

2. Double-click the **UMAX VistaScan** folder.

3. Double-click the **VistaScan Help**. Your Internet browser should launch the *VistaScan User's Guide*.

Accessing the Presto! PageManager Online Manual

For PC Users:

1. Click **Start.**

2. Click **Programs**.

3. Click **Presto! PageManager Deluxe.**

4. Click **PageManager User's Manual.**

For Macintosh Users:

1. Double-click the **Hard Drive** icon on the desktop.

2. Double-click the **Presto! PageManager** folder.

3. Double-click **User's Guide.pdf.** (If you receive an error, please install Adobe Acrobat reader 3.01. See "Installing Acrobat Reader" below for instructions.)

Accessing the Caere OmniPage Online Manual

For PC Users:

1. Click **Start.**

2. Click **Programs.**

3. Click **Caere Application**.

4. Click **English Documentation**.

For Macintosh Users:

1. Double-click the **Hard Drive** icon on the desktop.

2. Double-click the **OmniPage LE** folder.

3. Double-click **OmniPage Ltd.pdf**. (If you receive an error, please install Adobe Acrobat Reader. See *Installing Acrobat Reader* below for instructions.)

Troubleshooting

Problem:

The scanner lamp fails to light, flickers or dims

Solution:

1. Check to ensure the power adapter is plugged in completely.

2. The scanning lamp is failing or has failed and needs to be changed. Please contact your dealer or UMAX Technical Support.

Problem:

The scanner test failed.

Solution:

Make sure the interface cable is properly connected to the FireWire/IEEE-1394 connector port on your computer. Find and refresh the scanner after reinserting the cable. Try the second Firewire port on the computer if available.

Problem:

Your system resources are low on a Windows PC. Your system resources are the amount of free resources your system can call on at a given time. This should be at 90% or above to run a scanner. Anything under 60% will cause system freezes or link fails when you attempt to access the scanner.

Solution:

Follow the steps below to determine if your system resources are too low to operate the scanner.

1. Click the **My Computer** icon using the right mouse button. A pop-up menu appears.

2. Click on **Properties** using the left mouse button.

3. Click the Performance tab (the fourth tab under System Properties).

4. Look in the System Resources area (the second section). This number should be above 90%.

5. If not, press and hold down the CTRL+ALT keys and tap the Delete key once. This brings up the Close Programs window.

6. You need to end all tasks running except the EXPLORER and SYSTRAY items. To end a task, highlight an item in the Close Programs window and click the **End Task** Button. Repeat this step for each task you want to end. The programs will return upon restart. Repeating this process may be necessary.

Problem:

I cannot get the scanner to install properly on my Macintosh, or it does not run once it is installed.

Solution:

If you are having problems installing or using the Astra 6400/6450 scanner, ensure that Macintosh OS 9.0 or higher is installed on your computer.

Problem:

The system takes too long to scan on my Macintosh.

Solution:

Disable virtual memory, reboot your computer with the extensions disabled (hold down the SHIFT key during re-boot) and try again.

Booting with the shift key still loads the UMAX scanner extension required for scanning.

Problem:

When using a Macintosh computer your system goes to the Finder when you try to acquire the scanner.

Solution:

Plug the scanner into its own power outlet. If the problem still occurs, please call UMAX Technical Support.

Problem:

The following error message appeared: "Error: No Driver Found"

Solution:

The Macintosh OS generates this message if it could not find a driver in the System Folder for the FireWire/IEEE-1394 device you just connected. You may have forgotten to install the software that came with the device, or you may have put the device driver (i.e., the software that allows Macintosh to recognize and communicate with the FireWire/1394 device) in the wrong place in your System Folder.

Re-install the software driver from the VistaScan CD-ROM. Make sure the scanner extension is loaded and on.

Contacting Technical Support

UMAX Astra scanners are designed to be reliable, easy-to-install, and easy-to-use. If you encounter any problems while installing your scanner:

- Check out the UMAX Web site at www.umax.com/support

- E-mail UMAX with your technical support question at: support@umaxcare.com

- Call UMAX technical support at the following number: 214-739-1915.Contact your dealer or call the UMAX support line between 9 A.M. – 5 P.M. (CST), Monday-Friday.

  NOTE: You are eligible to receive 1-year free technical support (caller is responsible for toll charges), and 2-years free e-mail support from the date of scanner purchase.

  Before calling, please be sure to have the following information ready:

- The scanner model and serial number

- The version number of the scanner driver (located on the front of the CD)

- The computer model you are using

- The application software packages that you are using

- Error codes or messages seen

- A description of what you were doing at the time of the malfunction so that the problem can be recreated

- Other observations that may aid the technician in identifying the problem and solution

When you call, please be in front of your computer. You will need to have your scanner and the computer turned on. Try to have as much information about your problem as possible. This information allows the technician to more effectively troubleshoot your problem.

Maintenance

With the exception of periodic cleaning, the scanner is virtually maintenance-free. Please read the following section to learn how to properly maintain the scanner.

Cleaning

Regularly cleaning the object glass will ensure that dirt or smudges will not reduce the quality of your scanned images. Before you clean the glass, make sure the scanner is turned off and the power cord is unplugged.

Clean the object glass and document cover with a soft damp cloth and a mild detergent or alcohol.

Warning: Do not spray the cleaning fluid directly on the object glass. Spraying the liquid directly on the glass may cause the liquid to penetrate the seams around the glass and contaminate the mirrors and lenses inside the scanner. Please be sure you spray the liquid on the cleaning cloth and then wipe the glass clean.

Appendix A. Technical Specifications

The following table defines the technical specifications for the Astra 6400/6450 scanner.

Scanner Specifications

Scanner Type	1-pass color flatbed
Scanning Element	Color CCD
Optical Resolution	600 dpi x 1200 dpi
Maximum Resolution	9600 dpi x 9600 dpi
Color Density	42-bit color
Light Source	Cold Cathode Lamp
Optics	Enclosed Optical System
Interface	Firewire/IEEE-1394
Operating System	Windows 98 SE/2000, Mac OS 9.0 or above
Scanning Modes	Line Art 1 bit/pixel
	Grayscale 14 bits/pixel internal
	Color 42 bits/pixel internal
Data Output	42-bit color
	14-bit grayscale
Maximum Document Size	8.5" x 11.7", A4
Astra 6450 Maximum Transparency Size	4" x 5"
Scanner Dimensions	18.4" x 12.2" x 3.9"
Approx. Scanner Weight	8.5 lbs. (Astra 6450)
	7.8 lbs. (Astra 6400)

FCC Declaration of Conformity

Declares that the products:
Product Name: Color Scanner   Model No.: Astra 6400/6450

FCC Rules: Tested to comply with FCC Part 15, Class B Operating
Environment: For home or office use:
FCC Compliance Statement:
This device complies with part 15 of the FCC Rules. Operation is subject
to the following two conditions: (1) This device may not cause harmful
interference, and (2) This device must accept any interference received,
including interference that may cause undesirable operation.

Information to user:
This equipment has been tested and found to comply with the limits of a
Class B digital device, pursuant to Part 15 of the FCC Rules. These limits
are designed to provide reasonable protection against harmful interference
in a residential installation. This equipment generates, uses and can
radiate radio frequency energy and, if not installed and used in accordance
with the instructions, may cause harmful interference to radio
communications. However, there is no guarantee that interference will not
occur in a particular installation. If this equipment does cause harmful
interference to radio or television reception (which can be determined by
turning the equipment off and on) the user is encouraged to try to correct
the interference by one or more of the following measures:

- Reorient/relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment to an outlet different from the one to which
  the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Caution:
Changes or modifications not expressly approved by the manufacturer
responsible for compliance could void the user's authority to operate the
equipment.

The party responsible for product compliance:
Corporate Name: UMAX Technologies, Inc.
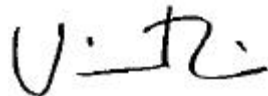Address: 3561 Gateway Blvd., Fremont, CA 94538, USA
Telephone No.:   510-651-4000
Person responsible for making this Declaration:

Position/Title: President   Signature:

Warranty

One Year Limited Warranty
UMAX Technologies, Inc. (UMAX) warrants this hardware product against defects in material and workmanship for a period of ONE (1) YEAR from the original date of purchase.

Should any defect(s) be discovered, the product may be returned either to the manufacturer or an authorized UMAX service center. If you are returning product for repair, please be sure to do the following:
1) Call UMAX Technical Support Monday-Friday and 9 A.M– 5 P.M. (CST)
   at (214) 739-1915 and obtain an RMA (Return Merchandise Authorization)
   number.
2) Clearly write your RMA number on the OUTSIDE of the box or package next to the
   shipping label.
3) Include a copy of the bill of sale with the returned product.
4) Unless otherwise instructed, do not return any manuals or software when returning items
   for repair.
5) All scanners and transparency adapters need to be locked (if provided) or restrained prior
   to transport. Failure to lock or restrain these items could cause serious damage to the
   product and void the warranty.
6) Ship to UMAX via a traceable shipping method and retain the tracking number.

This warranty is only valid within the boundaries and territories of the USA and Canada. UMAX is not responsible for costs incurred due to shipping, insurance, customs, or duties. UMAX is not responsible for non-traceable packages or packages shipped without a valid RMA number on the outside of the package.

This warranty does not apply if the product has been damaged by an accident, electrical fault, through misuse or abuse. If the product has been altered without written authorization by UMAX, the warranty will not be applicable.

This warranty applies only to hardware products manufactured by or for UMAX. Warranted products must bear the "UMAX" brand name, tradename, or logo. The aforementioned warranty and remedies are exclusive, and in lieu of all others, whether oral, written, expressed or implied. UMAX specifically disclaims any and all implied warranties of merchantability and fitness for a particular purpose.

UMAX is not responsible for incidental or consequential damages resulting from any breach of warranty. UMAX is not responsible under any other legal theory, including, but not limited to lost profits, and any cost of recovering reprogramming or reproducing any program or data stored in or used with UMAX products. For more warranty information, please call UMAX at (214) 739-1915

Warranty Service

If your UMAX product needs to be returned for repair, you must contact UMAX technical support or your reseller in Canada prior to shipment for an RMA number before sending in the product. The RMA number is a Return Merchandise Authorization number. UMAX and UMAX Authorized Service Centers will refuse all shipments without a proper RMA number. The RMA number MUST be printed on the outside of the box or package next to the shipping label. All scanners and transparency adapters must be locked or restrained prior to transport. Failure to lock (if provided) or restrain these items could cause serious damage to the product and void the warranty.