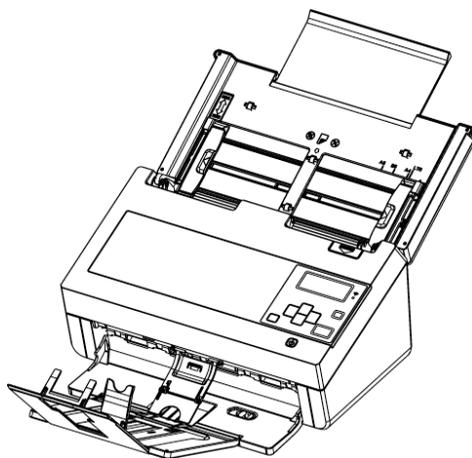




Network Scanner

User's Manual



Regulatory model: FL-1401B

Avision Inc.

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FCC Radio Frequency Interference Statement

This product has been tested and found to comply with the limits for a class B digital device, pursuant to 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 undesired operation. The FCC Class B 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 or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult your point of purchase or service representative for additional suggestions.



European Union Regulatory Notice

Products bearing the CE marking comply with the following EU Directives:

- Low Voltage Directive 2014/35/EC
- EMC Directive 2014/30/EC
- Restriction of the use of certain hazardous substances (RoHS) Directive 2014/53/EU
- RED (Radio Equipment Directive) (2014/53/EC)

CE compliance of this product is valid if powered with the correct CE-marked AC adapter provide by Avision.

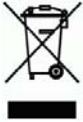
This product satisfies the Class B limits of EN55022, EN55024, safety requirements of EN 60950 and ROHS requirements of EN50581.

*This machine is certified as Class 1 LED product.



As an ENERGY STAR® Partner, Avision Inc. has determined that this product meets the ENERGY STAR guidelines for energy efficiency.

Disposal of Waste Equipment



This symbol on the product or on its packaging indicates that the product can not be disposed of with your other household waste. Instead it should be sent to appropriate facilities for recovery and recycling in an effort to protect human health and the environment. For more information about where you can drop off your waste equipment for recycling, please contact your local city office, your household waste disposal service or the shop where you purchased the product.

System Requirements

- CPU: Intel® Core™ 2 Duo or higher
- Memory: 32 bit: 2GB
64 bit: 4GB
- Optical Drive: DVD-ROM Drive
- USB Port: USB port 2.0 (compatible with USB 3.0)
- Compatible Operating System: Microsoft Windows 10 (32 bits/64 bits), Windows 8 (32 bits/64 bits), Windows 7, Windows XP(SP3), Windows Vista

Product Safety Guide

Please clearly read all these instructions, and follow all instructions and warnings before installing and using the device.

The following indications are used in this document to obviate any chance of accident or damage to you and/or the device.

 WARNING	Indicates potentially hazardous situations, which if instructions are not followed, could result in death or serious injury.
 CAUTION	Indicates a potentially hazardous situation which, if instructions are not followed, may result in minor or moderate injury or damage to property.

WARNING

- Use only the AC power adapter that came with your device. Using any other AC power adapter could cause fire, electrical shock, or injury.
- Use only the AC power cord and USB cable that came with your device and avoid abrasions, cuts, fraying, crimping, and kinking. Using any other AC power cord and USB cable could cause fire, electrical shock, or injury.
- Do not place objects on top of the AC power cord, and do not allow the AC power adapter or the AC power cord to be stepped on or run over.
- Place the device and its AC power adapter near an electrical outlet where the AC power adapter can easily be unplugged.
- If you use an extension cord with the device, make sure that the total ampere rating of the devices plugged into the extension cord does not exceed the cord's ampere rating.
- Place the device close enough to the computer so that the interface cable can easily reach between the device and the computer.

- Do not place or store the device or its AC power adapter:
 - Outdoors
 - Near excessive dirt or dust, water, or heat sources
 - In locations subject to shocks, vibrations, high temperature or humidity, direct sunlight, strong light sources, or rapid changes in temperature or humidity
- Do not use the device with wet hands.
- Never disassemble, Modify, or attempt to repair the AC power adapter, device, or device option by yourself, except as specifically explained in the device's documentation. This could cause fire, electrical shock, or injury.
- Do not insert objects into any opening, as they may touch dangerous voltage points or short-out components. Beware of electrical shock hazards.
- Unplug the device and the AC power adapter, and refer servicing to qualified service personnel under the following conditions:
 - The AC power adapter or plug is damaged.
 - Liquid has entered the device or the AC power adapter.
 - Object has entered the device or the AC power adapter.
 - The device or the AC power adapter has been dropped, or the case has been damaged.
 - The device or the AC power adapter does not operate normally (i.e. appearance of smoke, strange smell, odd noise, etc.), or exhibits a distinct change in performance
- Unplug the device and the AC power adapter before cleaning.

 **CAUTION:**

- Do not locate the device on rickety or aslope tables. Do not locate the device on unstable surface. The device may fall down and this may result in injury.
- Do not place heavy objects on the unit. It may cause unbalance and the device may fall down. This may result in injury.
- Store the AC Power cord/USB cable bundled out of the reach of children to avoid the risk of injury.
- Keep plastic bags bundled out of the reach of children or throw them away to avoid the danger of suffocation.
- If you are not going to use the device for a long period, unplug the AC power adapter from the electrical outlet.

1. Introduction

Thank you for purchasing the network scanner. Without any computer, the product allows you to scan single-sided or double-sided document(s) and deliver the electronic images to various destinations including E-mail addresses, ftp servers, network folders, or a USB drive.

What is best, with the built-in Wi-Fi module, the Avision network scanner allows your mobile devices (smartphone, tablet, etc.), wireless or wired computers in the LAN to start a scan and receive the scanned image.

Before you install and operate the new scanner, please take a few minutes to read through this manual. It provides proper instructions for you to unpack, install, operate and maintain the scanner.

1.1 Features

Scan-to-E-mail:

Connected to an ethernet network and a SMTP server, the product allows you to transmit document(s) to your E-mail as an attachment. With a specified E-mail profile, the document(s) is/are first scanned and converted into an image file, and then transmitted to remote recipients within minutes.

Scan-to-Network:

The product allows you to send the scanned documents to a network via FTP (File Transfer Protocol) or CIFS (Common Internet File System) protocol. The scan-to-folder feature off-loads the mail server from handling large attachments.

Managing the Product Remotely:

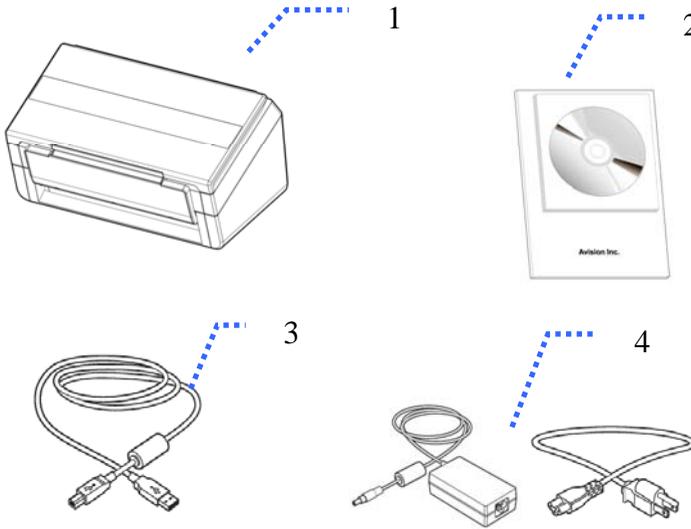
The product provides a convenient way to manage your E-mail address book, filing destinations (network folders) remotely. By simply typing the machine's IP address in the URL field of your browser, the product web page will be prompted. This web page allows the administrator to create up to 20 E-mail profiles and 20 filing destinations to conveniently deliver the scanned documents to multiple recipients.

Scanning and Saving Your Images to a USB Flash Drive:

By plugging a USB flash drive into the USB port of the product, the product allows you to scan your document and save the scanned images to your USB flash drive.

1.2 Package Items

The following figure indicates the package contents. Please check all the items against your checklist. If you do not receive all the items, please contact your authorized local dealer immediately.

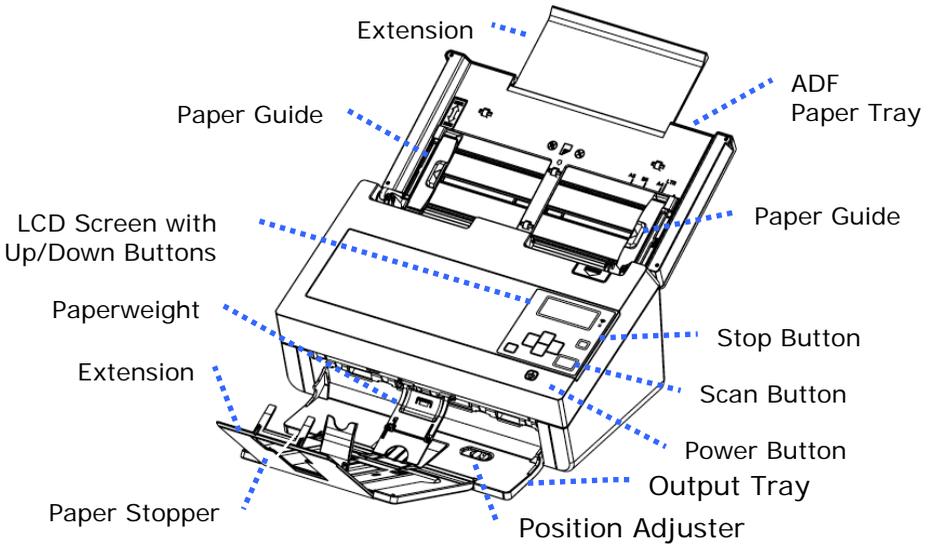


- 1. Scanner Main Unit**
- 2. Quick Guide/CD**
- 3. USB Cable**
- 4. Power Adapter & Power Cord**

Note:

1. Only use the AC adapter DA-48M24 by APD included in the machine. Using other AC adapters may damage the machine and void the warranty.
2. Please unpack the packing carefully, and check the contents against the checklist. If any items are missing or damaged, please contact your dealer immediately.
3. To access more service supports, visit www.avision.com to register your Avision's product.

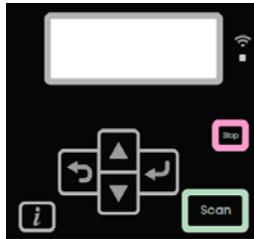
1.3 Front View



Part Name	Function
Extension	Can be pulled out and adjusted to the size of the document being scanned.
ADF Paper Tray	Load the document onto this part when scanning document.
Paper Guides	Adjusts to the width of the documents to prevent skewing of the scanned pages.
Operation Panel	LCD screen: Shows menu options and scan progress. The Power Button: Press to turn on the power. The Scan Button: Press to start a scan (BM2 Air). The Cancel Button: Press to cancel a scanning job during operation.

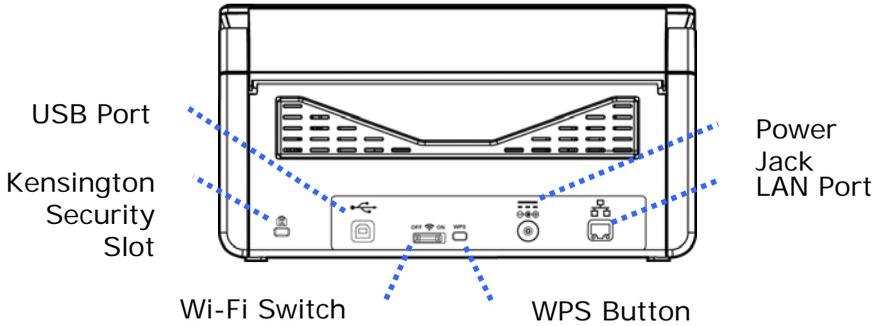
Output Tray	Open to collect the document after scanned.
Position Adjuster	Slide the adjuster inward to make the Output Tray in a flat position.
Extension	Pull it out. Documents are ejected from the ADF to the tray.
Paperweight	Used to hold down a stack of output paper.
Paper Stopper	Adjust to the length of the documents to prevent them from falling apart.

1.4 Operational Panel



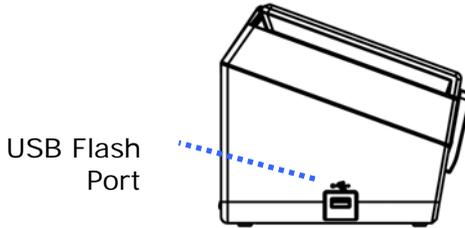
LCD screen	Used to display information and provide access to the product's functions.
Wi-Fi LED	Used to indicate the Wi-Fi status.
Stop	Used to stop an operation.
Scan	Used to start a scan.
▲ / ▼	Used to toggle through the menus or options.
Enter 	Used to enter a selection.
Back 	Used to go back to the previous level.
i 	Used to show to basic system information.

1.5 Rear View



Part Name	Function
Power Jack	Connect the AC adapter to the scanner.
LAN port	Connect the LAN cable to the scanner for wired network connection.
USB Port	Connect the USB cable to the scanner.
Kensington Security Slot	Attach to a lock to secure the scanner.

1.6 Side View



Part Name	Function
USB Flash Drive	Used to insert a USB flash drive.

1.7 Pre-installation Checklist

The product has to be setup properly on your network to perform scan to E-mail and scan to network functions. Before using the product, please setup the product properly on your network for E-mail and filing function. The following network parameters have to be set.

1. DHCP Enable:	
2. IP Address:	. . .
3. Subnet Mask:	. . .
4. Gateway IP:	. . .
5. DNS Server:	. . .
6. WINS Server:	. . .
7. SMTP Server:	
8. SMTP Port:	25
9. LDAP Server:	. . .
10. LDAP Port:	

Explanation of contents:

1. *DHCP Enable:	Choose Yes to obtain IP/subnet/gateway/DNS server/WINS server addresses automatically from DHCP server.
2. *IP Address:	The Internet Protocol (IP) address assigned to your machine by your network administrator or by DHCP server.
3. Subnet Mask:	The net mask address assigned by your network administrator or by DHCP server.
4. Gateway IP:	The gateway IP address assigned by your network administrator or by DHCP server.

5. *DNS server:	The IP address of DNS server assigned by your network administrator.
6. *WINS Server:	The IP address of WINS server assigned by your network administrator.
7. *SMTP Server:	The IP address of your SMTP mail server assigned by your network administrator.
8. SMTP Port:	The port number of your SMTP Mail Server.
9. *LDAP Server:	The IP address of your LDAP server.
10. LDAP Port:	The port number of your LDAP server.

Note:

- 1.** DHCP server: With DHCP (Dynamic Host Configuration Protocol), a host can automatically be given a unique IP address each time it connects to a network--making IP address management an easier task for network administrators. If the DHCP server is available from your network, you do not need to enter TCP/IP, subnet mask, gateway, and DNS information. Instead, this information will be automatically given for the product.
 - 2.** IP Address: An IP (Internet Protocol) address uniquely identifies a host connection to an IP network. System administrator or network designer assigns the IP address. The IP address consists of two parts, one identifying the network and the one identifying your node. The IP address is usually written as four numbers separated by periods. Each number can be zero to 255. For example, 10.1.30.186 could be an IP address.
 - 3.** SMTP: Stands for Simple Mail Transfer Protocol. It is the main communication protocol used to send and receive E-mail on the internet.
 - 4.** DNS: Stands for Domain Name System. The DNS server identifies hosts via names instead of IP addresses. If the DNS server is available on your network, you can enter the domain name instead of digits for the IP address.
 - 5.** WINS: Stands for Windows Internet Naming Service. WINS resolves Windows network computer names (also known as NetBIOS names) to Internet IP addresses, allowing Windows computers on a network to easily find and communicate with each other.
 - 6.** LDAP: Stands for Lightweight Directory Access Protocol. LDAP enables users to access directories and address books directly from external networked devices to simplify document distribution.
-

2. Scanner Installation

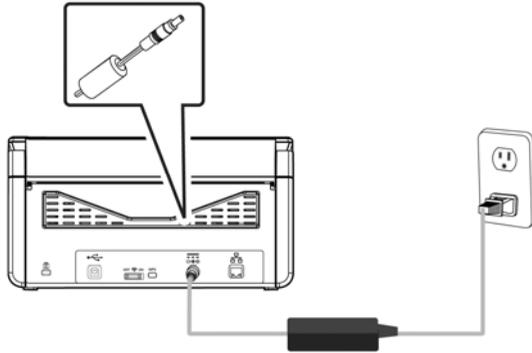
2.1 Precautions

- Keep the scanner out of direct sunlight. Direct exposure to the sun or excessive heat may cause damage to the unit.
- Do not install the scanner in a humid or dusty place.
- Be sure to use the proper AC power source.
- Place the scanner securely on an even, flat surface. Tilted or uneven surfaces may cause mechanical or paper-feeding problems.
- Retain the scanner box and packing materials for shipping purposes.

2.2 Connecting to Power

Before connecting, make sure the power switch is off.

Plug the small end of the power adaptor into the power jack of your scanner. Insert the other end to an appropriate power outlet.



2.3 Turning on the Power

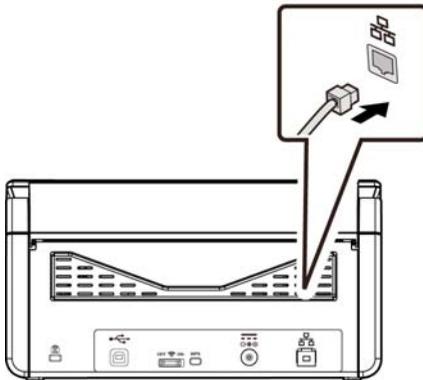
Press the **Power** Switch button on the front panel, the Power LED will flash. When it is finished and ready to scan, the LED indicator will stop flashing and become steadily on. To turn off the scanner, press the Power Switch button for about 3 seconds, the Power LED will be off.

2.4 Connecting to a Network Cable

1. Connect one end of your network cable to an available port of the switching hub of your LAN.



2. Connect the other end to the LAN port marked  at the back of the product as shown.

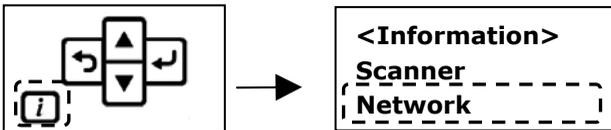


2.5 Obtaining the Product's IP Address via DHCP

If you connect the product to your computer via a network cable, you need to specify an IP address for the product. An IP address can be obtained automatically through the DHCP server by default, or you may specify a static IP address via the product's embedded web page. Please follow the steps in below to configure the IP address of the product.

To obtain the product's IP address via DHCP,

1. Turn on the scanner by pressing the Power button.
2. Press **i** key on the panel and then choose [**Network**] on the LCD screen.



3. The product's IP address through DHCP server will be displayed. (Default DHCP) (For example, 10.1.20.25)

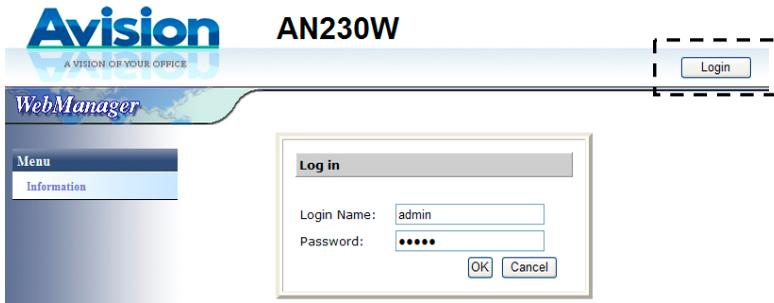
<Wired>
IP Address
10.1.20.25

2.6 Setting the Product's Date and Time

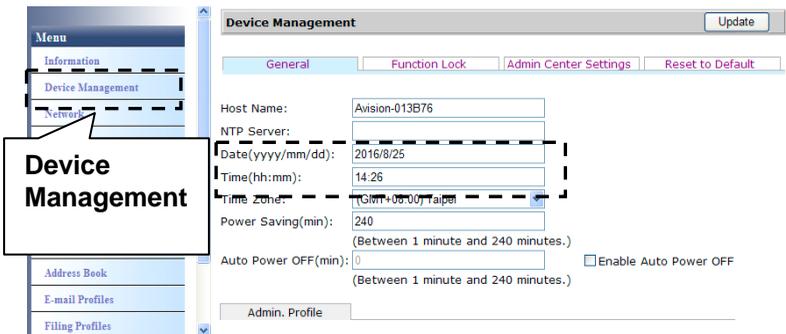
To set the product's date and time,

1. Open your browser and type the product's IP address on the URL field to prompt the product's embedded web page.

To access complete information of the web page, please login with the default user name and password – [admin]. The password can be changed later in the web page.



2. Choose [**Device Management**] > [**General**], and then revise current date and time. Or specify your NTP server.



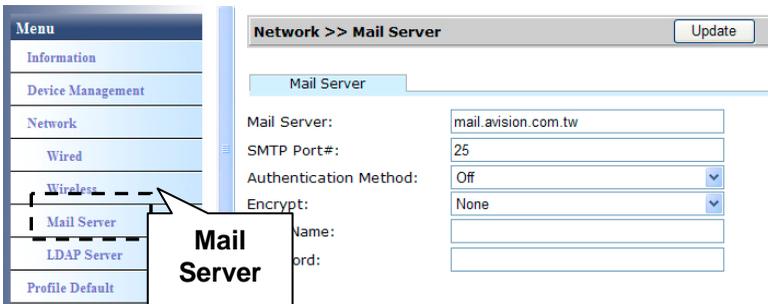
4. Click [**Update**] to save the setting and exit the page.

2.7 Specifying the Product's Mail Server

To use the scan-to-email feature, you must specify the product's SMTP server or LDAP server if you wish to import an address book from other devices.

To specify the SMTP and LDAP server,

1. On the product's web page, choose [**Network**] > [**Mail server**]/[**LDAP Server**] option to prompt the [**Mail server**]/[**LDAP Server**] page.



2. Enter your mail server information. Enter authentication information if required. (See the following screen as an example.)

E-mail Server Setting	
Mail Server	Enter the IP address of your SMTP server.
SMTP Port #	Enter the port number of the SMTP server. * 25
Device E-mail Address	Enter the device's E-mail address. If the [From] address has not been set in the E-mail setting, this address will be shown as the [From] address from outgoing mails.
Authentication Method	Enter the email authentication method. Choice: *None, SMTP, POP3

Encrypt	Choose the encryption method of your emails to the SMTP server. Choice: *None, STARTTLS, SSL/TLS
Login Name	Enter the login name for SMTP authentication.
Password	Enter the password for SMTP authentication.
LDAP Server Setting	
LDAP Server IP or URL	Enter the IP address or the URL of your LDAP server.
Port #	Enter the port number of the LDAP server. * 389
Login Name	Enter the login name of the LDAP server. Note: 1. In Microsoft Active Directory, some servers may require you to add "domain name" as your full login name. For example, if your domain name is "company" and your user name is "administrator", then your full login name is "company\administrator". 2. When your LDAP server requests an "anonymous login", please leave your login name and password blank instead of typing "anonymous" as your login name and password.
Password	Enter the password of the LDAP server.
Search Root	Enter your base DN. Base DN (distinguished name) identifies the starting point of a search. A dn indicates what record to view in an LDAP tree. The top level of the LDAP directory tree is the base, referred to as the "base DN". For example, you could indicate a base of dc=com,dc=net for a search that starts at the top and proceeds downward.

Search Attribute	cn
Obtain E-mail Address From	mail
Timeout(seconds)	The specified time to connect the LDAP server.
Authentication Type	Choice: Anonymous, Simple

Note: Please check the SMTP server and LDAP server information with your Network Administrator.

External address book

LDAP Server IP or URL:

Port#:

Login Name:

Password:

Search Root:

Search attribute:

Obtain e-mail address from:

Timeout[seconds]:

Authentication Type: ▼

3. Click [**Update**] to save the setting and exit the page.

Note:

1. The login name is case-sensitive and is up to 32 digits or characters.
2. The password is case-sensitive and is up to 16 characters.
3. LDAP Search:
 - This machine supports two types of authentication, simple and anonymous, to login your LDAP servers.
 - This machine allows up to 100 match results in a single search.
 - The attributes such as "cn" and "mail" have been predefined as the search field. Therefore, if your search text is "m", the LDAP search engine will search the name or the email address that contains the character "m". For example, you might get the return match results such as "mary, mary@abc.com", or "jack, jack@abc.com".

3. Setting Up and Managing Destinations

This section provides procedure for the administrator to setup and manage destinations including E-mail addresses or network folders to distribute the scanned document on the network.

3.1 Setting Up Your E-mail Address Book

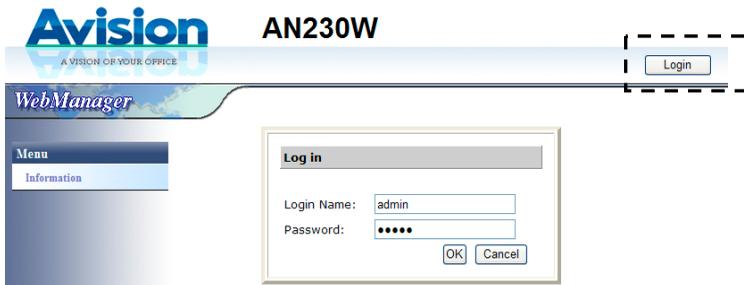
To create an E-mail Profile, you must first setup your E-mail Address Book. This section provides procedure for the administrator on how to setup E-mail Address Book.

3.1.1 Adding A New E-mail Address

Follow these steps to setup your Address Book.

1. Open your browser and type the product's IP address on the URL field to prompt the product's embedded web page.

To access complete information of the web page, please login with the default user name and password – [admin]. The password can be changed later in the web page.



2. Choose [**Address Book**] to prompt the [**Address Book**] page.

2. Choose the address you want to delete from the list and then choose [**Delete**] to erase the address. A Confirmation dialog box appears to confirm your deletion. Click [**OK**] to confirm or [**Cancel**] to exit.

3.1.3 Modifying A Current E-mail Address

To Modify a current E-mail address,

1. Repeat Step 1 to Step 2 from the previous section, *Adding a New E-mail Address*. The [**Address Book**] appears.
2. Choose the address you want to Modify from the list and then choose [**Modify**] to prompt the [**Modify E-mail Addresses**] page.
3. Modify your address information. Click [**Submit**] to save the setting or [**Quit**] to leave the page without saving any setting.

3.1.4 Adding A New E-mail Group

To send multiple addresses simultaneously at one time, you can create address group to speed up the process. Up to 20 addresses can be included in one group and a total of 20 groups can be created in the Address Book.

1. Repeat Step 1 to Step 2 from the previous section, *Adding a New E-mail Address*. The [**Address Book**] appears.
2. Click [**Group List**] and then choose [**New**] to prompt the [**Add a New Group**] page.
3. Enter your group name and its description.
4. Choose the address from the right side and click ← to add a member to the group.
5. Click [**Submit**] to save the setting or [**Quit**] to leave the page without saving any setting.

3.1.5 Deleting A Current E-mail Group

To delete a current E-mail group,

1. Repeat Step 1 to Step 2 from the previous section, *Adding a New E-mail Address*. The **[Address Book]** appears.
2. Click **[Group List]** and choose the group you want to delete from the list and then choose **[Delete]** to erase the group. A Confirmation dialog box appears to confirm your deletion. Click **[OK]** to confirm or **[Cancel]** to exit.

3.1.6 Modifying A Current E-mail Group

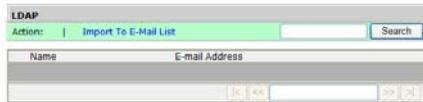
To Modify a current E-mail group,

1. Repeat Step 1 to Step 2 from the previous section, *Adding a New E-mail Address*. The **[Address Book]** appears.
2. Click **[Group List]** and choose the group you want to Modify from the list and then choose **[Modify]** to prompt the **[Modify E-mail Group]** page.
3. Modify your group information. Choose the group member you wish to add and then click **←** to add the new member or click **→** to delete an old member from the group.
4. Click **[Submit]** to save the setting or **[Quit]** to leave the page without saving any setting.

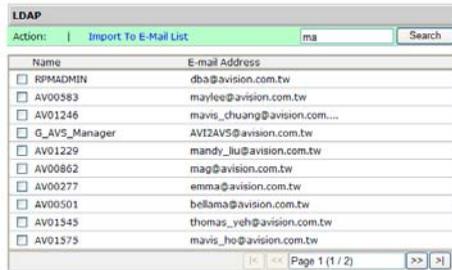
3.1.7 Importing An E-mail Address Book

To import an E-mail address book,

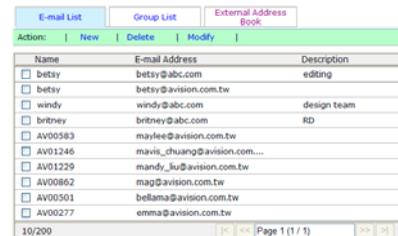
1. Repeat Step 1 to Step 2 from the previous section, *Adding a New E-mail Address*. The **[Address Book]** appears.
2. Click **[External Address Book]** to prompt the **[LDAP]** page.



3. Enter your search key word, for example, ma.
4. In a second, the search result will be displayed.



5. Choose the E-mail address which you want to import to the device and click the **[Import to E-mail List]** tab.
6. The selected E-mail addresses will be imported and included in your E-mail list as shown in below.



3.2 Setting Up Your E-mail Profiles

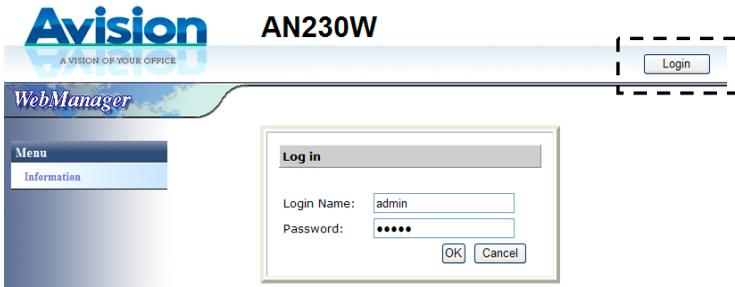
This section provides procedures to setup your E-mail profile to send the scanned document to your recipients.

3.2.1 Adding A New E-mail Profile

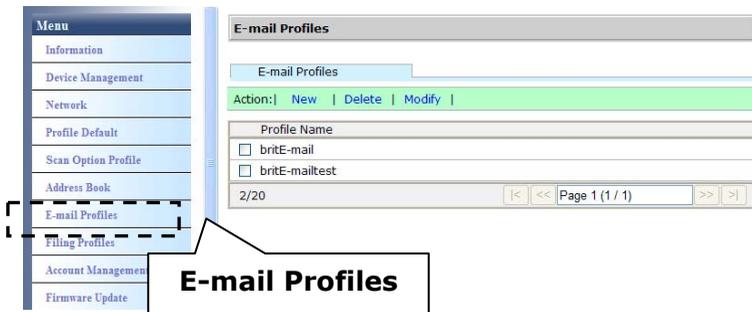
To create an E-mail Profile, follow these steps:

1. Open your browser and type the product's IP address on the URL field to prompt the product's embedded web page.

To access complete information of the web page, please login with the default user name and password – [admin]. The password can be changed later in the web page.



2. Choose [**E-mail Profiles**] to prompt the following page.



- Choose [**New**] to prompt the [**Add a New E-mail Profile**] page.



Enter the following information respectively:

Item	Description
Profile Name	Enter the name of your profile. The name will be shown in the LCD screen.
To	Select the recipient's E-mail address from the Address Book.
CC	Select the CC E-mail address from the Address Book.
BCC	Select the BCC E-mail address from the Address Book.
Subject	Type your subject.
From	Select the sender's E-mail address from the Address Book.
File Name	Enter the file name of your attachment.
Reply to	Select the E-mail address you wish to reply to.
Text	Type your email message here.
File Separation	Choice: 1MB/3M/5M/10M/30MB/Unlimited
Scan Option Profile	Choose your scan option profile. (*Default)

- Click [**Submit**] to save the setting and exit the page.

3.2.2 Deleting A Current E-mail Profile

To delete a current E-mail profile,

1. Repeat Step 1 to Step 3 from the previous section, *Adding a New E-mail Profile*. The [**E-mail Profiles**] page appears.
2. Choose the E-mail Profile you want to delete from the list and then choose [**Delete**] to erase the profile. A Confirmation dialog box appears to confirm your deletion. Click [**OK**] to confirm or [**Cancel**] to exit.

3.2.3 Modifying A New E-mail Profile

To Modify a current E-mail group,

1. Repeat Step 1 to Step 3 from the previous section, *Adding a New E-mail Profile*. The [**E-mail Profiles**] page appears.
2. Choose the E-mail Profile you want to Modify from the list and then choose [**Modify**] to prompt the [**Modify E-mail Profile**] page.
3. Modify your profile information.
4. Click [**Submit**] to save the setting or [**Quit**] to leave the page without saving any setting.

3.3 Setting Up Your Filing Profile

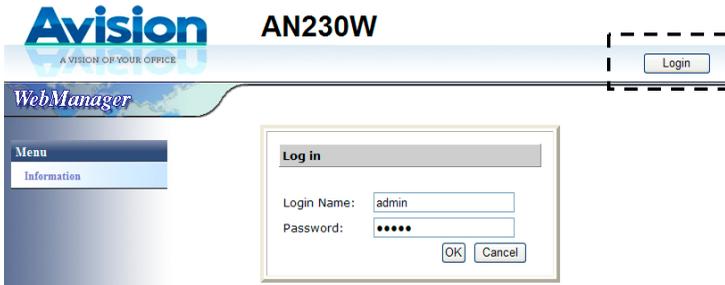
The section provides procedure on how to setup your filing profile to send your scanned document to the specified network.

3.3.1 Adding A New Filing Profile

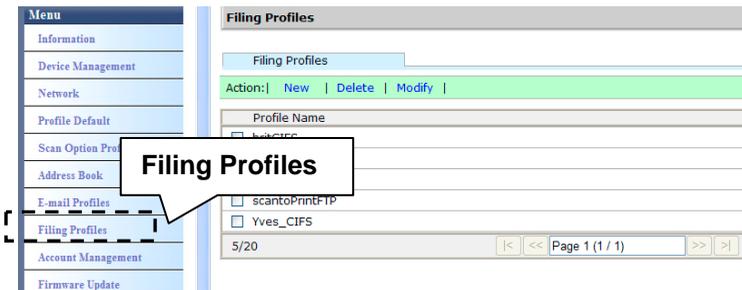
To create a Filing Profile, follow these steps:

1. Open your browser and type the product's IP address on the URL field to prompt the product's embedded web page.

To access complete information of the web page, please login with the default user name and password – [admin]. The password can be changed later in the web page.



2. Choose [**Filing Profile**] to prompt the following page.



- Choose [**New**] to prompt the [**Add a New Filing Profile**] page.

Enter the following information respectively:

Item	Description
Profile Name	Enter the name of your profile. The name will be shown in the LCD screen.
Target URL	Choose your protocol or enter the IP address and the shared folder name of network server. Choice: FTPS: //, FTP: //, CIFS: \\ FTP: If you have not established a folder in the FTP server, please do not enter the folder name in the URL address. CIFS: You must set a folder in the CIFS server or your scanned image may not be uploaded successfully.
Port	Enter the port number of the filing server. * 21 (FTP), 139 (CIFS)
Login Name	Enter the user name of the filing server.
Password	Enter the password of filing server.

File Name	<p>Enter your desired prefix for the file name. Naming Method: Prefix_YMMMDDHHMMSS_xxx.file format. For example, 「DOC_150213144840_001.pdf」 indicates 2015 (year) 2 (February) 13 (date) 14 (hour) 48 (minute) 40 (second) 001 (serial number)</p>
Report to E-mail	<p>Enter an E-mail address if you wish to send the filing report to the E-mail.</p>
Scan Option Profile	<p>Choose your desired scan option profile.</p>

4. Click [**Submit**] to save the setting or [**Quit**] to leave the page without saving any setting.

3.3.2 Deleting A Current Filing Profile

To delete a current filing profile,

1. Repeat Step 1 to Step 3 from the previous section, *Adding a New Filing Profile*. The [**Filing Profile**] page appears.
2. Choose the Filing Profile you want to delete from the list and then choose [**Delete**] to erase the profile. A Confirmation dialog box appears to confirm your deletion. Click [**OK**] to confirm or [**Cancel**] to exit.

3.3.3 Modifying A New Filing Profile

To Modify a current filing profile,

1. Repeat Step 1 to Step 3 from the previous section, *Adding a New Filing Profile*. The [**Filing Profile**] page appears.
2. Choose the Filing Profile you want to Modify from the list and then choose [**Modify**] to prompt the [**Modify Filing Profile**] page.
3. Modify your profile information.
4. Click [**Submit**] to save the setting or [**Quit**] to leave the page without saving any setting.

4. Operation

4.1 Loading Your Paper

4.1.1 Notice on Using the ADF

Before using the ADF, please make sure that your paper meets the following specifications:

- Document(s) can range in size from 50 x 50 mm (2 x 2 in.) to 216 x 356 mm (8.5 x 14 in.).
- Document(s) can range in weight from 27 ~ 413 g/m² (7 ~ 110 lb.)
- ID cards up to 1.25 mm (0.05 in.) thick
- Document(s) should be square or rectangular and in good condition (not fragile or torn).
- Document(s) should be free of curl, wrinkle, wet ink, or punch holes.
- Document(s) should be free of staples, paper clips, paper sticky notes.

4.1.2 Loading Your Document in the ADF Paper Tray

Fanning Your Document

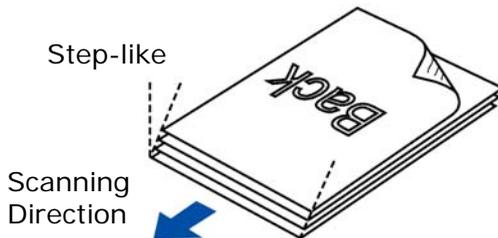
Note:

To avoid occasional multi-feeds or paper jams, please fan your documents and align the top edges before feeding them into the scanner.

1. Hold both ends of the documents and fan them a few times.

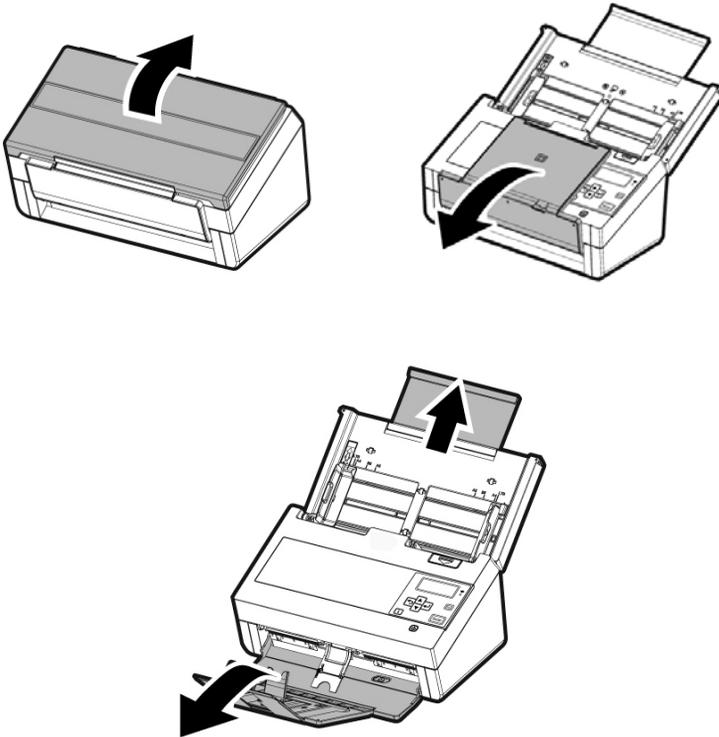


2. Rotate the documents by 90 degrees and fan them in the same manner.
3. Align the edges of the documents in a step-like pattern (see picture below).

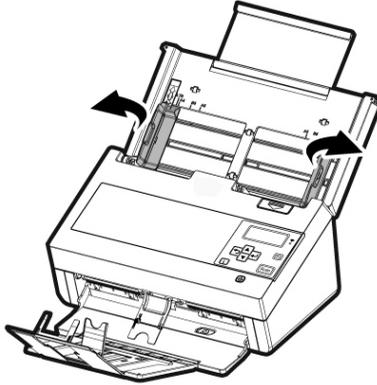


Document Feeding

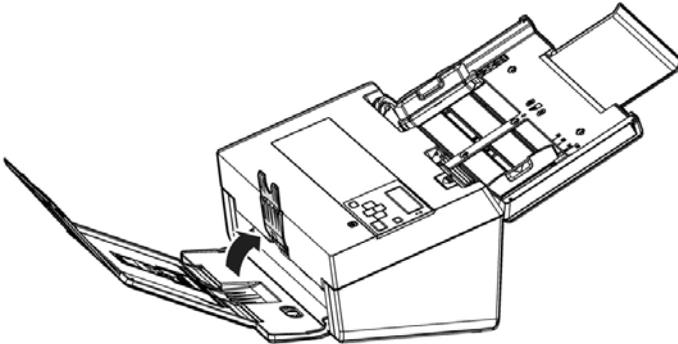
1. Unfold the document feeder and its extension.
2. Unfold the output tray and raise the paper stopper.



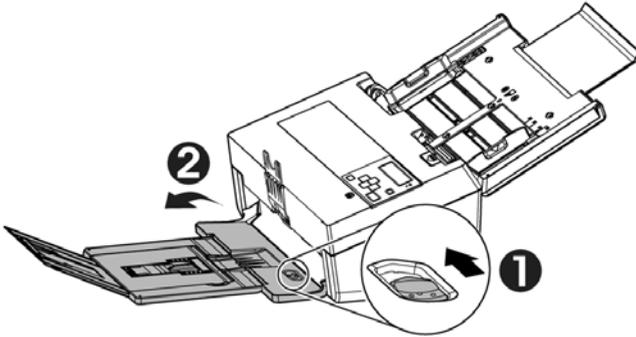
3. Raise the paper guide to hold your multi-page document.



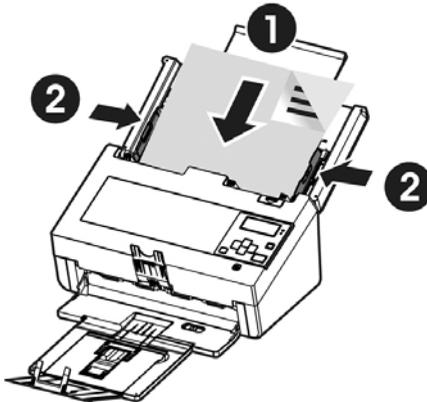
4. Raise the paperweight.



- Slide the position adjuster inward **1** to make the output tray in a flat position **2**.



- Load a stack of document **face down** with the top of the pages pointing into the feeder.



- Verify that the paper guides are aligned with the edges of the stack.

Note: The [**Paper Width**] switch:

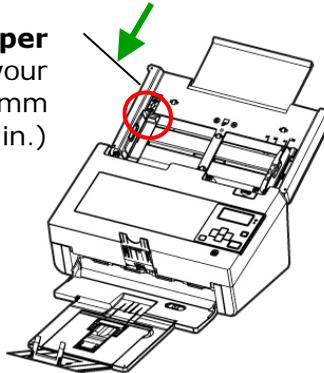
If your document width is 216 mm (8.5 in.):

If your document width is 216 mm (8.5 in.), slide the [**Paper Width**] switch **DOWN** to fix your paper guide to conveniently load the letter-size document.

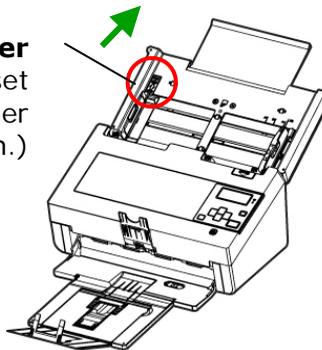
If your document width is larger than 216 mm (8.5 in.):

If your document width is larger than 216 mm (8.5 in.) such as invoices with punch holes, slide the [**Paper Width**] switch **UP** and move the paper guide to the right end to load your documents.

Slide **DOWN** the [**Paper Width**] switch to set your paper width to 216 mm (8.5 in.)



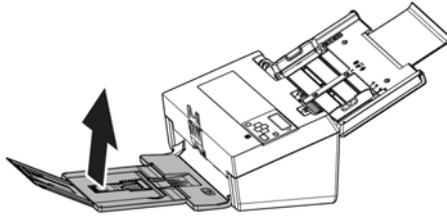
Slide **UP** the [**Paper Width**] switch to set your paper width larger than 216 mm (8.5 in.)



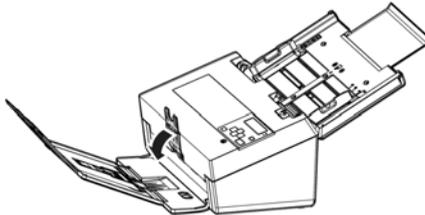
4.1.3 Scanning Cards

To scan cards, it is recommended to press down the paper weight and then raise the output tray to keep the cards from falling apart.

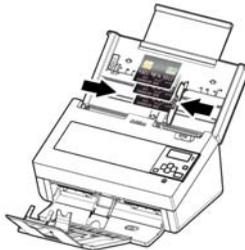
1. Lift the output tray up to make the output tray in an angled position.



2. Press down the paper weight.



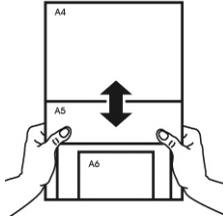
3. Load your cards horizontally into the paper tray. Align the paper guides and make sure the edges of cards slightly touch the paper guides on both side as illustrated.



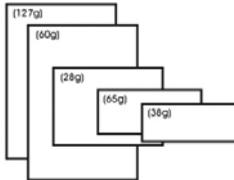
4.1.4 Scanning a Stack of Document with Various sizes and Weights

When scanning a batch of documents with different sizes and weights, be sure to follow these guidelines to avoid a skewed image or a paper jam:

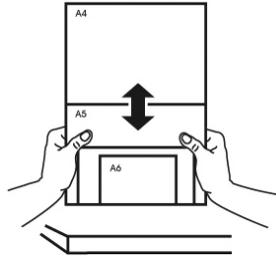
1. Align the documents **TOP EDGE** first in the sequence of paper size from large to small.



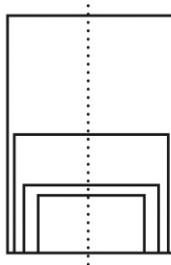
2. If two pages are of the same size yet with different weight, arrange these pages in the sequence of paper weight from heavyweight to lightweight.



- Align the edges of the documents by tapping the bottom of the stack against the table top.



- Center these pages in the document feeder and make sure that the edges of page of the largest size slightly touch the Paper Guide.



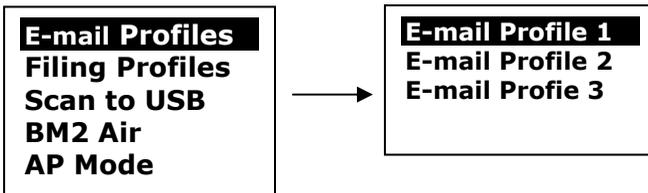
4.2 Scanning and Sending Your Scanned Image to E-mail

Before You Begin:

Before scanning and sending your scanned image as an attachment to your E-mail, make sure you have setup your E-mail profile first as described in the preceding section, **3.2 Setting up Your E-mail Profile.**

To start a scan and send the scanned image as an attachment to your E-mail,

1. Use ▼/▲ to scroll to [**Email Profiles**] on the LCD display and then press the  key. The current E-mail profile will be shown.



2. Choose the E-mail profile you wish to send the scanned image to.
3. Press the [**Scan**] button to start a scan.
4. The scanner starts feeding your document and sends the scanned image to your E-mail.



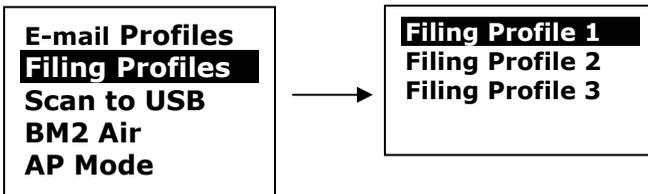
4.3 Scanning and Sending Your Scanned Image to a Network Folder

Before You Begin:

Before scanning and sending your scanned image to a network folder, make sure you have setup your E-mail profile first as described in the preceding section, **3.3 Setting up Your Filing Profile**.

To start a scan and send the scanned image to a network folder,

1. Use ▼ to scroll down to [**Filing Profiles**] on the LCD display and then press the  key. The current Filing profile will be shown.



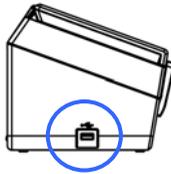
2. Choose the Filing profile you wish to send the scanned image to.
3. Press the [**Scan**] button to start a scan.
4. The scanner starts feeding your document and sends the scanned image to a specified network folder.



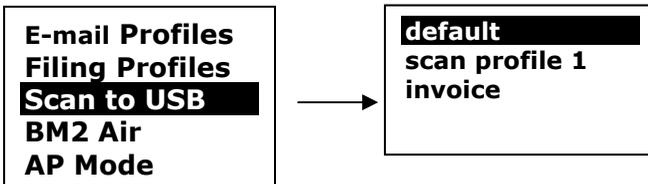
4.4 Scanning and Sending Your Scanned Image to a USB Flash Drive

To start a scan and send the scanned image to an inserted USB flash drive,

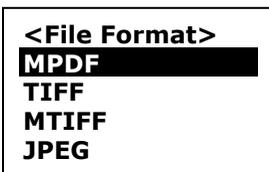
1. Insert a USB flash drive to the flash drive port on the left side of the scanner.



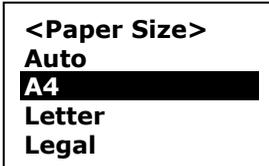
2. Use ▼ to scroll down to [**Scan to USB**] on the LCD display and then press the  key. The current scan profile will be shown.



3. Choose your desired scan profile from the list. Or choose [**default**] to check and select your desired scan settings respectively. For example, use ▼ to select your desired file format and then press the  key to go to the next item. Choice: *MPDF, TIFF, MTIFF, JPEG, PDF (*: default).



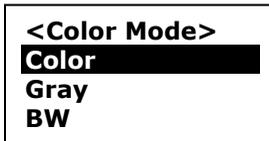
- a. Use ▼ to select your desired paper size and then press the  key to go to the next item. Choice: Auto, *A4, Letter, Legal, 4x6, 5x7. (*: default)



- b. Use ▼ to select to scan one side or two sides of your document and then press the  key to go to the next item. Choice: *Simplex (1-Sided), Duplex (2-Sided) (*: default)



- c. Use ▼ to select your desired color mode and then press the  key to go to the next item. Choice: *Color, Gray, BW (*: default)



- d. Use ▼ to select your desired document type and then press the  key to go to the next item. Choice: Photo, Text, *Mix (*: default)



- e. Use ▼ to select your desired resolution and then press the  key to start a scan. Choice: 150 dpi, *200 dpi, 300 dpi, 600 dpi (*: default)



- f. The scanner starts feeding your document and sends the scanned image to your USB flash drive.



5. Setting up and Managing Your Scan Settings for the Product

The product allows you to set various scan settings to fit your different scanning task. The scan settings include basic image processing settings, such as, color/grayscale/black and white, output file format, resolution, paper size, one-sided or two-sided.

5.1 Modifying Your Scan Option Profiles

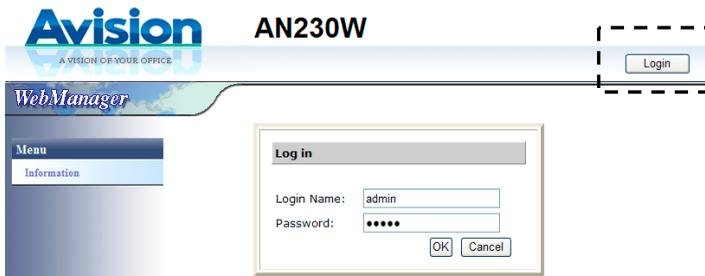
This section provides procedure for the administrator on how to setup the scan option profiles to fit a variety of scanning tasks.

5.1.1 Adding A New Scan Option Profile

To add a new scan option profile,

1. Open your browser and type the product's IP address on the URL field to prompt the product's embedded web page.

To access complete information of the web page, please login with the default user name and password – [admin]. The password can be changed later in the web page.



2. Choose [**Scan Option Profile**] to prompt the [**Scan Option Profile**] page.
3. Choose [**New**] to prompt the [**Add a New Scan Option Profile**] page.

Scan Option Profile >> New Submit Quit

Profile Name:

Document Type:

File Format:

Color mode:

Paper Size:

Resolution:

Quality/File Size:

Scan Side:

Auto-Orientation:

Refer to the following table to choose your selection respectively:

Item	Description
Profile Name	Enter the name of your profile.
Document Type	Choose your document type. Choice: *Mixed, Photo, Text Text: Suitable for document contains pure text. Photo: Suitable for document contains photos. Mix: Suitable for common business document with photo or text.
File Format	Choose your desired file format. Choice: JPEG, TIFF, MTIFF, PDF, *MPDF
Color Mode	Choose your desired color mode. Choice: *Color, Grayscale, Black and White

Paper Size	Choose your desired paper size. Choice: Auto, 4x6, 5x7, *A4, Letter, Legal
Resolution	Choose your desired resolution for your scanning task. Choice: 150 dpi, *200 dpi, 300 dpi, 600 dpi
Scan Side	Choose to scan 1-Sided or 2-Sided document. Choice: *Simplex (1-Sided), Duplex (2-Sided).

* default

4. Click [**Submit**] to save the setting or [**Quit**] to leave the page without saving any setting.

5.1.2 Deleting A New Scan Option Profile

To delete a current scan option profile,

1. Repeat Step 1 to Step 3 from the previous section, *Adding a New Scan Option Profile*. The [**Scan Option Profile**] page appears.
2. Choose the scan option profile you want to delete from the list and then choose [**Delete**] to erase the profile. A Confirmation dialog box appears to confirm your deletion. Click [**OK**] to confirm or [**Cancel**] to exit.

5.1.3 Modifying A New Scan Option Profile

To Modify a current scan option profile,

1. Repeat Step 1 to Step 3 from the previous section, *Adding a New Scan Option Profile*. The [**Scan Option Profile**] page appears.
2. Choose the scan option profile you want to Modify from the list and then choose [**Modify**] to prompt the [**Modify Scan Option Profile**] page.
3. Modify your profile information.
4. Click [**Submit**] to save the setting or [**Quit**] to leave the page without saving any setting.

6. Configuring the Product

The section provides procedure to configure system information, specify your network settings, create address book, set E-mail or Filing profile, update firmware, and export/import system data.

6.1 Configuring the Product's Device Management Information

6.1.1 Configuring the Product's General Information

To change the product's general information:

1. On the product's web page, choose [**Device Management**] > [**General**] to prompt the [**General**] page.

Device Management
Update

General
Function Lock
Admin Center Settings
Reset to Default

Host Name:

NTP Server:

Date(yyyy/mm/dd):

Time(hh:mm):

Time Zone: ▼

Power Saving(min):
(Between 1 minute and 240 minutes.)

Auto Power OFF(min): Enable Auto Power OFF
(Between 1 minute and 240 minutes.)

Admin. Profile

Login Name:

Password:

3. Refer to the following table to change the product's general information.

Item	Description
Host Name	Avision-xxxxxx: The host name for the scanner in a wired and wireless environment. Xxxxxx indicates the last six digits of the scanner's Mac address.
NTP Server	Used to specify the product's NTP server.
Date	Used to specify the product's current date.
Time	Used to specify the product's current time. The time format is 24-hour system.
Time Zone	Used to specify the time zone of your location.
Power Saving	Used to specify how long the product needs to enter the power saving mode after last action. Range: 1 ~ *240 minutes
Auto Power OFF	Used to specify how long the product needs to shut down automatically after last action. Range: 1 ~ 480 minutes
Enable Auto Power Off	Check to enable auto power off.
Device E-mail Address	Enter device's e-mail address. This address serves as [Report to E-mail] address in Filing function if you wish to send the filing report to an E-mail address.

<p>Multi-Feed Detection Def.</p>	<p>Used to enable or disable multi-feed detection via the ultrasonic unit. Ultrasonic Multi-Feed Detection allows you to set overlapped document by detecting paper thickness between documents. Choice: On/* Off</p>
<p>Return to Main Screen</p>	<p>Used to specify a timeout period after your last action to return to the main screen. Choice: *30 Sec, 1 Min, 3 Min, 5 Min Disable: Check [Disable] to set no timeout.</p>
<p>Admin Profile</p>	
<p>User Name</p>	<p>If desired, change the default user name – [admin] to login the web page.</p>
<p>Password</p>	<p>If desired, change the default password – [admin] to login the web page.</p>
<p>* : Factory Default</p>	

4. Click [**Update**] to save the setting.

6.1.2 Configuring the Product's Function Lock

The machine allows system administrator to disable the functions including multi-feed detection via ultrasonic or scan to USB.

To disable multi-feed function via ultrasonic,

1. On the product's web page, choose [**Device Management**] and then [**Function Lock**].
2. Choose [**Off**] from the dropdown box of the [**Multi-feed Detection**] option.
3. The multi-feed detection function via ultrasonic sensor will be turn off.

To disable scan to USB function,

1. On the product's web page, choose [**Device Management**] and then [**Function Lock**].
2. Choose [**Off**] from the dropdown box of the [**Scan to USB**] option.
3. The [**Scan to USB**] function will be turn off.

6.1.3 Sending the System Log

The machine allows the system log file (a file records all the events/jobs that occur in the machine) to be sent to a specified server to review the log file for troubleshooting purpose.

To send the system log file,

1. On the product's web page, choose [**Device Management**] and then [**A⁺ Manager Settings**].
2. Check [**Enable**] and then enter the IP address of the server you wish to send the log report.
3. Click [**Update**] to complete and save the settings. The system log file will be sent to the server whenever there is a new job occurs in the machine.

6.1.4 Configuring the Product's Settings to Default

The following system settings can be retrieved to factory default: Administrator and account user name and password, network settings, all configurations.

To configure the product's settings to default,

1. On the product's web page, choose [**Device Management**] and then [**Reset to Default**].
2. Choose the items you wish to configure them to default. Choice: Reset Admin, Reset Network Settings, Reset Admin and Network, Reset to Factory Default.
3. The corresponding data will be reset.

6.2 Specifying the Product's Network Settings

6.2.1 Specifying the Product's Wired Network Settings

The machine allows the system administrator to specify the following network settings: wired network settings, wireless network settings, mail server information. Follow these steps to specify the network information.

1. On the product's web page, choose [**Network**] and then [**Wired**] option to prompt the [**Wired Network**] page.

Menu
Information
Device Management
Network
Wired
Wireless
Mail Server
LDAP Server
Profile Default

Network >> Wired Update

Wired Auth. Setting

802.1x Auth. Enable: ON

Encrypt type: MD5

Login Name:

Password:

ROOT Certificate: Browse...

Client Certificate: Browse...

Client key: Browse...

Client Password: Browse...

2. Refer to the preceding section **1.7 Pre-installation check list** to specify the IP address for the product.
3. After the IP address has been specified, choose [**Update**] to complete and save the settings.

Upload Certificate:

If IEEE 802.1x authentication method has been used to access a network server, the product offers the administrator to upload the certificate information through the embedded web page. To upload the certificate files, follow these steps:

1. Download the latest certificate files from your network administrator.
1. Open your browser and type the product's IP address on the URL field to prompt the product's embedded web page.
To access complete information of the web page, please login with the default user name and password – [admin]. The password can be changed later in the web page.
2. On the product's web page, choose [**Network**] > [**Wired**] to prompt the [**Wired Settings**] page.
3. Turn on the option of [**802.1x Auth. Setting Enable**].
4. Click [**Browse**] on the item of [**Root Certificate**], [**Client Certificate**], [**Client Key**], and [**Client Password**] respectively to choose the certificate file on your computer.
5. Click [**Update**] to start updating the certificate.

6.2.2 Specifying the Product's Wireless Network Settings

1. On the product's web page, choose [Network] > [Wireless] option to prompt the [Wireless] page.
2. Refer to the subsequent section – **7.2 Connecting to a Wireless Network** to specify your wireless network settings.

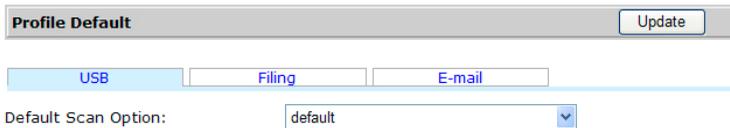
6.2.3 Specifying the Product's Mail Server Settings

1. On the product's web page, choose [Network] > [Mail server] option to prompt the [Mail server] page.
2. Refer to the preceding section - **2.7 Specifying the Product's Mail Server** to specify the mail server information.

6.3 Configuring the Profile Default for USB

To change the profile default for scan-to-USB:

1. On the product's web page, choose [**Profile Default**] to prompt the [**Profile Default**] page.



The screenshot shows a web interface for configuring the profile default. At the top, there is a header bar with the text "Profile Default" on the left and an "Update" button on the right. Below the header, there are three tabs: "USB", "Filing", and "E-mail". The "USB" tab is currently selected and highlighted in light blue. Underneath the tabs, there is a label "Default Scan Option:" followed by a dropdown menu. The dropdown menu is open, showing the word "default" as the selected option.

2. Make sure the [**USB**] tab has been selected.
3. Choose your desired default scan option from the list.

Refer to the preceding section, **5.1 Modifying Your Scan Option Profiles**, to make various scan options to fit a variety of scanning tasks.

4. Click [**Update**] to save the setting.

6.4 Configuring the Profile Default for Filing

To change the profile default for Filing:

1. Repeat Step 1 to Step 2 from the previous section, *Configuring the Profile Default for USB*. The [**Profile Default**] page appears.
2. Choose [**Filing**] to prompt the [**Profile Default for Filing**] page.

Profile Default
Update

USB
Filing
E-mail

Target URL: Ex:IP Address or DNS name

Report to E-mail:

Port:

File Name: Ex:DOC_#Y#M#D#h#m#s#n

Default Scan Option:

2. Refer to the following table to enter your desired settings.

Item	Description
Target URL	Choose the type of protocol of your filing server or enter the IP address and the shared folder name of your filing server. Choice: FTPS: //, FTP: //, CIFS: \\
Report to E-mail	Enter an E-mail address if you wish to send the filing report to the E-mail.
Port	Enter the port number of the filing server. * 21 (FTP), 139 (CIFS)
File Name	Enter your desired prefix for the file name. Naming Method: Prefix_YMMMDDHHMMSS_xxx.file format. For example, 「DOC_150213144840_001.pdf」 indicates 2015 (year) 2 (February) 13 (date) 14 (hour) 48 (minute) 40 (second) 001 (serial number)
Default Scan Option	Choose the default scan option for the scanned image of the filing profile.

3. Click [**Update**] to save the setting.

6.5 Configuring the Profile Default for E-mail

To change the default setting for scan-to-E-mail:

1. Repeat Step 1 to Step 2 from the previous section, *Configuring the Profile Default for USB*. The [**Profile Default**] page appears.
2. Choose [**E-mail**] to prompt the [**Profile Default for E-mail**] page.

3. Refer to the following table to enter your desired settings.

Item	Description
Default Subject	Enter the default subject for all outgoing mails.
Default From	Enter your default From address for all outgoing mails.
Default File Name	Enter your default file name.
Default Reply To Address	Enter your default [reply to] address for all outgoing mails.
Default File Separation	Enter the default file separation limit of the attachment file for all outgoing mails. Choice: 1MB/3M/5M/10M/30MB/Unlimited

Default Scan Option	Choose the default scan option for all outgoing mails.
----------------------------	--------------------------------------------------------

4. Click [**Update**] to save the setting.

6.6 Managing Web Site's Accounts

If the system administrator wish to add more users to access and manage the product's web page, it is possible to add more users to login the web page through account management.

To add a new account,

1. On the product's web page, choose [**Account Management**] and then [**New**] to add a new account.
2. Enter user name and password for the new account.
3. Click [**Submit**] to save the settings.
4. A new account will be shown in the list.

To Modify a current account,

1. On the product's web page, choose [**Account Management**].
2. Choose the account which you want to Modify.
3. A [**Modify**] page will be displayed. Modify your user name or password.
4. Click [**Submit**] to save the settings.

To delete a current account,

1. On the product's web page, choose [**Account Management**].
2. Choose the account which you want to delete.
3. A Confirmation dialog box will be prompted. Choose [**Yes**] to delete or [**Cancel**] to quit.

6.7 Updating the Firmware

To update the product's firmware, follow these steps:

1. Download the latest firmware file from our web page at www.avision.com to your computer.
2. Open your browser and type the product's IP address on the URL field to prompt the product's embedded web page.

To access complete information of the web page, please login with the default user name and password – [admin]. The password can be changed later in the web page.

3. On the product's web page, choose [**Firmware Update**] to prompt the [**Firmware Update**] page.
4. Click [**Browse**] to choose the firmware file on your computer.
5. Click [**Update**] to start updating the firmware.
6. Turn off and then turn on the scanner to complete the firmware update.

6.8 Exporting and Importing System Data

To easily manage several AN230W in the network, the machine provides a useful feature to allow system administrator to export the system data of one AN230W into a file and then import this data to other AN230W in the network.

For example, the address book, filing profile, and default systems settings of one AN230W can be first exported to a file as a backup and then import these files to other AN230W.

Follow the procedure described in below to export and then import your system data.

6.8.1 Exporting System Data

To export system data,

1. On the product's web page, choose [**Import/Export**].
2. Choose the system data you want to export. Choice: Address Book, Filing Profile, Settings (Device Management, Account Management, Mail Server/LDAP Server, E-mail Default, Filing Default).
3. Choose [**Export Now**]. The selected system data will be exported into a file. If [**address book**] is selected, an AN230W_addressbook.csv file will be generated. If [**filing profile**] or [**settings**] is selected, an AN230W_profile.json or AN230W_setting will be generated...
4. Save the exported file into your computer as a backup.

6.8.2 Importing System Data

To import system data,

1. On the product's web page, choose [**Import/Export**].
2. Choose the system data you want to import. Choice: Address Book, Filing Profile, Settings (Device Management, Account Management, Mail Server/LDAP Server, E-mail Default, Filing Default).
3. On the Importing option, choose [**Browse**] to locate the system data which you have been previously exported.
4. Choose [**Import Now**] to start importing the system data to your machine. The current system data will be overwritten.

7. Starting a Scan from Your Mobile Device

With a built-in Wi-Fi module, the scanner can be converted into a wireless device. When a mobile device is use, the scanned images can be received from the mobile device.

7.1 Making Preparation

To connect the scanner to a wireless LAN, prepare the followings:

- **An environment in which a wireless LAN is available**

When connecting the scanner to a wireless LAN, you may need information for a wireless access point such as an SSID (network name) and a security key (password). For details, contact your Network Administrator or refer to the manual for the wireless access point.

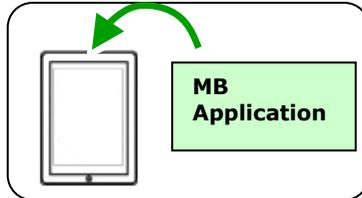


Attention!

Do not place obstacles that block radio waves (e.g. walls or metal plates) or devices that cause radio wave interference (e.g. cordless phones) within 100 mm of the scanner, or near your wireless access point.

- **MB Application**

Download the **MB Application** on your mobile device from an application store such as Google Play.



7.2 Connecting to a wireless network

7.2.1 Connect to a Wi-Fi network in an AP (Access Point) mode

In AP (Access Point) mode, your mobile devices and the scanner are connected wirelessly without an additional AP (Access Point) since the scanner itself works as an AP.



1. Turn on the Wi-Fi switch on the back of the scanner. The Wi-Fi LED light will be flashing and then turn solidly on.
2. On the control panel of your scanner, use ▼ to scroll down to **[AP Mode]** and then press  to select it.

Filing Profiles
Scan to USB
Scan to PC
AP Mode

3. The SSID and IP Address will be displayed.

SSID:
Avision-DFAF37
IP Address:
192.168.2.101

Note:

The IP address 192.168.200.1 is the permanent IP address for the scanner when it connects to a wireless network in AP mode.

4. On your mobile devices, make sure Avision-xxxxxx (xxxxxx indicates the last six digits of the Mac Address) has been selected as your network name (SSID).

7.2.2 Connect the scanner to a Wi-Fi network in a client mode (default mode)

In a Client mode, your mobile devices and scanner are connected wirelessly through an additional AP (Access Point). This mode is also the default wireless mode.

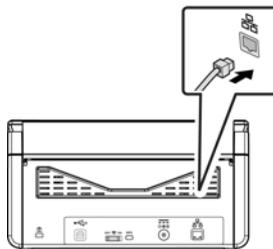


Connect Your Scanner to an AP (Access Point):

Important:

Note to connect the scanner in a wireless network, please first disconnect the Ethernet cable connecting to your scanner.

- a. Connect the scanner to a wired network via a network cable.

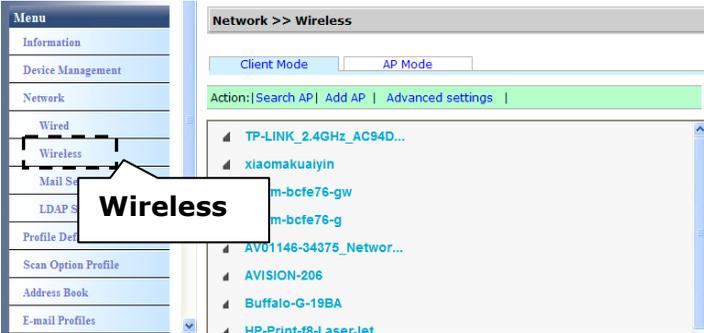


- b. Make sure the Wi-Fi LED light is flashing. If not, turn on the Wi-Fi switch on the back of the scanner. The Wi-Fi LED light will be flashing.

- c. Press the [F1] button on the control panel and then choose [Network]. The IP for the wired network will be displayed.

<Wired>
IP Address:
10.1.20.119
Mac Address:

- d. Open your browser (i.e. 10 or above).
- e. Type ETHERNET IP address on the URL bar (for example, <http://10.1.20.119>) to prompt the embedded web page. Choose [Network Settings]>[Wireless] to prompt the wireless page.



- f. Select an AP(Access Point) and click [Connect] Connect the scanner to a specified Access Point, for example, SMCWBR14S-NL.



- g. In a few seconds, if the connection is successful, the connected Access Point will be marked with **[connected]** as shown.



Note:

1. The product does not allow the wired and wireless mode to work at the same time. Therefore, once the scanner has successfully connected to a wireless access point, the webpage which you have just connected via the Ethernet cable can no longer work.
2. If you want to make the web page available to Modify the settings or connect the scanner to another wireless access point, please follow these steps to prompt the scanner's web page:
 - 1). On your wireless computer or device, select the same AP (access point) as the scanner. For example, SMCWBR14S-NL.
 - 2). Open the browser of your wireless device.
 - 3). Type the wireless IP address for the scanner (press the [i] button on the control panel to find the wireless IP address) on the URL field. The scanner's web page will be prompted.
 - 4). Modify the settings or follow step e ~ g to connect the scanner to another AP (access point).

Note:

If your access point is set to not broadcast the SSID, you will have to manually add the SSID name on the product's web page.

1. Connect the Ethernet cable to the LAN port on the back of the scanner.
2. Open your browser and type the wireless IP address on the URL field.
3. Choose [**Network**] > [**Wireless**] > [**Add AP**] on the product's embedded web page and enter the SSID name/security mode/encryption type/network key and then click [**Apply**] to search the wireless network manually.

Add AP

SSID	<input type="text"/>
Security mode	OPEN ▾
Encryption type	NONE ▾
Key index	1 ▾
Password	<input type="password"/>

Apply

Your scanner supports the following authentication methods:

Security mode	Encryption method	Key Index
WEPAUTO	WEP	1, 2, 3, 4
WPAPSK	TKIP, AES, TKIPAES	X
WPA2PSK	TKIP, AES, TKIPAES	X
WPA1PSKWPA2PSK	TKIPAES	X

7.2.3 Connect to a wireless access point using the WPS button

You may connect the scanner to a WPS compatible wireless access point by pressing the WPS button on the back of the scanner.

Before You Begin!

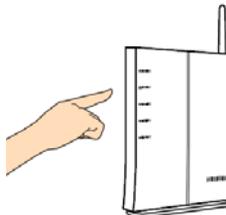
To enable the WPS connection of your access point, please refer to the user's guide of your access point.

Perform the following procedure to connect.

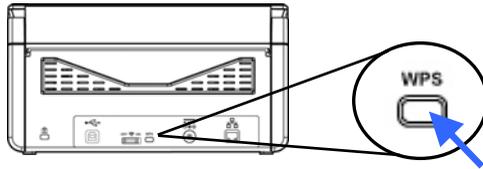
1. Confirm your wireless access point/router has the WPS or AOSS™ symbol as shown below.



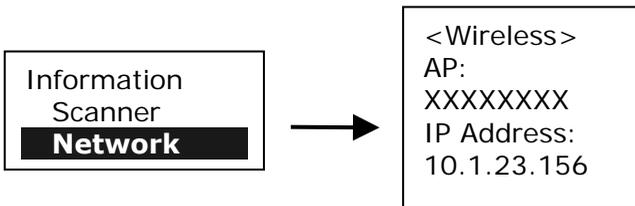
2. Turn on the Wi-Fi switch on the back of the scanner. The Wi-Fi LED light will be flashing.
3. Press the WPS button of your wireless access point. (You may refer to the user's guide of your access point/router for instructions on how to use the WPS button.)



4. Press and hold the WPS button on the back of the scanner for about 5 seconds within 2 minutes after pressing the WPS button of your wireless access point.



5. If the connection is successful, the Wi-Fi LED light of the scanner will turn solidly on.
6. Check the AP name and IP address of the scanner by pressing the [F] button on the scanner and then use ▼ to scroll down to [Network] and then press ↩ to select it.

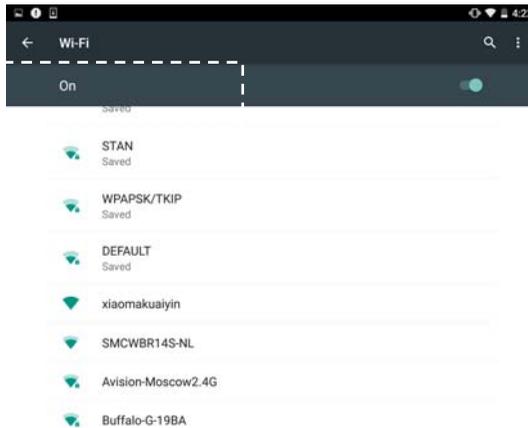


If the AP name is your selected AP, it means the wireless connection via the WPS button is successful.

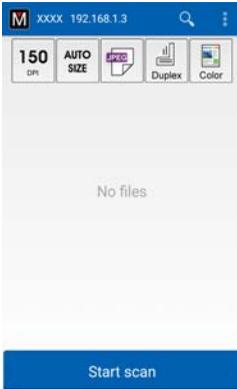
7.3 Scanning a document from a mobile device

Make sure that the **MB Application** (Scan App) has been installed on your mobile device. The **MB Application** can be purchased for free from an application store such as Google Play.

1. Enable [**Wi-Fi**] from [**Settings**] of your wireless computer, smartphone, or tablet and then choose the same network name (SSID) of your scanner. For example, SMCWBR14S-NL.



2. Tap the **MB** app () on the screen to launch the Scan Application. The main window will be displayed and the application will automatically search a scanner in the same wireless LAN. If successful, [**Start scan**] will be displayed at the bottom as shown below.



ATTENTION:

If the scanner is not found, please check the followings:

1. The scanner is not ready yet.
Tap [**More Settings**] and then [**Search scanner**] to search the scanner again.
2. Check if the mobile device and the scanner are in the same wireless LAN.

3. Check if the default settings meet your requirements. If not, change the scan settings to fit your specific scanning task.

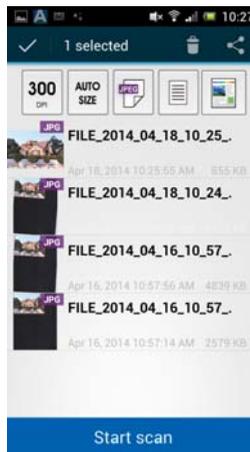
Item	Description
	Resolution: Select your desired resolution. The higher resolution, the greater the image quality and disk space. Choice: *150, 200, 300 dpi
	Scan Size: Select your paper size or you may choose Auto to let the scanner detect your document size automatically. Choice: *Auto size, A4, LTR (Letter), LGL (Legal), 4x6, 5x7
	File Format: Select the file format for your image. Choice: *JPEG, PDF, TIFF Note: <ul style="list-style-type: none"> • The JPEG file does not support the B&W image. • The TIFF file format supports only the B&W image.

	<p>Select to scan the front side (simplex) or both the front side and the rear side (duplex) of your document.</p> <p>Choice: *Simplex, Duplex</p> <p>Note: The duplex mode is available to scan from the auto document feeder only.</p>
	<p>Color Mode: Select your desired image mode.</p> <p>Choice: *Color, B&W, Gray</p>

* Default settings

4. Load a page to the auto document or place a page on the flat bed.
5. Tap the [**Start scan**] button. (Choose your scanner if there is more than one scanner connected to the network). In a second, the scanner begins scanning the document and the thumbnail scanned image will be displayed.

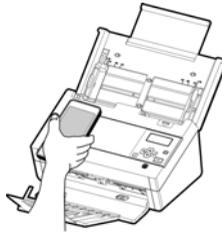
The
Thumbnail
Image



6. Tap the thumbnail image to view the entire image.

7.4 Scanning From A NFC-Enabled Mobile Device

The scanner supports NFC (Near Field Communication), a short-range wireless communication technology. By placing an NFC-enabled mobile device over the NFC mark on the operation panel of the scanner, you can start a scan and receive images directly from your mobile device.



Before Using the NFC Function:

1. Download and install "MB" App. The Scan App can be purchased for free from Google Play.
2. Make sure Wi-Fi is enabled for the scanner.

Scanning with the NFC Function

1. Load a document facing down to the feeder of the scanner.
2. Hold your mobile device against the NFC logo on the operational panel of the scanner.
3. If the NFC connection is successful, the MB app on your mobile device will be started.



4. Modify the scan settings to suit your need.
5. Tap “Start scan” to start a scan.

Note:

The NFC function has to work while the Wi-Fi is enabled for both the scanner and your mobile device or the following conditions will occur:

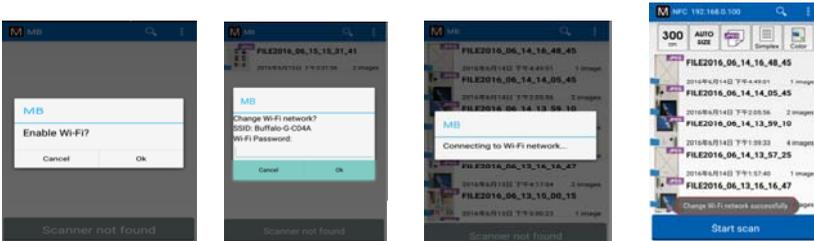
- If Wi-Fi has been enabled yet no Access Point has been connected or if Wi-Fi has not been enable on your scanner, the MB app will be launched and displayed “No Wi-Fi information”. Tap “OK” and close the MB app.



Solution:

On your scanner, enable Wi-Fi and then select an Access Point.

- If Wi-Fi has not been enabled on your mobile device, the MB app will guide you to enable Wi-Fi and then connect to the Access Point as illustrated in below:



1. Enable Wi-Fi 2. Select SSID 3. Connecting Wi-Fi 4. Ready to scan

Important:

- Your mobile device must support NFC.
- Make sure you turn on the NFC function on your mobile device and your scanner.
- If your mobile device is not recognized, reposition your mobile device over the NFC logo and try again.
- The screen and message displayed may vary depending on your mobile device.

8. Using the Product as a Regular Scanner

8.1 Installing the Scanner Driver

NOTE:

- 1). To ensure your computer can identify the USB scanner, please install scanner driver first before connecting the scanner to your computer.
 - 2). The scanner driver contains TWAIN, and WIA driver. After the installation of scanner driver is completed, this scanner allows you to scan via a TWAIN, or a WIA interface. Start your TWAIN-compliant image editing software application to select a TWAIN or WIA user interface to start a scan. You may also launch Microsoft's Scanner and Camera Wizard to scan via a WIA user interface.
-

1. Place the supplied CD-ROM onto your CD-ROM drive.
2. The software installation graphic appears. If not, run **"setup.exe"**.



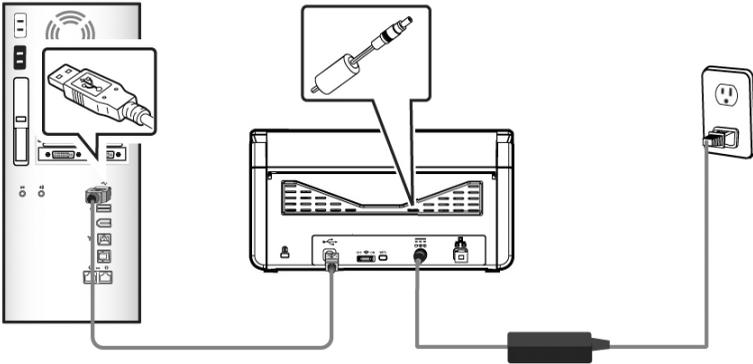
Contents on the installation graphic:

- **Install Scanner Driver:** To communicate with your scanner, you need to install the scanner driver.
 - **Install Button Manager V2:** To use the buttons on the scanner, you need to install Button Manager V2. To ensure Button Manager V2 works properly, please FIRST install scanner driver before installing Button Manager V2.
 - **Install Virtual Scanner Link:** To connect your computer to the scanner in the network, you need to install the Network Setup Tool.
 - **Install Adobe Reader:** To view the user's manuals for the scanner and Button Manager V2, you need to use Adobe Reader to open and view the manuals in pdf file format. If you already have Adobe Reader installed on your computer, you may disregard this item.
 - **Install AVScan X:** To scan and organize your multi-page document(s), you can install the software application to manage them easily and effectively.
 - **View Manual:** Click "**View Manual**" to view or print the detailed user manual for the scanner and Button Manager V2 respectively.
3. Click **Install Scanner Driver** to install the scanner driver and then click **Install Button Manager V2** to install the Button Manager V2 unto your computer.

8.2 Connecting to Computer

Via a USB Cable

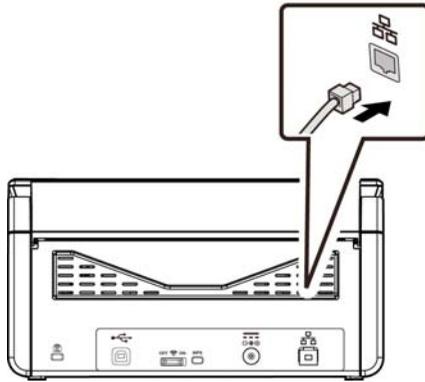
1. Connect the **square end** of the USB cable to the USB port of your scanner. Connect the **rectangle end** to the USB port at the rear side of your computer.



2. The computer should detect a new USB device and prompt a **"New Hardware Found"** message.
3. By following the on-screen instructions, click the **Next** button to continue. When the certification screen appears, click **Continue Anyway** to complete the installation.
4. When the **Finish** dialog is prompted, click the **Finish** button.

Via a Wired Network

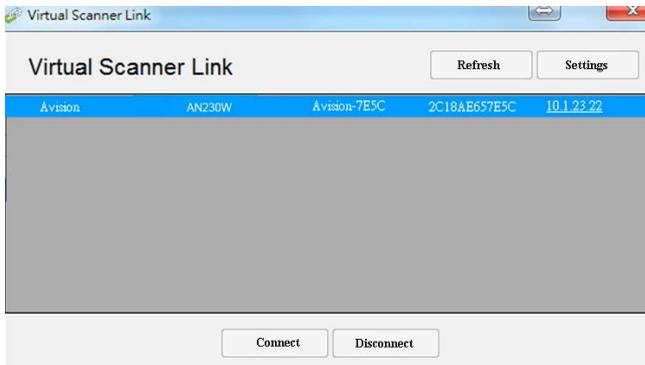
1. Connect one end of your Ethernet LAN cable to an available port of your Ethernet Hub.
2. Connect the other end to the port marked  at the back of the product.



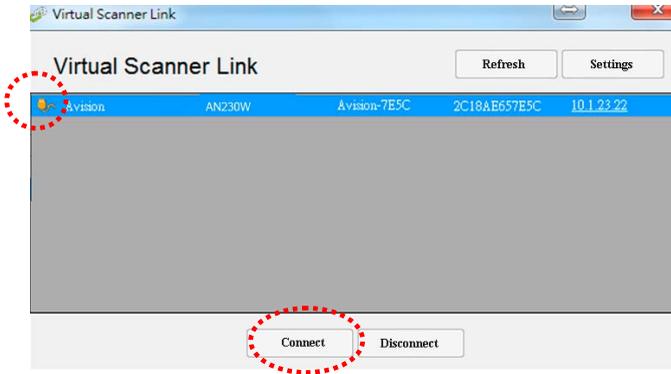
8.3 Connecting to the Network Scanner

Before connecting to the network scanner, make sure that Virtual Scanner Link (Network Setup Tool) has been installed onto your computer. The Network Setup Tool is included in the supplied software CD.

1. Start [**Virtual Scanner Link**] by choosing **Start>All Programs>Avision Virtual Scanner>Virtual Scanner Link**. The main window will be displayed and the scanners in your network will be searched automatically. In a few seconds, the result including the scanner model and scanner's IP address will be displayed as shown.



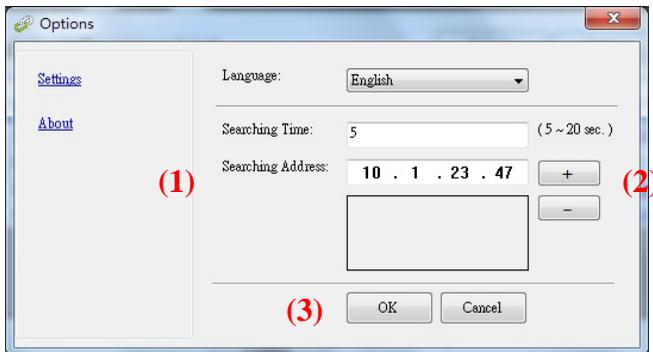
2. Choose the scanner you wish to connect and then press [**Connect**]. If connection is successful, a connection mark will be displayed as shown.



3. After the scanner has been connected successfully, launch your TWAIN-compliant image-editing software application to start a scan.

Note:

- The network scanner can be used by one user at a time. If the network scanner is being used by other user, you will be prompted with a message to connect the scanner later. When the scanner is available, you will also be prompted with a message to connect the scanner and start scanning your document.
- If the network scanner has not been found, it is probably the scanner and your computer are not in the same LAN. In this case, you can assign a specific IP address of the scanner to let [Virtual Scanner Link] automatically search the scanner. Click the [Option] button, type your IP address on the [Searching Address] field **(1)**, then click the [+] button **(2)** and finally click [OK] **(3)** to complete.



- Searching Time: When the program is launched, it automatically searches the scanner in the network in 5 seconds (default). The searching time can be changed from a range of 5 to 20 seconds.
- If the [**Virtual Scanner Link**] program has been closed and then launched again, [**Virtual Scanner Link**] will automatically search and connect the network scanner it has previously connected to.

8.4 Verifying Your Scanner Installation

To verify if your scanner installation is correct, Avision provides you a useful test program called Avision Capture Tool. With this tool, you can perform simple scans and view the captured images. In addition, it helps you complete your scan at a rated speed.

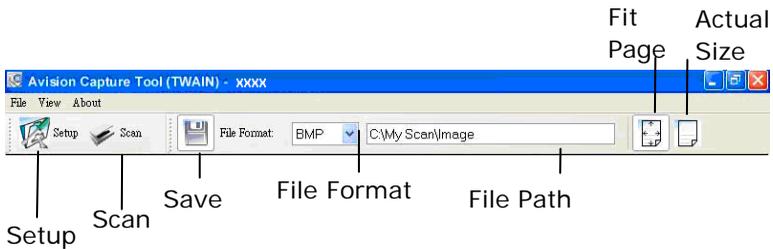
The following procedure describes how to verify your scanner installation. If the installation is not correct, please review the preceding section to check if the cable connection and scanner driver have been successfully installed.

Before you begin, be sure the scanner is on.

2. Select Start>Programs>Avision xxx Scanner>Avision Capture Tool. The Select Scanner Model dialog box will be displayed.



3. Select your driver type and scanner model and click OK. The following Avision Capture Tool dialog box will be displayed.

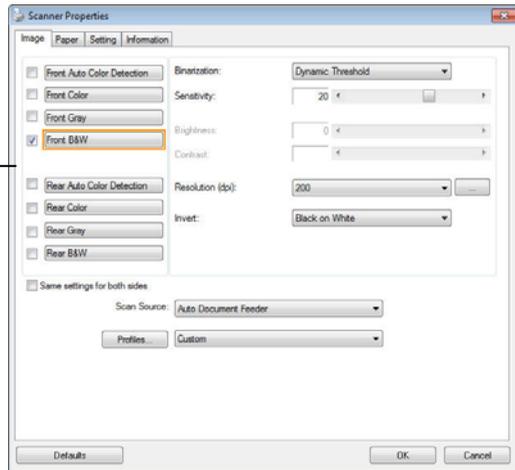


4. Choose your desired file format from the File Format drop down list box. (Default is JPEG, other choice includes TIFF, MTIFF, PDF, MPDF, GIF, and BMP.) The supported file formats vary depending on your scanner model.
5. Type your desired folder name and file name in the File Path box. (Default is C:\Documents and Settings\User Name\My Documents\My Scan\Image.)

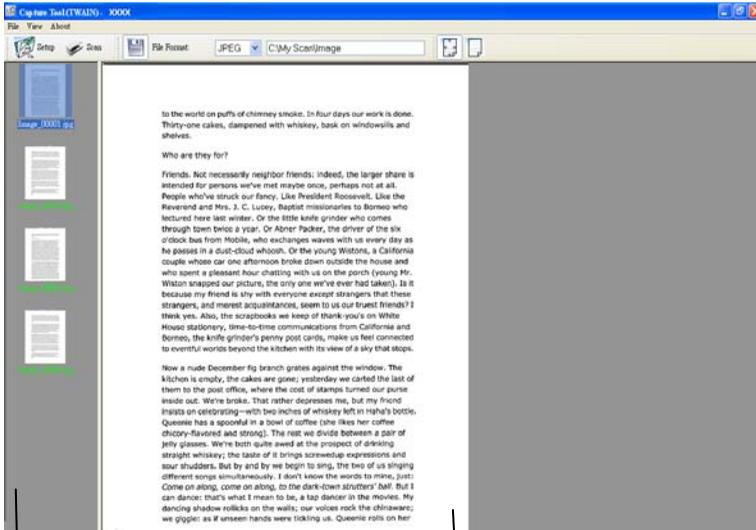
Note: If you do not wish to save the scanned image, deselect the Save button since default is Save Enable. In this case, the thumbnail view will be disabled. And therefore, after viewing all the scanned images, only the last one will remain on the screen.

6. Click the Setup button () or choose Setup from the File menu to prompt the Scanner Properties dialog box.

Image
Selection
Box



7. From the Image Selection Box, choose your desired image type for your scanned image. (Default is Front B&W) If you have a duplex scanner, choose Front and Rear to scan both sides of your document.
8. Click OK to quit the Scanner Properties dialog box. (To learn more details about the Scanner Properties dialog box, please see the subsequent chapter, *Using the Scanner Properties Dialog Box*.)
9. Place your document face down on the document glass or face up in the auto document feeder.
10. In the Scan Validation dialog box, click the Scan button () or choose Scan from the File menu.
11. The document will be scanned and displayed in the Scan Validation screen. After the scanned images have been displayed, your scanner installation verification is completed.



Thumbnail View

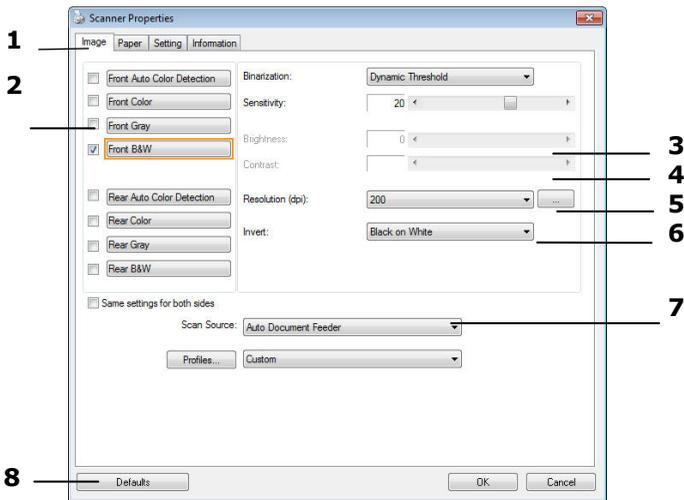
Display View

12. You can view the scanned image in Fit Page () or

Actual Size (100%) button () from the Viewing toolbars at the right side.

13. Click the Close box or Quit from the File menu to exit the Scan Validation Tool.

8.5 A Glance of the Scanner Properties Dialog Box

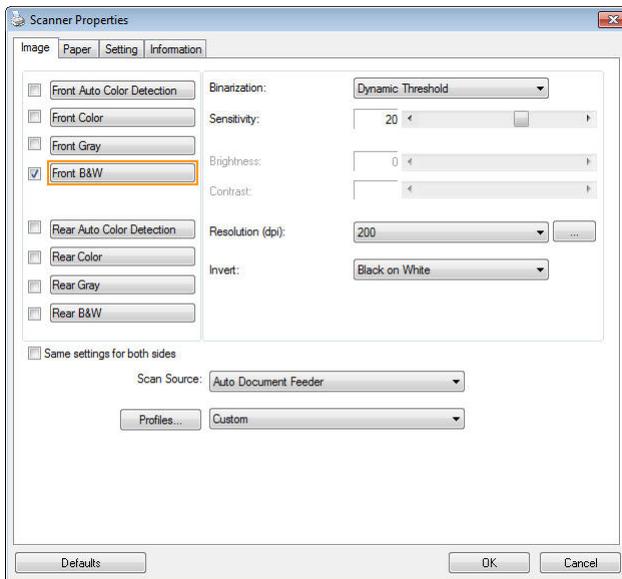


1. Tab Options	Choice: Image, Compression, Color Dropout, Paper, Multi-Feed Detection, Preview, Options, Settings, Information.
2. Image Selection Box	Choose your image type and the side of document you wish to scan. Options vary based on type of scanner.
3. Brightness	Adjust the brightness level from –100 to +100.
4. Contrast	Adjust the contrast level from –100 to +100.
5. Resolution	Determine the quality of the scanned image. The industry standard is 200 dpi.
6. Invert	Reverse the color of your scanned image.
7. Scan Source	Choice: Auto Document Feeder, Flatbed, Flatbed (Book), Automatic (varies due to different scanner model)
8. Defaults	Reset all values on the tabs to the factory default settings.

9. Using the Scanner Properties Dialog Box

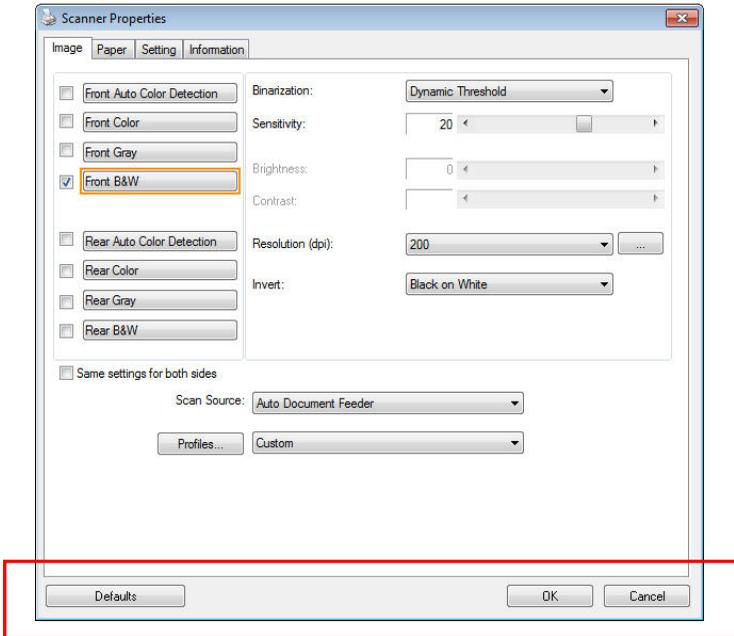
The Scanner Properties dialog box allows you to configure the scanner's settings. It consists of several tabbed windows each of which will be described in this chapter.

Note: In this chapter, all options are available based on a duplex (double-side) scanner. If you have purchased a simplex (single-side) scanner, all options are available for single sided only.



The Scanner Properties dialog box

9.1 Buttons on the Scanner Properties Dialog Box



The buttons on the Scanner Properties dialog box

Buttons	Description
Defaults	Click the Defaults button, the factory default settings will be shown on each tab.
Cancel	Click the Cancel button to leave the Scanner Properties dialog box.

The following table shows the default settings :

Tab name	Default settings
Image	Image : Front B&W Binarization : Dynamic Threshold Resolution : 200 dpi Invert : Blank on White Scan Source : Auto Document Feeder Threshold : None Brightness : None Contrast : None
Compression	None
Color Dropout	None
Paper	Cropping : Automatic Deskew : Yes Orientation : Portrait OverScan : 0.00 Note: The availability of this option varies due to scanner model. Unit : Inch
Multi-Feed Detection	None
Preview	None
Options	Rotation Degrees : None Blank Page Removal : None Edge Fill : White · 0 mm Image Control Option : None
Setting	Enable Energy Saver : Enable, 15 minutes after last scan action Show Scanning Progress : Yes Show Warning Message : Yes Save Settings after Closing : Yes
Imprinter	Digital Imprinter

9.2 Showing or Hiding Tabs

The [**Scanner Properties**] dialog box is displayed in default with three basic tabs - Image, Paper, and Information. To show more tabs, click the [**Scanner Properties**] icon to access more scan settings.

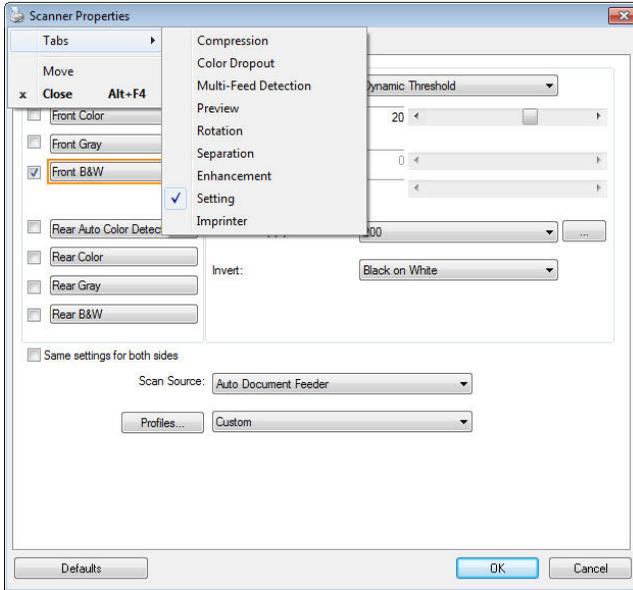
To show more tabs,

1. Click the [**Scanner Properties**] icon () on the upper left corner, and choose [**Tab**] to show available tab names. The available tabs include Compression, Color Drop out, Preview, Rotation, Separation, Multi-Feed, Options, Settings, and Imprinter. (Note: the options vary based on scanner model.)
2. Choose the tab you want to display. The selected tab will be shown with a check mark and then displayed in the [**Scanner Properties**] dialog box.
3. To access the settings, click the selected tab on the top of the [**Scanner Properties**] dialog box. The page of the selected tab will be displayed.

To hide a tab window,

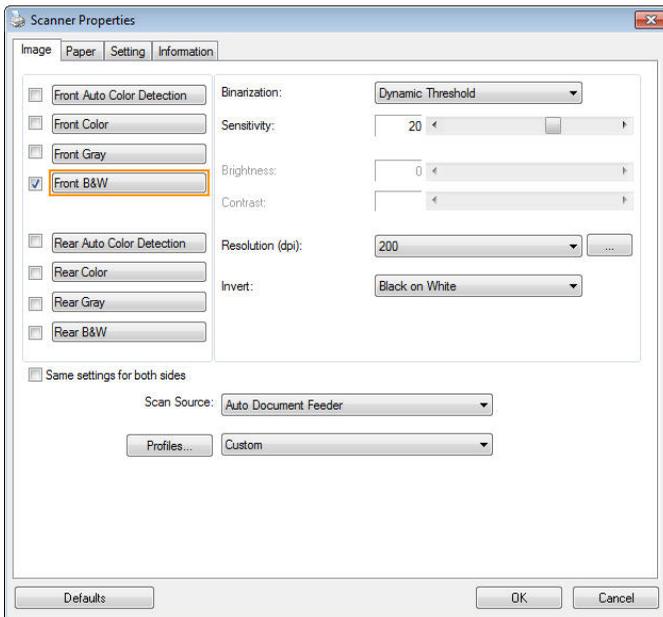
1. Click the [**Scanner Properties**] icon () on the upper left corner, and choose [**Tabs**] to show available tab names.
2. Choose the tab you want to hide. Then, the selected tab will be hidden in the [**Scanner Properties**] dialog box.

Note: The [**Image**], [**Paper**], and [**Information**] tab can not be hidden since they are preprogrammed to be displayed by default.



9.3 The Image Tab

The Image tab allows you to choose the front side and (or) the rear side of your document, the type of image, and to set several basic scan settings. Note that except for the resolution, you can set individual scan settings for the front side and the rear side. For example, all settings in the Image tab, Compression tab, Color Dropout tab can be set individually for the front and the rear side. However, the settings in the Paper tab, the Option tab, and the Setting tab have to be set the same for the front and rear side.



The Image tab dialog box

9.3.1 The Image Selection Box

Front Auto Color Detection
 Front Color
 Front Gray
 Front B&W

 Rear Auto Color Detection
 Rear Color
 Rear Gray
 Rear B&W

The Image Selection box includes the image type and document side option. If you wish to scan both the front side and the rear side of your color document, you can check both Front Color and Rear Color at the same time. Note the options vary based on type of scanner.

Example 1 : Scanning a two-sided color document, both sides in color

Front Auto Color Detection
 Front Color
 Front Gray
 Front B&W

 Rear Auto Color Detection
 Rear Color
 Rear Gray
 Rear B&W

Side/Image Selection



Front



Rear

Example 2 : Scanning a two-sided color document, one in B&W, the other in color

Front Auto Color Detection
 Front Color
 Front Gray
 Front B&W

 Rear Auto Color Detection
 Rear Color
 Rear Gray
 Rear B&W



Front



Rear

Side/Image Selection

Image Type	Description
Color	Choose Color if you wish to scan a color image for your original in color.
Gray	Choose Gray image if your original contains actual shades of gray.
B&W	Choose B&W if your original contains only text, pencil or ink sketch.

1. Select the document to scan. The document must be placed on the scanner bed. The scanner will automatically detect the document type and scan it in the appropriate mode.

2. Select the document type. The scanner will automatically detect the document type and scan it in the appropriate mode.

3. Select the document type. The scanner will automatically detect the document type and scan it in the appropriate mode.

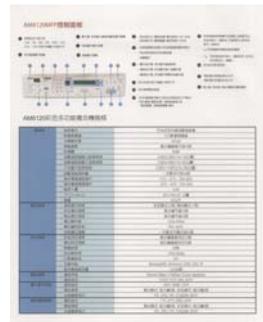
4. Select the document type. The scanner will automatically detect the document type and scan it in the appropriate mode.

5. Select the document type. The scanner will automatically detect the document type and scan it in the appropriate mode.



y

B&W Gra



Color

Sensitivity of Auto Color Detection

If your documents contain primarily B&W text and small amount of light or pale colors and you do not wish them to be recognized as color image to save the file size, you can increase the sensitivity value by moving the bar to the right to let these images to be detected as B&W. The value ranges from 1 to 100. The default is 37.

Standard	IEEE 802.11 b/g/n standards compliant		
Wireless LAN	11T/R Mode		
Frequency Range	2.400 ~ 2.4835GHz (subject to local regulations)		
Number of Selectable Channels	802.11n: 20MHz/40MHz		
	USA, Canada (FCC):11 channels (2.412GHz~2.462GHz)		
	802.1 Europe (CE): 13 channels (2.412GHz~2.472GHz)		
	1b/g: Japan (TELEC): 14 channels (2.412GHz~2.4835GHz)		
Data Rate	802.11n: up to 150Mbps		
	802.11b: 1, 2, 5.5, 11Mbps		
	802.11g: 6, 9, 12, 18, 24, 36, 48, 54Mbps		
Transmit Power(EIRP)	11n HT40 MCS7 : +13 dBm		
	11g OFDM: +15 dBm		
	11b CCK: +18 dBm		
Security	WEP 64/128, TKIP, WPA, WPA2 mixed,802.1x and 802.11i		

Original

Standard	IEEE 802.11 b/g/n standards compliant		
Wireless LAN	11T/R Mode		
Frequency Range	2.400 ~ 2.4835GHz (subject to local regulations)		
Number of Selectable Channels	802.11n: 20MHz/40MHz		
	USA, Canada (FCC):11 channels (2.412GHz~2.462GHz)		
	802.1 Europe (CE): 13 channels (2.412GHz~2.472GHz)		
	1b/g: Japan (TELEC): 14 channels (2.412GHz~2.4835GHz)		
Data Rate	802.11n: up to 150Mbps		
	802.11b: 1, 2, 5.5, 11Mbps		
	802.11g: 6, 9, 12, 18, 24, 36, 48, 54Mbps		
Transmit Power(EIRP)	11n HT40 MCS7 : +13 dBm		
	11g OFDM: +15 dBm		
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	802.11b: 1, 2, 5.5, 11Mbps		
	802.11g: 6, 9, 12, 18, 24, 36, 48, 54Mbps		
Transmit Power(EIRP)	11n HT40 MCS7 : +13 dBm		
	11g OFDM: +15 dBm		
	11b CCK: +18 dBm		
Security	WEP 64/128, TKIP, WPA, WPA2 mixed,802.1x and 802.11i		

Sensitivity: 1
(The image is recognized as a color one)

Sensitivity: 100
(The image is recognized as a black and white one)

Same settings on both sides:

Click to apply same scan settings for both sides of your documents. After checking this option, any settings you have changed will automatically applied to both the front side and the rear side. For example, if you choose your ideal resolution to be 300 dpi, this will be applied both to the front side and rear side of your document.

9.3.2 Other Image Options

Binarization This is the process of converting a grayscale or color image to a bi-tonal image. There are several different methods of performing this conversion.

Options: Dynamic Threshold, Dynamic Threshold (AD), Fixed Processing, Halftone 1~5, Error Diffusion.

Dynamic Threshold: Selecting **Dynamic Threshold** allows the scanner to dynamically evaluate each document to determine the optimal threshold value to produce the highest quality image. This is used to scan mixed document containing faint text, shaded background, or color background with a single setting. If Dynamic Threshold is selected, Threshold, Brightness, and Contrast are not available.

Dynamic Threshold (AD): Selecting **Dynamic Threshold (AD)** to perform the enhanced mode of the Dynamic Threshold feature. However, using this mode may slow down your scanning speed.

Sensitivity of Dynamic Threshold

Occasionally your scanned image may contain small dots or speckles. To remove these spots, increase the sensitivity value by moving the bar to the right. The value ranges from 1 to 30. The default is 20.

Fixed Processing: Used for black-and-white and other high contrast documents. A single level is set to determine the black-and-white transition. The threshold is programmable over the entire density range. **Fixed Processing** sets Contrast to 0. If **Fixed Processing** is selected, Contrast is not available.

Halftone: In addition to the black and white display, Halftone can present a somehow gray shade of image by using different size of dots. Halftone image looks like the picture we have seen in the newspaper. **Options include Halftone 1, Halftone 2, Halftone 3, Halftone 4, Halftone 5.**

Error Diffusion: Error Diffusion is a type of Halftone. Error Diffusion gives good image texture and makes text in images more readable than Halftone.



Halftone Image



Error Diffusion Image

<p>Dynamic Threshold</p>	<p>Dynamic Threshold (AD)</p>

Threshold

Used to convert a grayscale image to a bi-tonal image. The value ranges from 0 to 255. A low threshold value produces a lighter image, and can be used to subdue backgrounds and subtle, unneeded information. A high threshold value produces a darker image, and can be used to help pick up faint images. Adjust the threshold setting by dragging the Threshold sliding bar to the left or right to achieve the desired threshold setting.



**200 dpi,
Threshold:50,
Brightness: 0**



**200 dpi,
Threshold:100,
Brightness: 0**

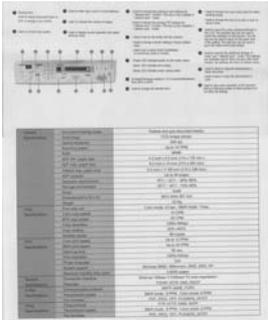
Gray

Document Type: Choice: Normal, Photo, Document

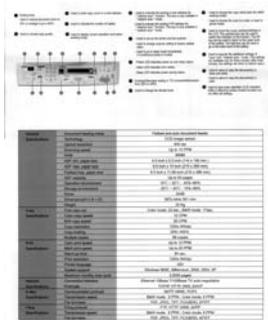
Three options of document type are provided when you choose Gray as the image type for your scanned document. **Choice: Normal, Photo, Document.**

- **Document:** Choose Document if your original contains pure text or a mixture of text and graphic since it is an optimal setting for regular business document. When using Document, only Threshold can be adjusted.
- **Photo:** Choose Photo if your original contains photo to reproduce your photo in vivid grayscale image. When using Photo, no Threshold and Contrast can be adjusted.
- **Normal:** When using **Normal**, Threshold, Brightness, and Contrast can be adjusted.

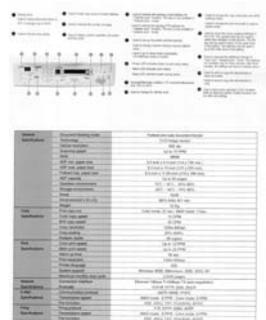
Threshold: The value ranges from 0 to 255. The default is 230. A low threshold value produces a lighter image, and can be used to subdue backgrounds and subtle, unneeded information. A high threshold value produces a darker image, and can be used to help pick up faint images. Adjust the threshold setting by dragging the **Threshold** sliding bar to the left or right to achieve the desired threshold setting.



Normal



Photo



**Document
(Threshold: 230)**



Normal



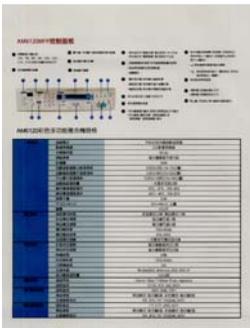
Photo



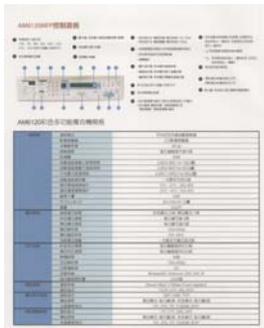
**Document
(Threshold: 230)**

Brightness Adjusts the lightness or darkness of an image. The higher the value, the brighter the image. Drag the slider to the right or left to increase or decrease the brightness. The range is from -100 to +100.

Contrast Adjusts the range between the darkest and the lightest shades in the image. The higher the contrast, the bigger the different grayscale. Drag the slider to the right or left to increase or decrease the contrast. The range is from -100 to +100.



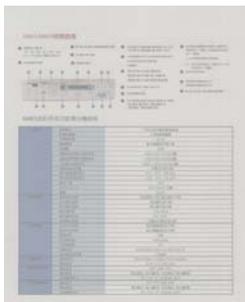
Brightness: -50



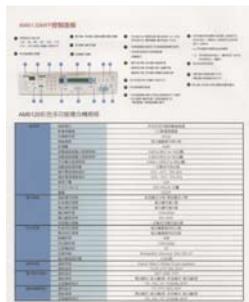
**Brightness: 0
(Normal)**



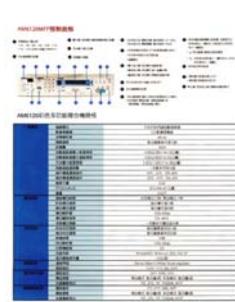
Brightness: +50



Contrast: -50



**Contrast: 0
(Normal)**



Contrast: +50

Resolution A good control of the resolution results a good detail of an image that scans. The resolution is measured by dots per inch (dpi). Normally, the greater the dpi number, the higher the resolution and the image file size. Be aware that greater resolution takes more time to scan, and more disk space for the scanning image. For your information, an A4 size color image scanned at 300 dpi at True Color mode consumes approximately 25 MB of disk space. A higher resolution (usually means over 600 dpi) is only recommended when you need to scan a small area at True Color mode.

Choose a resolution value from the drop down list. The default value is 200 dpi. Available resolutions are 75, 100, 150, 200, 300, 400 and 600. Or you may choose your desired value by clicking the box in the right side of the drop down list and press the arrow key to select your desired value and then click the Add button to include it in the drop down list. **Note:** The resolution is up to 300 dpi if an imprinter or a MICR reader is installed or connected to the scanner.



Resolution: 75 dpi

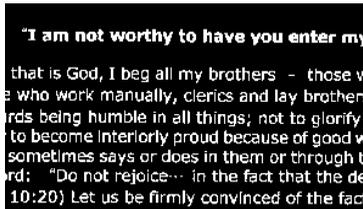


Resolution: 150 dpi

Invert Reverses the brightness and the colors in the image. The default setting is Black on a White background. Reverse mode is White on a Black background. For color images, each pixel will be changed into its complementary color at the command of Invert.

"I am not worthy to have you enter my
that is God, I beg all my brothers - those w
e who work manually, clerics and lay brothers
ards being humble in all things; not to glorify
r to become Interiorly proud because of good w
sometimes says or does in them or through t
ord: "Do not rejoice... in the fact that the de
: 10:20) Let us be firmly convinced of the fact

Black on White



"I am not worthy to have you enter my
that is God, I beg all my brothers - those w
e who work manually, clerics and lay brothers
ards being humble in all things; not to glorify
r to become Interiorly proud because of good w
sometimes says or does in them or through t
ord: "Do not rejoice... in the fact that the de
10:20) Let us be firmly convinced of the fact

White on Black

**Scan
Source**

Choice:

- **Auto Document Feeder:** Used to scan multiple pages.
- **Flatbed:** Used to scan a single page. For example, pages from newspaper clipping, paper with wrinkles or curls.
- **Flatbed (book):** Used to scan several inside pages from book.
- **Automatic:** Allow the scanner automatically set its scan source. If **Automatic** is selected and there is document in both the auto document feeder (ADF) and the flatbed, then the scan source will be automatically set to ADF. If **Automatic** is selected and there is document only in flatbed, then the scan source will be set to flatbed.

- **Merge Two Sides into One Image:**

If you have a sheet-fed duplex scanner with front input tray, you can scan an A3 size document with an innovative method. Thus, fold your A3 size document into A4, and then load the paper in the front tray. Choose Merge Two Sides from the Scan Source option and then the scanner is able to scan both sides of your document and merge two A4 images into one A3 image.

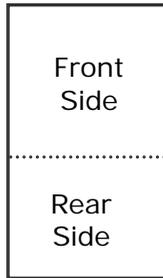
When you select Merge Two Sides into One Image, the Cropping or Multi-feed function will be disabled.

Note: This feature must be used with a carrier sheet. Regarding how to load a document with a Carrier Sheet, refer to Section 4.6.2, Other Paper Selection.

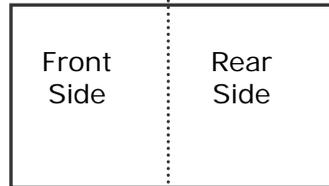
Note the options vary based on type of scanner.

Note: If you have purchased a duplex sheet-fed scanner, choose [Merge Two Sides] on the [Scan Source], then the scanner is able to scan both sides of your document and merge them into a single image.

If "Merge Two Sides into One Image" is selected, its choice will be available including "Merge Horizontally", "Merge Vertically", "Merge Vertically (Back Side Flip)". If the reverse side of your document is upside down, choose "Merge Vertically (Back Side Flip)" and the back side will be automatically rotated 180 degrees and merged.



Merge Vertically



Merge Horizontally

Note the options vary based on type of scanner.

Color Matching

The purpose of Color Matching is getting the accurate color. This option uses the default parameters (ICC profile) to adjust the colors of the image.

Choice: None, Document, Photo, Mixed

- **None:** Choose "None" to disable this option.
- **Mixed:** Choose "Mixed" if your original contains a mixture of text and graphic.
- **Document:** Choose "Document" if your original contains pure text.
- **Photo:** Choose "Photo" if your original contains photo to reproduce your photo in vivid color image.



Normal



After Color Matching

9.3.3 Scanning color images

The following options are available for scanning color images.

- Brightness
- Contrast
- Resolution
- Invert

9.3.4 Scanning grayscale images

The following options are available for scanning gray images.

- Brightness
- Contrast
- Resolution
- Invert

9.3.5 Scanning B&W images

The following options are available for scanning B&W images.

- Binarization (Dynamic Threshold)
- Resolution
- Invert

Or

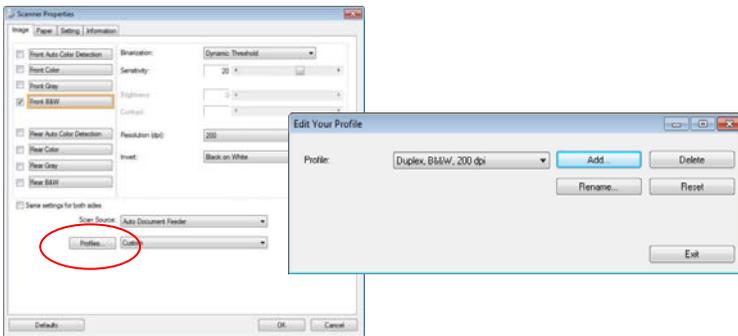
- Binarization (Fix Processing)
- Threshold
- Brightness
- Resolution
- Invert

9.3.6 Modifying Profiles

The Scanner Properties dialog box allows you to change and save your frequently used scan settings into a profile. You can Modify these profiles by renaming or deleting them.

To add a new profile,

1. Customize your settings. (For example, change your resolution, image type, cropping method, scan size, or other scan settings.)
2. Click the Image tab and then choose "Profiles" to prompt the "Modify Your Profile" dialog box.



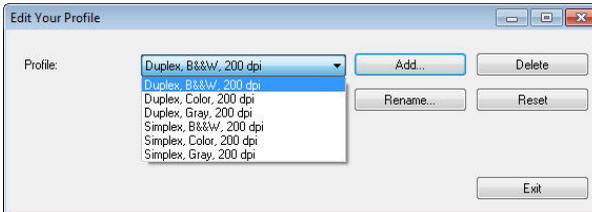
3. Click "Add" to enter the name of the profile and then choose "Save".



4. The new profile will be saved and shown in the "Profiles" dropdown list box.

To load a profile,

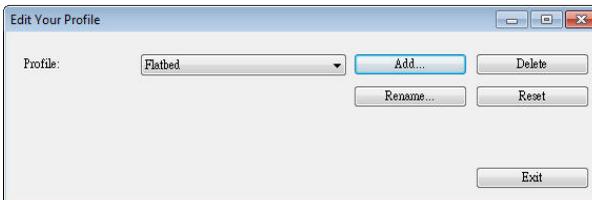
1. From the Image tab dialog box, choose your favorable profile from the "Profiles" dropdown list box.



2. Your favorable profile will be immediately loaded and displayed on Scanner Properties dialog box.

To delete a profile,

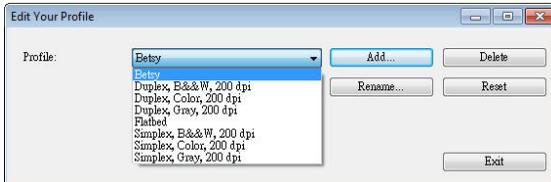
1. From the Image tab dialog box, click "Profiles" to prompt the Modify Your Profile dialog box.



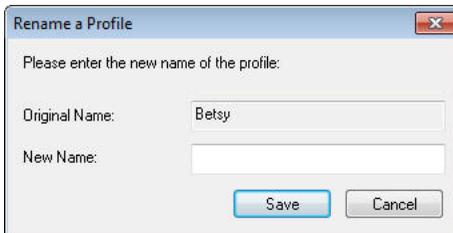
2. Choose the profile you want to delete from the dropdown list box.
3. Click "Delete". A Confirm message "Are you sure you want to delete this profile?" is prompted.
4. Choose "Yes" to delete or "Cancel" to quit.

To rename a profile,

1. From the Image tab dialog box, click "Profiles" to prompt the Modify Your Profile dialog box.



2. Choose the profile you want to rename from the dropdown list box and then click the Rename button.
3. Enter new name for the profile.



4. Choose "Save" to save the new profile or "Cancel" to quit.

Note:

- The preset default profiles include Flatbed, Simplex-B&W, 200 dpi, Simplex-Gray, 200 dpi, Simplex-Color, 200 dpi, Duplex-B&W, 200 dpi, Duplex-Gray, 200 dpi, Duplex-Color, 200 dpi. If you have a simplex or a sheetfed scanner, the duplex or the flatbed option will not be available.
- If any setting for a current profile has been changed, a [*] sign will be marked before the name of current profile, for example, [*** Duplex, Color, 200 dpi**]. If desire, click the [OK] or [Scan] button and a dialog box will be prompted to let you save the new profile.

9.4 The Compression Tab

The Compression tab allows you to compress your scanned image and choose the level of compression. Bi-tonal images are normally compressed using CCITT standard called Group 4 (G4). Color and grayscale images are often compressed using JPEG technology. Move the **JPEG Quality** slider to the right or left to increase or decrease the level of compression. Note the greater the compression level, the lower image quality. Default is 50%.

Note that the compression depends on your image Modifying application. If your image Modifying application does not support the type of compression format, then either a warning message will appear or the image quality of the compressed file will not be acceptable.

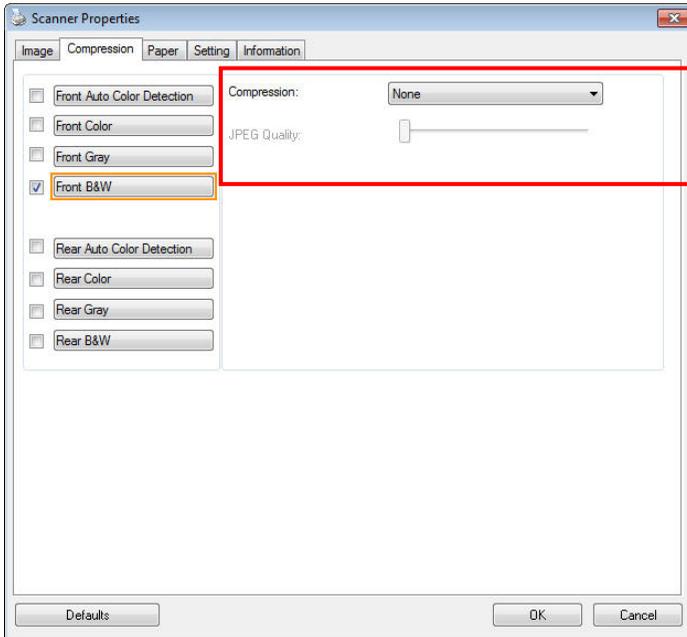
JPEG (Joint Photographic Modifyor Group). This group developed and lent their name to a file compression standard for color and grayscale images that is widely used by scanners, and software applications. On Microsoft Windows-based systems, a file with the extension .jpg has normally been compressed using this standard.

For scanning color or gray images, the following compressions are available:

- None
- JPEG

For scanning B&W images, the following compressions are available:

- None
- G4



The Compression tab dialog box

9.5 The Color Dropout Tab

9.5.1 Color Dropout Selection

The [**Color Dropout**] tab allows you to select either green, red, blue, or a color of your choice to remove the details of the selected color from a scanned image. This feature is used to sharpen your text when using OCR (Optical Character Recognition) software. Note this feature applies only to the gray or black and white image.

Choice: None, Auto, Remove Red, Remove Green, Remove Blue, Custom

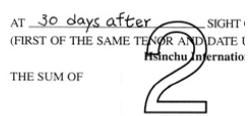
- **None:** Does not remove any color.
- **Auto:** Automatically outputs the image with the details of the primary color removed.
- **Remove Red/Remove Green/Remove Blue:** Outputs the image with the details of the specified color removed.
- **Custom:** Specify the color you wish to remove by entering its RGB (Red, Green, and Blue) value respectively.

Advanced Options:

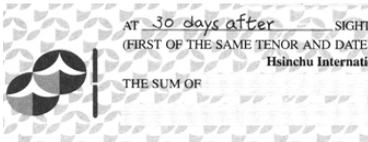
- **Quality Mode:** Range: 0~20. Default: 10
When [Quality Mode] is selected, you can determine the color to be dropped out using the [Filter Threshold] slider. A lower value will drop more of the selected color out, while a higher value will leave more of the selected color in.
- **Normal Mode:** Use an optimized setting to determine the color.



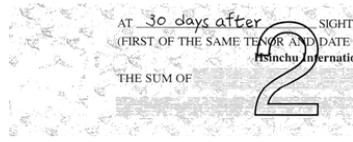
Original



**Auto/Remove Green
(normal mode)**



**Remove Red (normal
mode)**



**Remove Green (quality
mode: Threshold: 18)**

Preview the color dropout result:

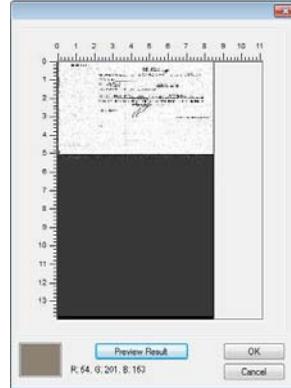
To preview the color dropout result, please follow these steps:

1. Click the [**Scanner Properties**] icon () on the upper left corner, and choose [**Tab**] to show available tab names.
2. Choose [**Preview**] to show the Preview tab.
3. Click the [**Preview**] tab to show the Preview page.
4. Load your document to the scanner and click the [**Preview**] button to get a preview image.
5. On the [Image] tab, click [Gray] or [Black and White] image mode and then choose [Custom] on the [Color Dropout] tab. A [Preview window] button will be displayed.
6. Click the [**Preview window**] button to prompt the [**Preview**] window with the previewed image.

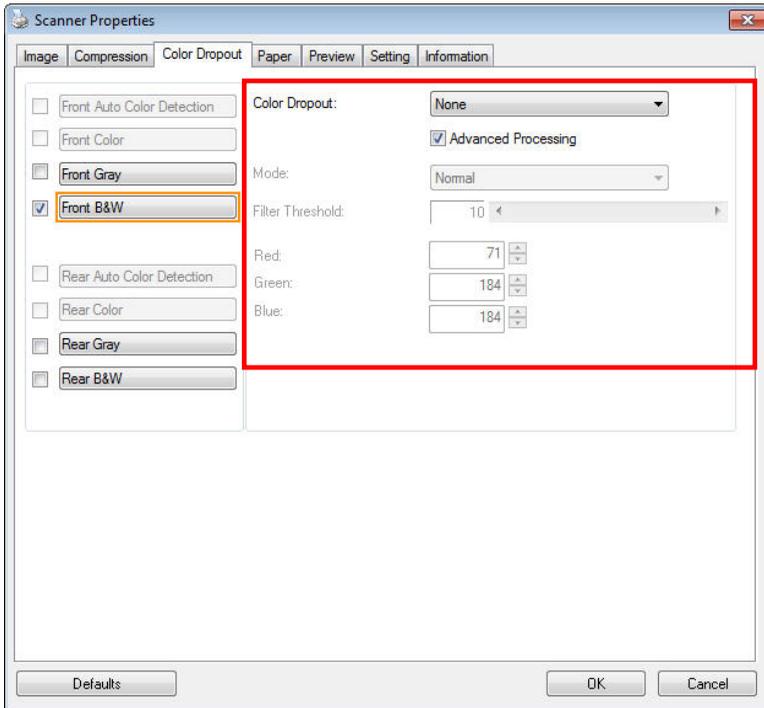
7. Move your cursor over the preview image. Your mouse cursor now becomes an Eyedropper.
8. Click to select a color which you wish to remove.
9. Click and hold your mouse button to view the result after removing the specified color. If the result is satisfactory, click [**OK**] to close the Preview window.



The Preview Window



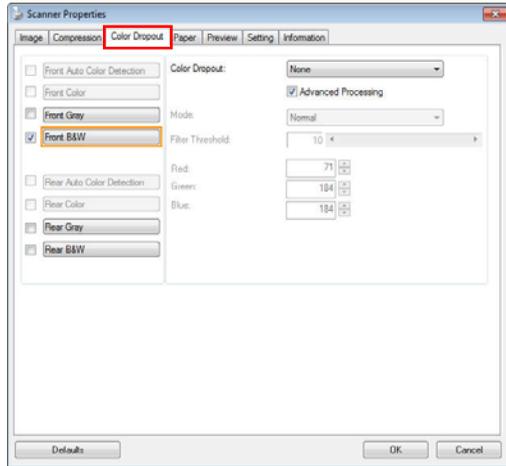
The Color dropout result



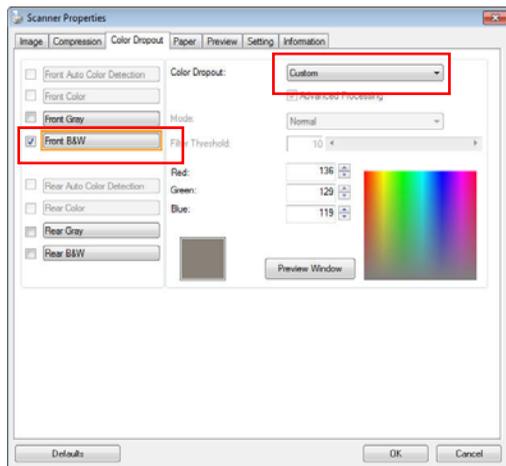
The Color Dropout dialog box

To select a color on the Color palette,

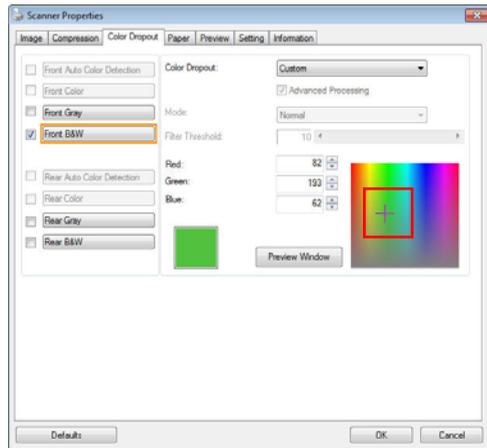
1. Click the Color Dropout tab from the Scanner Properties dialog box.



2. Choose Gray or B&W from the Image Selection box and click "Custom" from the Color Dropout drop-down menu. The Color palette appears.



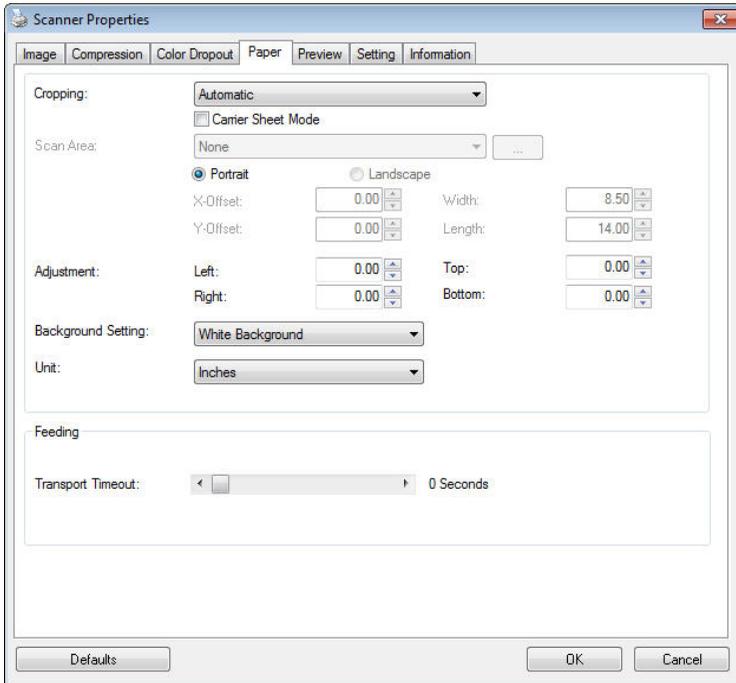
3. Move your cursor over the palette. The cursor becomes a cross sign.



4. Click to choose a color. The RGB values are changed simultaneously.

9.6 The Paper Tab

The Paper tab allows you to define values relating to image output (i.e., Auto Crop or not, Scan Area, OverScan, Multi-Feed Detection).



The Paper tab dialog box

9.6.1 Cropping

Cropping allows you to capture a portion of the document being scanned. **Choice: Automatic, Automatic (36"), Fixed to Transport, EOP (End of Page) Detection, Automatic Multiple, Relative to Documents.**

Options	Description
Automatic	Automatic adjusts the cropping window according to different document sizes and automatically straighten a skewed document. Use this option for batches of mixed-sized documents.
Automatic (36")	Automatically adjusts the cropping window according to different document sizes smaller than 36" and automatically straighten a skewed image. Use this option for batches of mixed-sized document. <i>Note: The availability of this feature varies due to scanner model.</i>
Fixed to Transport	This feature allows you to define the area or zone to be imaged. Use for batches of same-sized documents. If you select this option, you can use the arrow keys to define the x and y offset values, width and length to redefine your scanned area. The Display window will show image placement as you change the values.
EOP (End of Page) Detection	This feature allows you to define the area or zone to be imaged. Use for batches of same-width but different length documents. If you select this option, you can use the arrow keys to define the x and y offset values, width and length to redefine your scanned area. The Display window will show image placement as you change the values.

<p>Automatic Multiple</p>	<p>This option allows you to place various sized documents such as photos, ID Cards, or business cards on the flatbed (if available) and lets you create multiple individually cropped images in one scan. Note: To correctly create multiple images, please make sure there is at least 12mm (0.5") of space between each document.</p>
<p>Relative to Document</p>	<p>This option allows you to crop different areas on your documents and deliver these images in B&W, Gray, or Color separately. For example, there are applications which require you to store the entire document in B&W and a part of the document in color to save storage space. This is useful for documents where a photograph or signature appears in a consistent area on the document such as resumes, and so on.</p>

The following options are only available when **Fixed to Transport** is selected.

- **X-Offset** — the distance from the left end of the scanner to the left edge of the scanning area.
- **Y-Offset** — the position from the top end of the document to the top end of the scanning area.
- **Width** — the width of the scanning area.
- **Length** — the length of the scanning area.
- **Center:** automatically calculates the x-offset for center-fed feeding based upon document size selected.



-  — relocate the scan area by click the arrow key on the cross sign while retain the scan size. View the result from the Display window.

The Adjustment option is available when **Automatic** is selected.

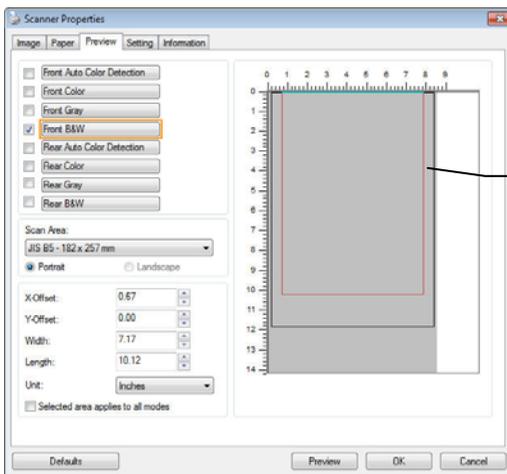
- **Adjustment** —adds a positive/negative margin value Top/Bottom or toward left/right of the image. Adjustment is used when the automatic document feeder is used. Adjustment reduces the possibility of corner clipping on skewed images. To set Adjustment values, use the UP/Down buttons to select where you want to apply Adjustment values: Top/Bottom or Left/Right, and then select the amount of inches/mm/pixels applied. Select a value within the range of 0.00 to 1.00 / -1.00.

Relative to Document: (used for batches of same-sized documents)

This option allows you to crop different areas on your documents and deliver these images in B&W, Gray, or Color separately. For example, there are applications which require you to store the entire document in B&W and a part of the document in color to save storage space. This is useful for documents where a photograph or signature appears in a consistent area on the document such as resumes, and so on.

The following procedure describes how to reproduce the entire document in B&W and a portion of document (picture) in color.

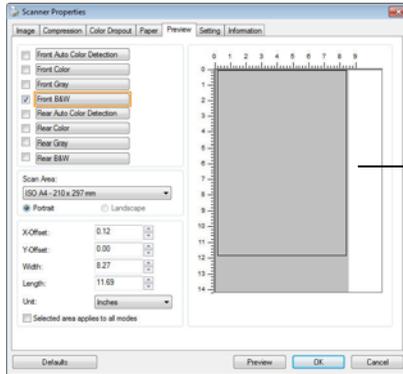
1. On the Paper tab, choose "Relative to Document" or "Fixed to Transport" from the Cropping option.
2. Choose your scan size from the Scan Area option. The selected scan size will be displayed in a red rectangular box. This is also the scan size of your entire document. (For example, ISO B5. If you have not chosen a scan area and leave the selection as None, then the default area will be the scanner's maximum.)



A red rectangular box

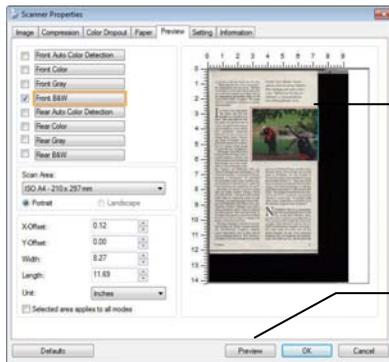
- Click the Preview tab to display the Preview window. A black rectangular box appears to indicate the max. scan size you have just selected.

The Image Selection Box



A black rectangular box

- Click the Preview button to view the entire image in low resolution to correctly crop your relative scan area.

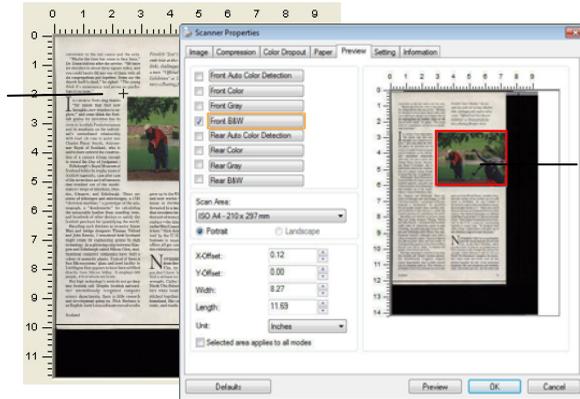


The Preview Image

The Preview Button

- Select image type from the Image Selection box. The selected image will appear in highlighted color. (For example, Front Color)
- Place your cursor on the Preview window and click your left mouse button. A cross sign will appear as illustrated. Create your relative scan size diagonally by dragging the left mouse button to your preferable size. The selected area will appear in a red box as illustrated.

A Cross Sign



The Relative Area

7. Check the B&W image from the Image Selection box to scan the entire document.
8. Click the Scan button to start scanning the document in two image types and sizes. (See the result in below.)

convenient to the rest rooms and the exits. "Maybe the time has come to fix that," Dr. Zhou said on after the service. "We have six churches in about three square miles, and you could hardly fill any one of them with all six congregations put together. Some say the church itself is dead," he added. "The young think it's unnecessary and serves no psychological purpose."

Finnish "Sun Maiden," the seventh book at the title of *Floyd's Machine* links, challenges with rough as well as a sun. "Official Loch Ness Monster Exhibition" at Drumstrach for news a *Flaming* through *Nature*.

It is curious Scots sing think "for minds that find new thoughts, new wonders to explore," and some think the Scottish spirit for invention but its roots in Scottish Presbyterianism and its emphasis on the individual's "unmistakable relationship with God. (A case in point was Charles Piazzi Smith, astronomer Royal of Scotland, who is said to have ordered the construction of a camera strong enough to resist the Day of Judgment.)



Edinburgh's Royal Museum of Scottish Industry recently closed Scottish ingenuity case after case of the invention and refinement that tumbled out of the middle-class "Shops of America, Dundee, Glasgow, and Edinburgh. There are scores of others you will recognize, a 1760 "automatic machine," a prototype of the airplane, a "differential" for calculating the extractable lumber from standing trees, and hundreds of other devices to analyze the Scottish penchant for quantifying the world.

Renowned clockmaker and inventor James Watt and bridge designer Thomas Telford and John Roith, I wondered how Scotland might relate its engineering genius to high technology. In a gathering between Glasgow and Edinburgh called Silicon Glen, multinational computer companies have built a colony of assembly plants. Typical of them is Sun Microsystems' glass-and-silicon facility in Lighthillgate that appears to have been affixed directly from Silicon Valley. It employs 600 people, 450 of whom are Scots.

But high technology's roots do not run deep into Scottish soil. Despite Scottish universities' internationally recognized computer science departments, there is little research and development going on. York Watson is an English-born Lotus software executive who

grew up in the United States, married a Scot, and now works via his remote office at a mill house in Perthshire. He says Scotland is flawed by a lack of the entrepreneurial energy that circulates in the U.S. "There was a lot of that sort of energy in Glasgow in the early 19th century—the kind of dynamism you still find there (and Coventry in U.K.). But even now it still flows." Nick thinks Scotland has been victimized by the U.K.'s pursuit for cost-cutting business in major hubs. "In Scotland head offices all get sucked down in London out of this ridiculous urge to be near the throne."



Scotland

23

The entire document in B&W The relative area in color

9.6.2 Other Paper Selection

Carrier Sheet Mode:

Check this option to automatically crop the scan window according to your document size when scanning non-standard document (fragile, irregular-size document) with a carrier sheet (optional). Note: The availability of this option varies due to scanner model.

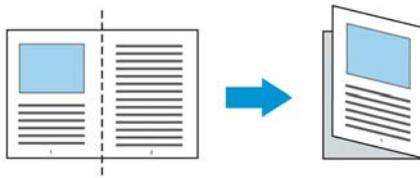
Loading Documents Using a Carrier Sheet

A Carrier Sheet is a plastic sheet specifically used for loading non-standard document onto the scanner. It allows you to scan document that can not be scanned in the regular way. Also, documents larger than A4 size, such as A3 and B4, can be scanned by folding in half, inserting into the Carrier Sheet, and scanning in duplex mode. You can also scan documents that can be damaged quite easily such as photographs, or irregular size documents that are difficult to load directly such as clippings.

To scan document using a Carrier Sheet,

For documents larger than A4/Letter size, such as A3

- a. Fold the sheet to be scanned in half.
- b. Fold the sheet tightly and smooth out crease. Otherwise, the sheet may be skewed during scanning.

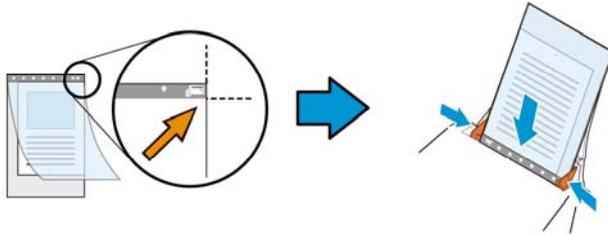


- 1. Open the Carrier Sheet and place the document inside.**

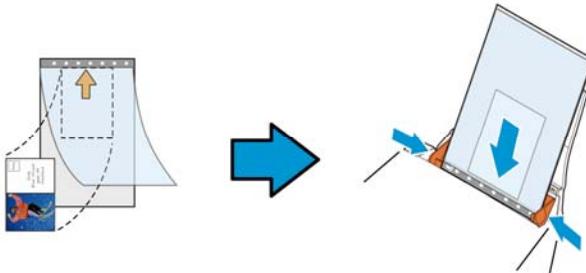
Align the top of the document to the top of the Carrier Sheet (the printed area).

For documents larger than A4/letter size, such as A3

Align the top of the document to the top of the Carrier Sheet (the printed section) and the folded portion to the right edge of the Carrier Sheet so that the document fits into the Carrier Sheet at the upper corner.

**For non-standard document**

Center your document in the Carrier Sheet.



2. Load the Carrier Sheet with the gray section (printed section) facing downwards.
3. Adjust the paper guides to the width of the Carrier Sheet. Adjust the paper guides so that there is no space between the guides and the Carrier sheet. Space between the guides and Carrier Sheet may cause the Carrier Sheet to become unaligned during scanning, and skew the scanned image.
4. Start the scan.

Notice:

- [Carrier Sheet] is available for the models that support the Carrier Sheet.
 - Some functions are disabled when [Carrier Sheet] is checked.
 - This option may not work properly on some applications.
-

Scan Area

Choose your desired paper size with the drop-down list box. Or you may select a custom paper size by clicking the **Scan Area** box and then click **Add** to include in the choice.

Choices are listed below:

None
US Letter- 8.5"x 11"
US Legal – 8.5" x 14"
ISO A4 – 21 x 29.7 cm
ISO A5 – 14.8 x 21 cm
ISO A6 – 10.5 x 14.8cm
ISO A7 – 7.4 x 10/5 cm
ISO B5 – 17.6 x 25 cm
ISO B6 – 12.5 x 17.6 cm
ISO B7 – 8.8 x 12.5 cm
JIS B5 – 18.2 x 25.7 cm
JIS B6 – 12.8 x 18.2 cm
JIS B7 – 9.1 x 12.8 cm
Scanner Maximum
Long Page (<118")

Long Page (<118"):

When you need to scan documents whose length exceeds scanner maximum, please choose **Long Page**. Note if **Long Page** is selected, the **Multi-Feed Detection** will not be available. (Note: This option and the maximum allowable document length vary due to type of scanner.)

When **Long Page (<118")** is selected, be sure to specify your document size in the **Length** and **Width** field.

Notice when scanning long page document:

1. Pull out the extension in the ADF Paper Tray.
 2. Secure enough space around the Output Tray to prevent the ejected paper from falling off the Output Tray.
 3. To ensure the performance, in color mode, set the resolution to be 300 dpi or lower; in Black and White mode, set the resolution to be 600 dpi or lower.
 4. Depending on your system environments, application, or your specified paper size, there may be insufficient memory to perform scanning.
-

OverScan

Overscan allows you to add a specific margin at top and bottom or right and left (Options vary based on the type of scanner) of the edge of the image. This is used to reduce possible corner clipping on the skewed images and often applied to a batch of skewed document to be scanned in the auto document feeder. Select a value between 0 and +5 mm. Note the overscan result will not be shown in the Display window and that the availability of the function varies based on type of scanner.

Pre-Feed

Choice: Enable, Disable. If enable is selected, you can set the amount of time the scanner starts pre-feeding your paper after your documents has been loaded into the feeder. The default is disable. Note: The availability of this option varies due to scanner model.

Transport Timeout

Set the amount of time the scanner will wait and then start auto scan after the first scan job is completed. If you have many separate documents need to be scanned at the same scan settings, this feature is especially useful. The default is 0. The value ranges from 0 to 30 seconds.

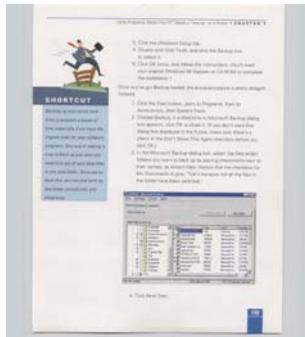
Note:

- 1 Within the specified timeout period, if you load your document to the feeder, the scanner starts scanning automatically.
 - 2 If your scanner has a flatbed option and you place your paper on the flatbed, after the timeout period, you need to click the Scan button on the TWAIN user interface to start scanning.
-

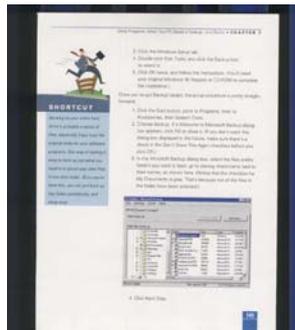
Background Setting

This option allows you to set your scan background. **Choice: White Background, Black Background.**

Note: For a sheet-fed scanner with an auto document feeder, this option is currently available only in the "Auto crop" mode. For a scanner with a flatbed platen, this option is available either in the "Auto crop" or the "Fixed to Transport" mode.



White Background

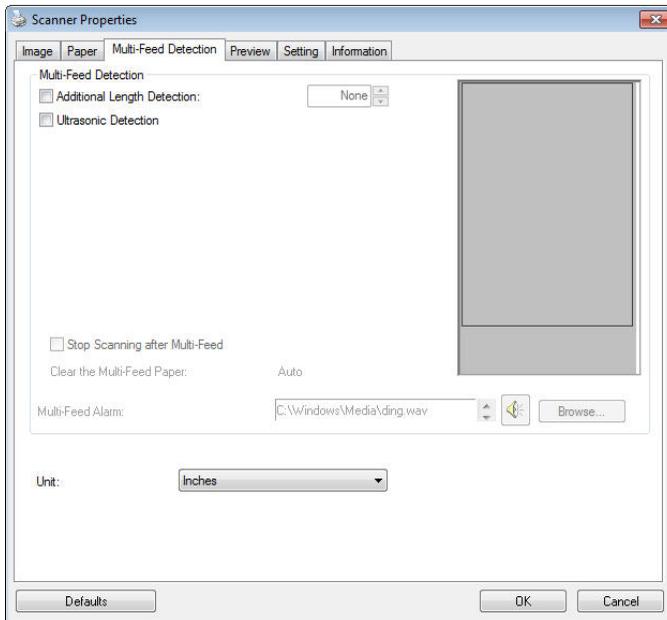


Black Background

9.7 The Multi-Feed Detection Tab

Multi-Feed Detection

Multi-Feed Detection allows you to detect overlapped document that go through the auto document feeder. Multi-Feed usually occurs due to stapled documents, adhesives on documents, or electro-statically charged document. Note : The availability of the function varies based on type of scanner.



Additional Length Detection

Additional Length Detection allows you to define the length of document being multi-fed. This value indicates the additional length exceeding your scan area. The Display window will show the size of the document as you change the value. A value of 0 indicates no additional length detection. The Additional Length Detection is best used when scanning same-size documents in the auto document feeder.

Ultrasonic Detection

Ultrasonic Detection allows you to set overlapped document by detecting paper thickness between documents. Note : The availability of the function varies based on type of scanner.

There are two options available if Multi-Feed is detected.

- **Stop Scanning after Multi-Feed**

- If this is selected, the scanner will stop the feeder and prompt a multi-feed warning message. In addition, the multi-feed paper will be ejected from the scanner automatically.

Note: The availability of the [Auto Clear Multi-Feed Paper] feature varies based on scanner type. If your scanner does not support this feature, remove the multi-feed paper manually.

- If this is not selected, the scanner will continue scanning the entire document though multi-feed is detected. After the entire document has been scanned, a multi-feed dialog box will be prompted to indicate the page number which has been detected multi-feed and need to be rescanned.

- **Multi-Feed Alarm**

If a wave file is added, the scanner will make a sound alarm if multi-feed is detected yet no Warning dialog box will be displayed.

How to add the sound alarm :

1. Click the Browse button on the right side of the speaker icon. The Open dialog box appears.
2. Choose your wave file.
3. Click the Open button. The wave file is added.

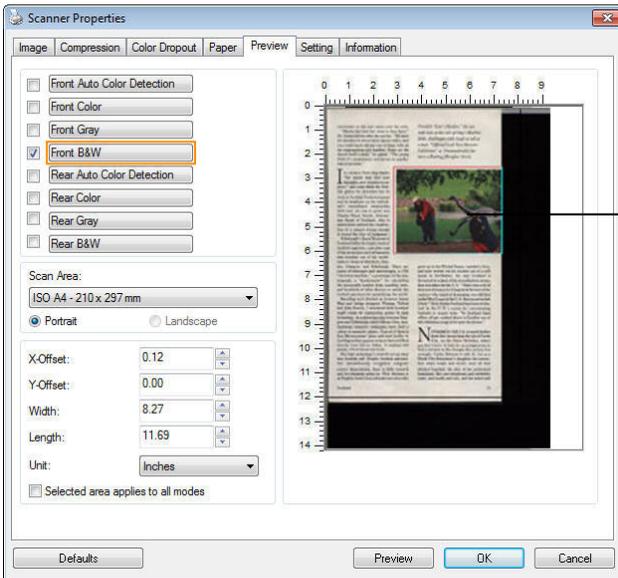
Units

Defines the primary measurement system. **Inches**, **Millimeters**, and **Pixels** are available.

9.8 The Preview Tab

The Preview tab allows you to preview (a low-resolution scan) your image before final scan. This preview image lets you allocate your scan area. You can choose your scan area by the "Scan Area" drop down list box or placing your cursor on the Display window and dragging it diagonally on the Display window. Then, a red rectangle box will appear to indicate the selected area.

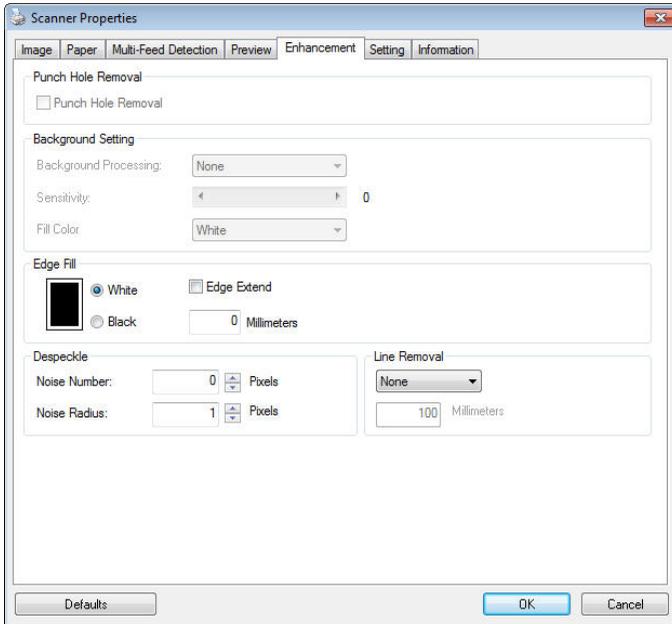
Note: If you choose "Automatic Cropping" on the "Paper Tab", then to select a scan area on the Preview tab is not allowed.



The Preview Tab

9.9 The Enhancement Tab

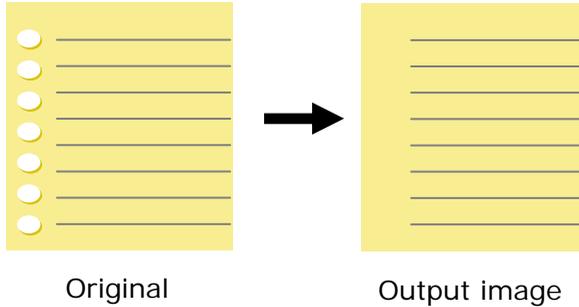
The Enhancement tab allows you to set following additional image processing settings.



The Option tab dialog box

Punch Hole Removal

You can remove punch holes from the output scanned image when scanning punched document. Note the availability of this feature varies depending on your scanner model.

**Punch holes can not be removed when:**

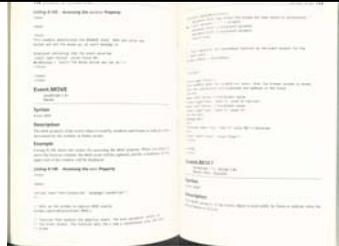
- Resolution is set lower than 150dpi
- The hole is near the edge of the document
- The holes are not aligned along the edge of the document
- Punch Hole Removal is available only when "Auto Crop" is enabled. If either "Fixed to Transport", "EOP (End of Page) Detection", "Automatic Multiple", "Relative to Documents" is selected from the Cropping option on the Paper tab, the Punch Hole Removal option will be disabled.

Shadow Removal

When 「Flatbed」 on the 「Scan Source」 option is selected on the 「Image」 tab, the 「Shadow Removal」 option will be enabled. Click to remove the shadow on the book spine when scanning a book.



Before Shadow Removal



After Shadow Removal

Background Processing: The [**Background Processing**] option allows you to smooth background color or remove it to make image clearer. The option is especially useful for documents with color forms such as invoices.

Choices: None (default), Smooth, Removal

- **None** - no background processing will be performed (default)
- **Smooth** - produces images with a more uniform background color. This option improves image quality.
- **Removal** - identifies the background color and then removes it.

Sensitivity: Choice: 0, 1, 2, 3, 4. Default: 0

- The higher the value, the more background color will be kept.

Mode: Auto, Moiré

If [**Smooth**] is selected in the [**Background Processing**] option, then the choices for the [**Mode**] option includes Auto, and Moiré.

- **Auto** - uses the factory preprogrammed mode to proceed background smoothing.
- **Moiré** - Remove the moiré patterns that appear on the background of the image when scanning printed material.

If [**Removal**] is selected in the [**Background Processing**] option, then the [**Mode**] option will be replaced with [**Fill Color**]. Choices: White, Auto.

- **White** - identifies the background color and substitutes it with white.
- **Auto** - identifies the background color and substitutes it with the color of the largest background zone.



Background Processing: None



Background Processing:
Smooth



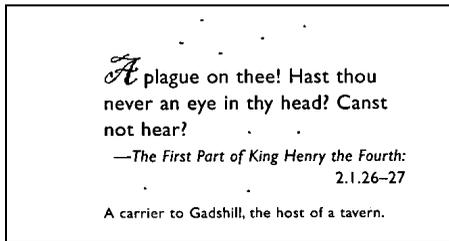
Background Processing:
Removal
Fill Color: White

Note: Background color in small zone will not be processed or removed.

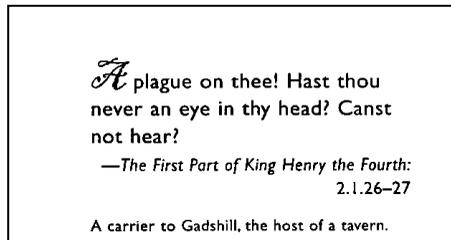
Despeckle

Occasionally small dots or specks appear in the background of a scanned image. Remove unwanted speckles provides a cleaner image for OCR (Optical Character Recognition) processing, and also helps to reduce compressed file size.

Define the speckles (also known as image noise) you wish to remove by specifying its number (size) and radius (range). The measuring unit is pixel. The higher the number, the more speckles will be removed.



Before Despeckle
(noise number: 0, noise radius: 1)



After Despeckle
(noise number: 22, noise radius: 10)

Note:

- The function is currently available for Black and White image only.
 - To scan at rated speed, it is recommended to set the noise radius up to 10 pixels.
-

Line Removal: When **Black and White** image mode is selected on the [Image] tab, the [Line Removal] option will be enabled. Line Removal erases lines on the image and then reconstructs characters so the OCR (Optical Character Recognition) accuracy can be improved.

Choices: None, Form, Horizontal, Vertical

None – the default mode which does not remove any line.

Form – remove any form in the document.

Horizontal – select [Horizontal] and then enter the length of horizontal line to remove only the horizontal line exceeding your specified length.

Vertical – select [Vertical] and then enter the length of vertical line to remove only the vertical line exceeding your specified length.

Attn: Mr. David Wang
 Shipped by SST Technologies Inc. For U-Line Express
 Sailing on or about July 30, 2002 From Taiwan, R.O.C. to U.S.A.
 L/C No. Contract No. A1233

Marks & Nos.	Description of Goods	Quantity	Unit Price	Amount
ABC	Amount (Item No. 100)	3 sets	USD20.00	USD60.00
	Amount (Item No. 101)	3 sets	USD20.00	USD60.00
	Amount (Item No. 102)	3 sets	USD20.00	USD60.00
Seattle P/O No. A1233 C/No. 1 Made in Taiwan, R.O.C.				
Total		5 sets		USD120.00

Attn: Mr. David Wang
 Shipped by SST Technologies Inc. For U-Line Express
 Sailing on or about July 30, 2002 From Taiwan, R.O.C. to U.S.A.
 L/C No. Contract No. A1233

Marks & Nos.	Description of Goods	Quantity	Unit Price	Amount
ABC	Amount (Item No. 100)	3 sets	USD20.00	USD60.00
	Amount (Item No. 101)	3 sets	USD20.00	USD60.00
	Amount (Item No. 102)	3 sets	USD20.00	USD60.00
Seattle P/O No. A1233 C/No. 1 Made in Taiwan, R.O.C.				
Total		5 sets		USD120.00

None

Remove Form

Attn: Mr. David Wang
 Shipped by SST Technologies Inc. For U-Line Express
 Sailing on or about July 30, 2002 From Taiwan, R.O.C. to U.S.A.
 L/C No. Contract No. A1233

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	Amount (Item No. 101)	3 sets	USD20.00	USD60.00
	Amount (Item No. 102)	3 sets	USD20.00	USD60.00
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Total		5 sets		USD120.00

Attn: Mr. David Wang
 Shipped by SST Technologies Inc. For U-Line Express
 Sailing on or about July 30, 2002 From Taiwan, R.O.C. to U.S.A.
 L/C No. Contract No. A1233

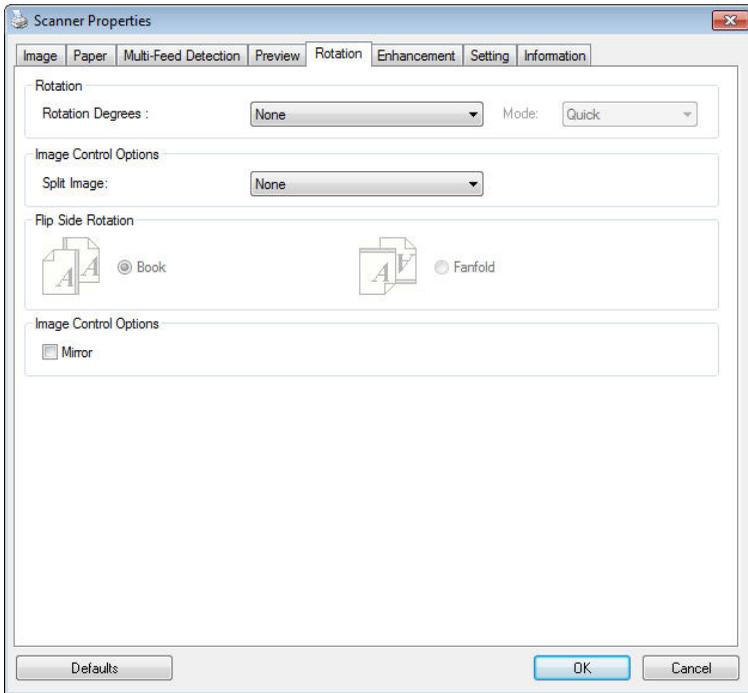
Marks & Nos.	Description of Goods	Quantity	Unit Price	Amount
ABC	Amount (Item No. 100)	3 sets	USD20.00	USD60.00
	Amount (Item No. 101)	3 sets	USD20.00	USD60.00
	Amount (Item No. 102)	3 sets	USD20.00	USD60.00
Seattle P/O No. A1233 C/No. 1 Made in Taiwan, R.O.C.				
Total		5 sets		USD120.00

**Remove Horizontal Line
(over 30 mm)**

**Remove Vertical Line
(over 70 mm)**

9.10 The Rotation Tab

The Rotation tab allows you to set the following image rotating options:



Rotate Image

Choose the rotation angle from the drop down list if you wish to rotate your scanned image.

Choice: None, 90°CW(clockwise), 90°CCW(counter clockwise), 180°, Auto based on contents. Auto rotate every even page.

1 2 3

Original

1
2
3

Rotate 90°CW

1
2
3

Rotate 90°CCW

1 2 3

Rotate 180°

Auto based on contents: Automatically rotate images based on the contents of document. When 「**Auto based on contents**」 is selected, its modes will be enabled to let you select more options.

Mode: Quick, Full Text, Complexity

Quick – the default mode to let you rotate images at the fastest speed.

Full Text – the enhanced mode for documents with mixed text orientation.

Complexity – the enhanced mode yet at the slowest speed for document with complex image or text orientation.

Auto rotate every even page:

Automatically rotate 180° on every even page. This is especially useful when you scan the inside pages from a book. As a result, if you choose “Flatbed (book)” from the “Scan Source” option, “auto rotate every even page” will be selected as default.

Note: This option varies based on type of scanner.

	
<p>Document with various text orientations</p>	<p>Document with dark or complex background</p>

Split Image

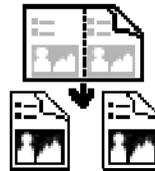
By splitting an image, two separate images are created horizontally or vertically. This is useful for documents containing two pages per image when you want to save them as two images (one page for one image). **Choice: None, Horizontal, Vertical.** Default is None.

Horizontal: Divide one image into the upper half and the lower half.

Vertical: Divide one image into the left half and the right half.



Split Horizontally



Split Vertically

**Image
Control
Option**

Check the Mirror box if you wish to reverse the right and left side of your image.



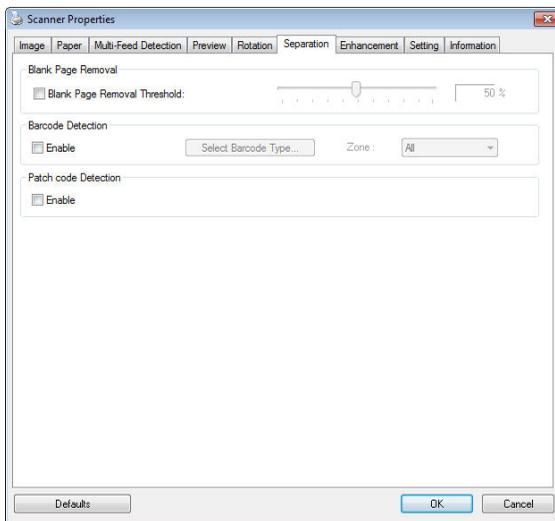
Original



The Mirror Effect

9.11 The Separation Tab

The Separation tab allows you to enable the detection engine to detect the blank page, barcode, and patch code and then notify the software application which supports document separation to separate your multi-page documents. Choices: Blank Page Removal, Barcode Detection, Patch Code Detection.



Blank Page Removal

Choices: None, Blank Page Removal Threshold, Image Size.

None – Do not remove the blank pages.

Threshold - Move the slider to the left or right to define your threshold for the blank page.

Image Size – Range: 1 ~ 10000 KB. Specify your desired image size to detect the page as a blank page. For example, if 3 KB is selected, any page less than 3 KB will be recognized as blank page.

When the bar code has been detected successfully , a file [avbarcode.ini] will be created and stored in the following path:

Windows XP: C:\Documents and Settings\All Users\Application Data\%PRODUCTNAME%

Vista, Windows 7, Windows 8, Windows 10:
C:\ProgramData\%PRODUCTNAME%

Barcode Detection:

Check [**Enable**] to detect barcode and notify the software application for advanced processing. Please note the whole document will be checked and no specific detection area needs to be designated.

Barcode Types:

The following barcode types can be detected.

Two-dimensional codes

- Aztec
- DataMatrix
- PDF417
- QR Code

One-dimensional barcodes:

- Add-2
- Add-5
- Airline 2 of 5
- Australian Post 4-State Code
- BCD Matrix
- Codabar
- Code 128 (A,B,C)
- Code 2 of 5
- Code 32
- Code 39
- Code 39 Extended
- Code 93
- Code 93 Extended
- DataLogic 2 of 5

- EAN 128 (GS1, UCC)
- EAN-13
- EAN-8
- GS1 DataBar
- Industrial 2 of 5
- Intelligent Mail (One Code)
- Interleaved 2 of 5
- Inverted 2 of 5
- ITF-14 / SCC-14
- Matrix 2 of 5
- Patch Codes
- PostNet
- Royal Mail (RM4SCC)
- UCC 128
- UPC-A
- UPC-E

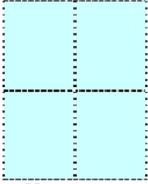
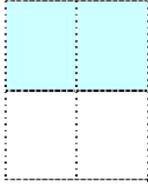
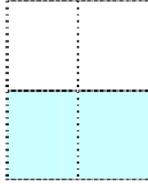
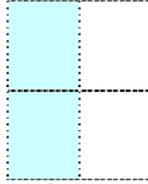
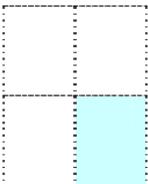
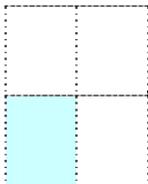
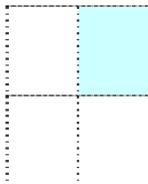
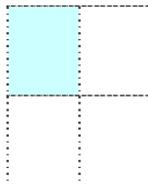
Barcode Zone:

Specify the barcode zone to be detected.

Select 「**All**」 to checks the whole document and detects barcodes. Or you may speed up the process by specifying a detection area since only the specified area is checked.

Choice: All, Top, Bottom, Left, Right, Bottom Right, Bottom Left, Top Right, Top Left

Choice for barcode zone on a page:

				
All	Top	Bottom	Left	Right
				
Bottom Right	Bottom Left	Top Right	Top Left	

Note:

- Recommended resolution: 200~600 dpi for regular barcode, 300~600 dpi for QR code
- Skewed barcodes may not be recognized correctly.
- Using the same sheet repeatedly may decrease the recognition accuracy due to accumulated dirt on the sheets. If the sheet is not recognized correctly or gets smudged, replace it with a new sheet.

Patch code Detection:

Check [**Enable**] to detect patch codes and notify the software application for advanced processing.

A patch code is a pattern of parallel, alternating black bars and spaces (i.e. a barcode) that is printed on a document. Patch code sheet is most commonly used as a document separator in a stack of document.

You can find various sizes of patch codes (PDF) by choosing [**Start**] menu > [**All Programs**] > [**Avision Scanner Series**] > [**Patch code**] in succession.

Simply print the PDF file to produce the patch code sheet. Insert the patch code sheets to wherever you want the file to separate.



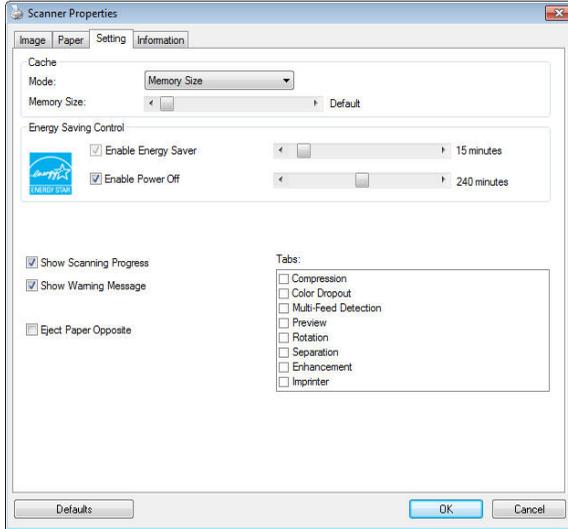
Patch code sheet

Notes to print the patch codes:

- Use blank white paper.
 - Set the scaling to 100%. The sheet is not recognized correctly when printed in a size smaller than the original.
 - Do not use toner saving mode. The sheet is not recognized correctly when the print is too light.
 - Do not use thin paper in order to avoid bleed-through from the back.
 - When you copy a patch code sheet that you printed out, make sure to copy by the same size and brightness as the original copy.
 - Use the same sheet repeatedly may decrease the recognition accuracy due to accumulated dirt on the sheets. If the sheet is not recognized correctly or gets smudged, replace it with a new sheet.
-

9.12 The Setting Tab

The Setting tab allows you to set the following settings:



The Setting tab dialog box

<p>Energy Saving Control</p>	<p>Check the Enable Energy Saver box and move the slider to set the amount of time to start the energy saver after your last action. The range is from 1 to 240 minutes. The default value is 15 minutes.</p>
<p>Enable Power Off</p>	<p>Check the Enable Power Off box and move the slider to set the amount of time to automatically turn off the scanner after your last action. The range is from 1 to 480 minutes. The default is 240 minutes (4 hours). Note the value of "Power Off" has to be greater than or equal to the value of "Energy Saving".</p>

Cache**Mode: None, Page Number, Memory Size.**

This option allows you to assign a specified memory size from the available RAM to process the image data. By specifying a smaller memory size, you can free more memory for other applications you are running. By specifying a larger memory size, you can have more memory to process the image data especially when you have a large amount of documents needed to be scanned.

You can also specify your memory size by the page number. For your information, an A4 color document scanning at 300 dpi consumes approximately 24MB.

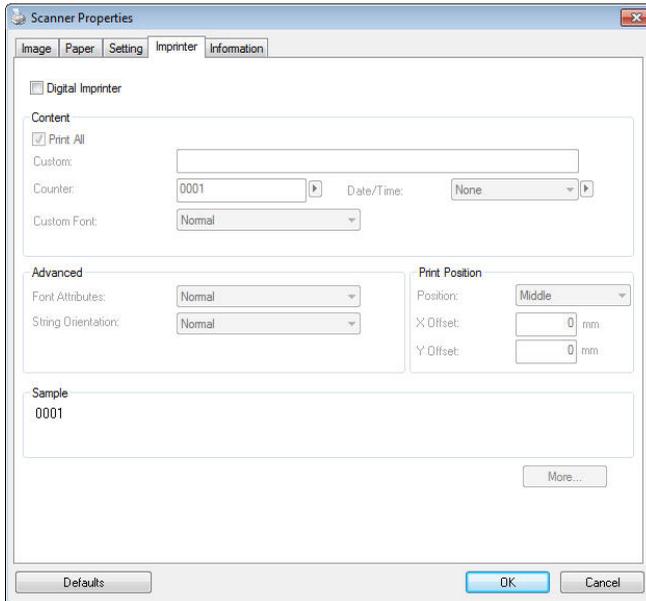
Image Count

When the selected cache mode is "none", the image count option allows you to assign number of pages you need to scan. For example, if you wish to scan the first two pages, simply move the page slider to 2, and the scan action will be stopped when the scanning of the first two pages have been completed.

Show Scanning Progress	Check and the scanning progress bar will be shown during scanning.
Show Warning Message	Check to show the warning messages such as "ADF pad count exceeds 50,000 scans (the number varies based on type of scanner). Please replace the ADF pad and reset the pad count."
Save Settings after Closing	Check to save your scanner properties settings after leaving the dialog box. Next time when you open the Scanner Properties dialog box, the previously saved settings will be shown.

9.13 The Imprinter Tab

The Imprinter tab allows you to print alphanumeric characters, date, time, document count and custom message on your scanned image if digital imprinter is selected or at the back of your document if external imprinter is selected.



Choice: External Imprinter, Digital Imprinter. If you have installed an external imprinter, choose external imprinter. If you do not have an imprinter, choose digital imprinter. Note External Imprinter provides a vertical and rear-side print capability while digital printer provides a horizontal and front-side print capability.

Contents

Print All	<p>Check Print All to automatically print the text at all pages of your documents.</p> <p>Uncheck Print All to print the text for the first page of your documents only.</p>
Custom	<p>Enter your custom text to be included in your print string.</p>
Counter	<p>Show the document count for the scan session. This value is increased sequentially by the scanner.</p>
Date/Time	<p>Choose if you wish to include the date and time in your print string.</p> <p>Format: YYYYMMDDHHSS For example, 20090402170645-check0001 indicates year, month, date, hour, seconds, your custom text and the counter.</p>
Custom Font	<p>Choose your desired font.</p> <p>Choice: Normal, Fixed Width</p> <p>Fixed Width (Mono spaced) fonts have a fixed character spacing. So each character occupies the same width.</p>

Advanced

Font Attributes	<p>Choose your font attributes. Choice: Normal, Underline, Double, and Bold.</p>
------------------------	-----------------------------------------------------------------------------------------

String Orientation	Choose your string orientation. Choice: Normal, Rotated, Vertical, Vertical Inversion, 90 degrees CW, 90 degrees CCW	
	2010abc Normal	2010abc Rotated
	2010abc Vertical	2010abc Vertical Inversion
	2010abc 90 degrees CW	2010abc 90 degrees CCW
	If you check the digital imprinter to stamp text on your scanned image, the illustration of normal and rotated string is shown below:	
2010abc Normal	2010abc Rotated	

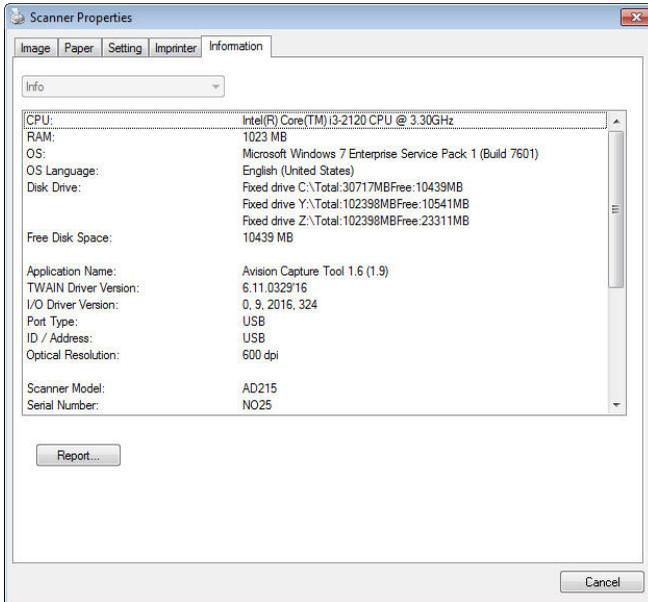
<p>Print Position</p>	<p>Choose the position you wish to print your string. Move the slider to the right to increase the value or to the left to decrease the value. Range: 0~355mm, default:0 mm</p> <p>The value indicates the height from the bottom of your paper to the last letter of your string. This option is available only if an external imprinter is installed.</p> <div data-bbox="520 491 916 774" style="text-align: center;"> <p>The value of Print Position</p> </div>
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Print Position (for digital imprinter)

Choose the position of your printed string. **Choice: Top, Middle, Bottom, Custom.** If Custom is selected, enter the X and Y offset value to specify the position.

9.14 The Information Tab

The Information tab displays the following system and scanner information.



The Information tab dialog box

The "Report" button :

If you encounter any error message while using the scanner, click the Report button. A report.txt file [Windows XP: C:\Documents and Settings\All Users\Application Data\%PRODUCTNAME%; Vista, Windows 7, Windows 8, Windows 10: C:\ProgramData\%PRODUCTNAME% (C: system drive)] will be generated. Please send this file to the nearest service center for trouble shooting.

The “Reset Roller Count” button :

After scanning over a recommended number of pages (refer to subsequent section 7.4 Replacing the ADF Roller) through the ADF, the ADF roller may be worn out and you may experience problems with document feeding. In this case, it is highly recommended to replace the ADF roller with a new one. (Note the replacement of the ADF roller has to be performed only by authorized service center. Therefore, please return your scanner for roller replacement.) After replacing the ADF roller, click the “**Reset Roller Count**” button to reset the roller count.

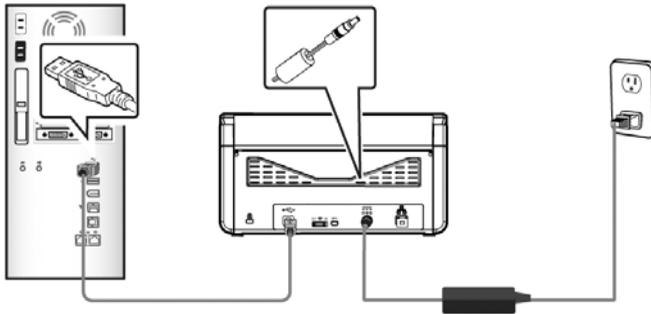
Note :

The lifetime and the replacing procedure vary based on type of scanner.

10. Scanning and Sending the Scanned Images to Your Computer (BM2 Air)

Before You Begin:

Before you begin using the function of [BM2 Air], please make sure you have already installed the scanner driver, Button Manager V2, and connecting to the scanner to your computer via a USB cable as described in the preceding section, chapter 8 Using the Product as a Regular Scanner.



10.1 Installing Button Manager V2

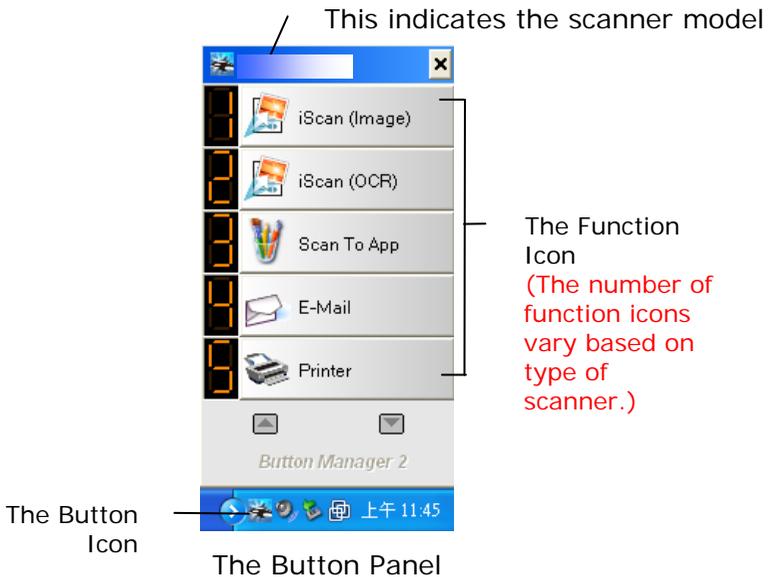
Button Manager V2 provides you an easy way to scan your document and then link the scanned image to your designated software application. All this can be done by a simple touch of the button on the scanner. Yet, before you scan, it is recommended to check the button configurations first to ensure a proper file format and a destination application.

10.2 Checking the Button Configurations before Scanning

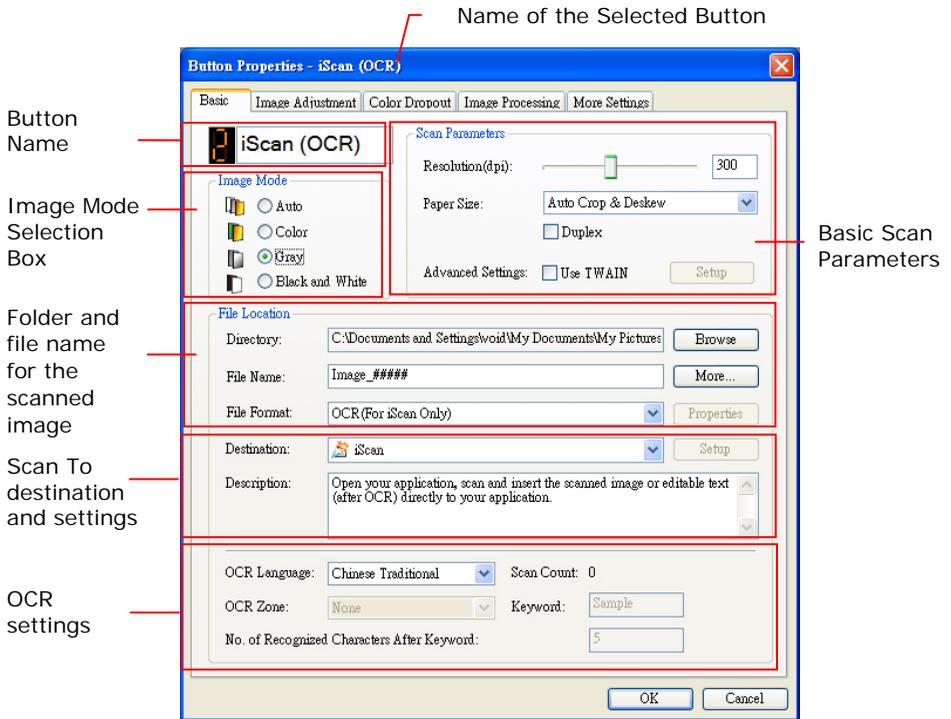
1. Button Manager V2 runs from the system tray. After Button Manager V2 and the scanner driver are properly installed, Button Manager V2 is started and the Button icon will be displayed on the system tray at the bottom right corner of your computer screen.



2. Left-click the Button Manager V2 icon to prompt the following Button Panel.



- The Button Panel shows the first five scanning buttons. Right-click the button (function) you wish to check. The Button Properties window appears.

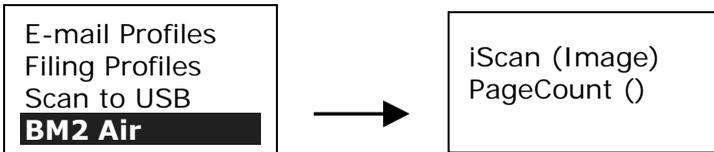


If you wish to change the setting, use this window to reset the setting for the file format, destination application, or other scan settings.

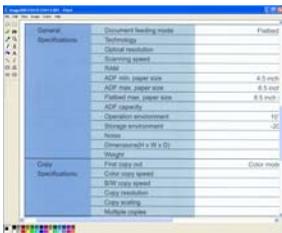
- Click the OK button to leave the window.

10.3 Scanning From One Touch of the Buttons

1. Adjust the paper guide for the width of paper and load the document with their tops into the automatic document feeder.
2. Use ▼ to scroll down to [**BM2 Air**] on the LCD display.



3. Check the button (function) number on the LCD screen to ensure if you are selecting the proper scan settings and destination application. (For example, if you wish to scan with button (function) 3, "Scan to App", which opens Microsoft Paint and displays the scanned image in the window of Microsoft Paint, the LCD screen should show "Function 3").
4. Press the **Scan** button on the scanner.
5. After the scanning is finished, the Microsoft Paint software will be launched and the scanned image appears in the main window of Microsoft Paint as below.



Note:

1. For details information on how to use the Button Manager V2, please refer to the user's manual in the supplied CD.
2. You may also use Button Manager V2 on your desktop by starting Button Manager V2 from All Programs or double clicking the Avison Scanner Utility from the Control Panel.

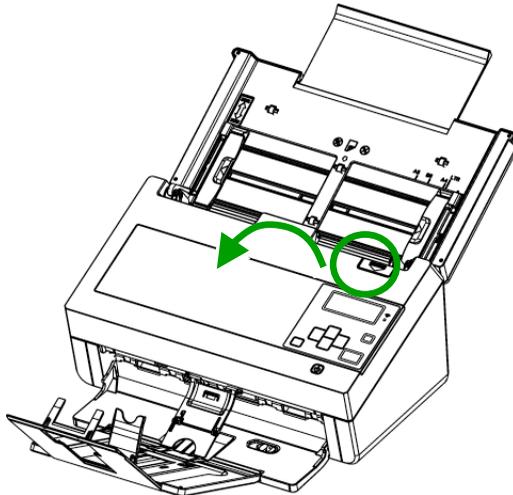
11. Scanner Care

11.1 Cleaning the ADF

From time to time, the Reverse roller and the Feeding Rollers may be contaminated with ink, toner particles, or paper dust. In this case, the paper may not be fed smoothly. Please follow the following steps to clean the Reverse roller and the Feeding Rollers to ensure the best of the scanner.

The Cleaning Steps:

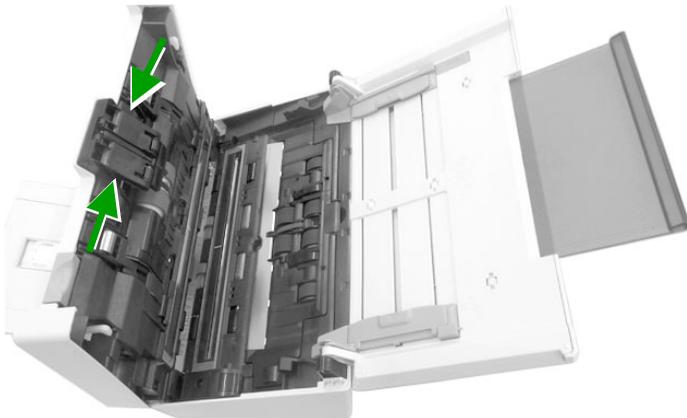
1. Soak a clean cloth with some isopropyl alcohol (95%).
2. Press the ADF release button and open the front door.

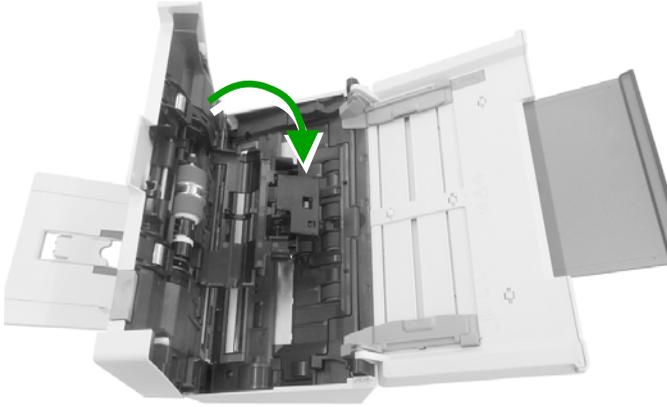


3. Wipe the feeding rollers until they are cleaned.

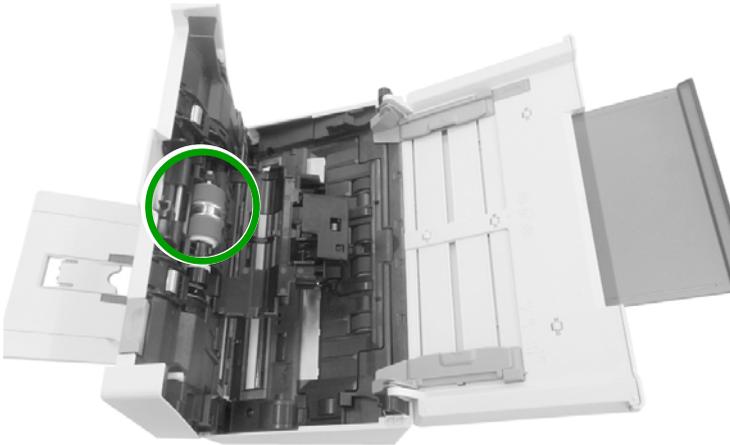


4. Press both sides of the cover of the ADF reverse roller and pull the cover down.





5. Press and wipe the rollers one by one. Rotate the roller until the surfaces are completely cleaned.



11.2 Cleaning the Glass

1. Press the ADF release button. Open the front door.
2. Wet a clean cloth with some isopropyl alcohol. (95%)
3. Wipe the glass as illustrated below by moving the swab from side to side to rid the dust or dirt.

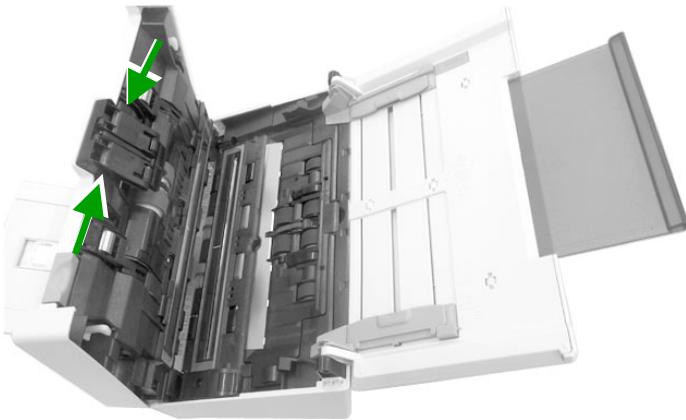


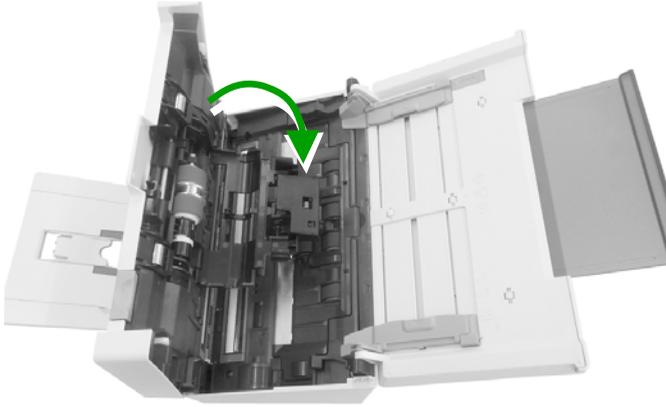
11.3 Replacing the ADF Reverse Roller

After scanning approximately 100,000 pages through the ADF, the reverse roller will be worn out and you may have problems with document feeding. It is time to replace the Reverse roller. For ordering the replacement, please contact your dealer.

Disassembling Procedure

1. Press the ADF release button.
2. Gently open the ADF front door to the left.
3. Hold the reverse roller cover with your fingers as shown and place it down.



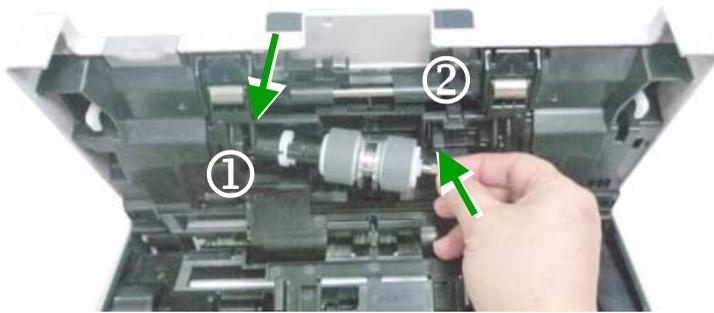


4. Press the right end of the reverse roller externally to detach it from the slot and then detach the left end from its hole.

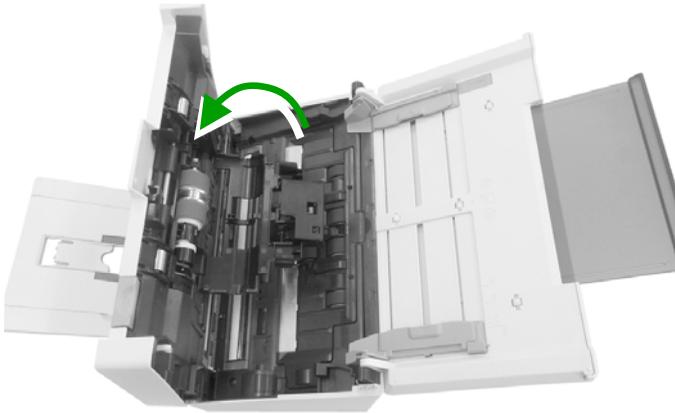


Reassembling Procedure

1. Insert the left end of the reverse roller to the hole of its original place.
2. Insert the right end of the reverse roller to its slot.



3. Close the reverse roller Cover.



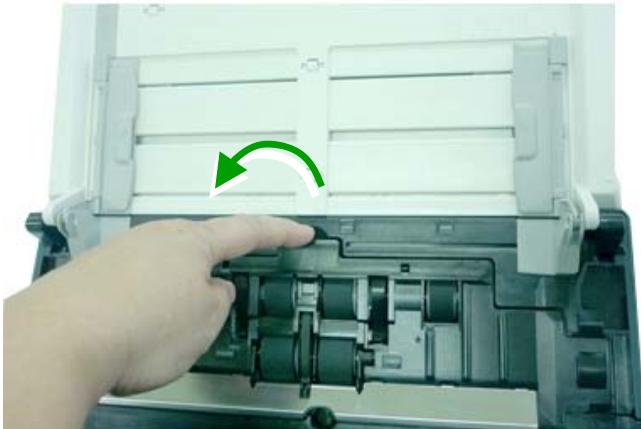
4. Close the ADF cover.

11.4 Replacing the ADF Rollers

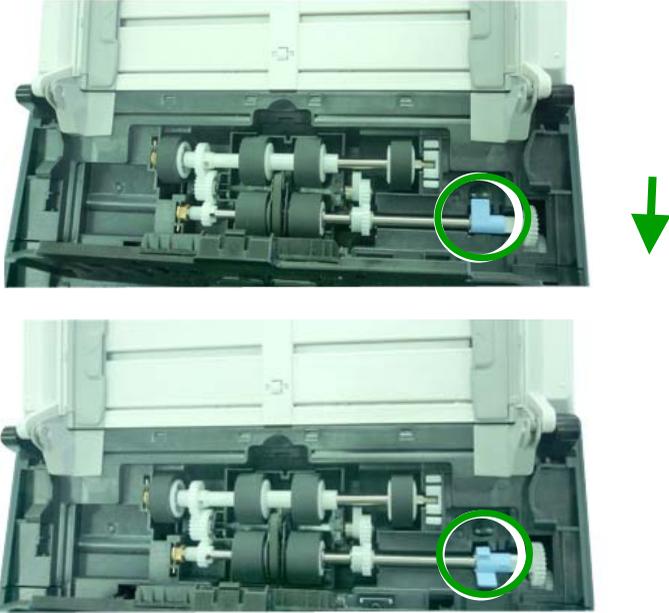
After scanning approximately 200,000 pages through the ADF, the ADF roller may be worn out and you may experience problems with document feeding. In this case, you may need to replace a new ADF roller. For ordering the ADF roller, please consult your nearest dealer and follow the procedure below to replace it.

Disassembling Procedure

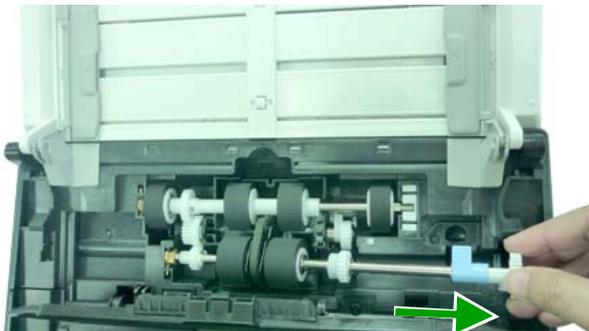
1. Press the ADF release button to open the front door.
2. Pull the center of the roller cover to open it.



3. Move the tab of the ADF roller **DOWN** as indicated.



4. Detach the right end of the ADF roller from the slot and remove the ADF roller.

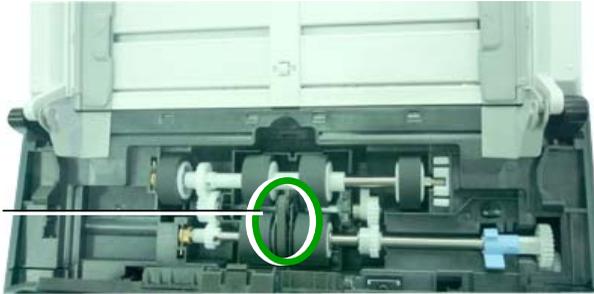


Assembling Procedure

1. Insert the left end of the ADF roller first to its slot and place the ADF roller to its proper position.

Make sure the belt in the center of the ADF roller is installed horizontally with the other rollers as indicated.

The Belt



2. Move the tab of the ADF roller **UP**.



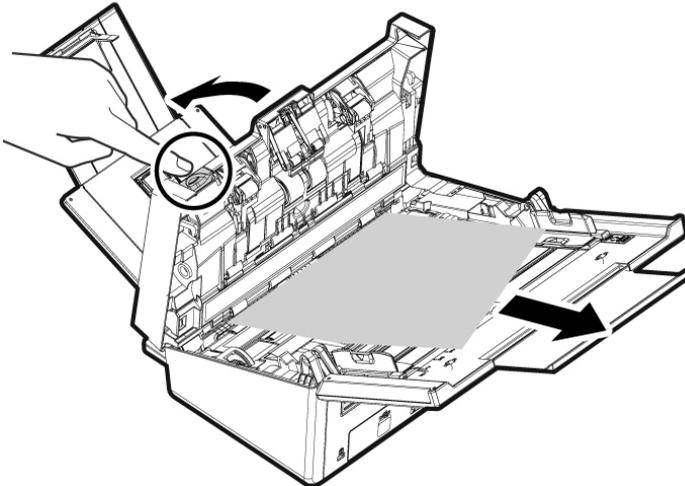
3. Close the ADF roller cover. A snap-in sound could be heard if correctly installed.

12. Troubleshooting

12.1 Clearing a Paper Jam

In the event of a paper jam, follow the procedures below to remove the paper:

1. Press the ADF release button on the right side. Gently open the front door.
2. Carefully pull the paper out of the ADF unit.
3. Close the front door. Your Scanner is now ready to use.



12.2 Questions and Answers

Question:	Paper becomes jammed during scanning.
Answer:	<ol style="list-style-type: none">1) Open the front door.2) Pull out the jammed paper carefully.3) Close the front door.

Question:	More than one sheet of paper is fed into the scanner.
Answer:	<ol style="list-style-type: none">1) Open the scanner front door.2) Remove the multi-fed sheets.3) Close the front door.4) Flatten the corners and edges. Loosen the paper before putting it into the paper guide again.5) Check the feeding roller condition. If necessary, follow the cleaning directions in section 7.1 and perform the cleaning.

Question:	Paper becomes skewed in the scanner.
Answer:	<ol style="list-style-type: none">1) Use the slide guide to keep the paper path straight.2) Check the condition of the feeding roller. If necessary, follow the cleaning directions in Section 7.1 and perform the cleaning.

Question:	Why does my scanned image always come out too dark?
Answer:	<ol style="list-style-type: none">1) Please adjust the screen settings to sRGB.2) Please adjust the brightness settings on the screen from application software.

Question:	When I choose optical resolution to be 600 dpi, the "auto crop" and "deskew" functions will be disabled.
Answer:	Since to perform auto crop and deskew consumes great deal of system memory, it is suggested if you wish to perform "auto crop" and "deskew" functions, please choose your optical resolution to be smaller than 600 dpi to prevent a error message.

12.3 Error Messages and Possible Solutions

Error Code	Message	Solution
59000 59030 59040 59060 59100	Device internal failure	Reboot the machine, and try again. If the error persists, contact service personnel.
592301	Mail server is NULL	1. Check "Mail server" setting. 2. Contact your network administrator for further help
530001	Device internal failure	Reboot the machine, and try again. If the error persists, contact service personnel.
530002	Fail to connect Mail server	Contact your network administrator for further help.
531001	SMTP login name error or SMTP login password error	Check if the login name and password are correct.
530421 531421 532421 533421 534421 536421	SMTP [421] Service not available, closing transmission channel. The Server is going to shut down.	Contact your network administrator for further help.
530440	SMTP[440] mail from account doesn't conform with authentication	The account of from and login must be same.

532450 533450	SMTP [450]Requested mail action not taken: mailbox unavailable	Contact your network administrator for further help.
532451 533451 534451 535451 537451	SMTP [451]Requested action aborted: local error in processing	Contact your network administrator for further help.
533452 535452 537452	SMTP [452]Requested action not taken: insufficient system storage	Contact your network administrator for further help.
531501 532501 533501 534501	SMTP [501]Syntax error in parameters or arguments	1. Check "From" address. 2. Check "To" address. 3. Contact your network administrator for further help.
531504	SMTP [504]Command parameters not implemented	1. Check "From" address. 2. Check "To" address. 3. Contact your network administrator for further help.
533550	SMTP [550]Requested action not taken: mailbox unavailable[E.g., mailbox not found, no access]	Check "To" address.
533551	SMTP [551] User not local: please try again.	1.Check "To" address. 2. "From" address and "To" addresses must be different.

533552 535552 537552	SMTP [552]Requested mail action aborted: exceeded storage allocation	1. Check "To" address. 2. Check mailbox storage allocation. 3. Contact your network administrator for further help.
533553	SMTP [553]Requested action not taken: mailbox name not allowed	Check "To" address.
534554 535554 537554	SMTP [554]Transaction failed	Contact your Network administrator for further help.
538001	Connection broken during data transmission.	1. Check network environment. 2. Check if the disk space of your email attachment is larger than the mailbox quota.
540001 540009 540010 540011 540012 540013 540014 543501 545501 545504	Device internal failure	Reboot the machine, and try later. If the error persists, contact service personnel.
540002 540003	Fail to connect FTP server.	Make sure the FTP server has not been shut down and the port number is correct. If the error persists, contact your network administrator.

540004	FTP login name error	Check your login name and try again.
540005	FTP password incorrect	Check your password and try again.
540006	retry 3 times for path	The FTP's path has some problems. Contact your network administrator for further help.
540007	timeout or Job name is NULL	Input file name within limited duration.
540008	can't get data socket	Check network environment.
540015	Connection broken during data transmission.	Check network environment.
540016	file exist, rename fail	Re-input new file name.
541001 542001 543001 544001 545001 546001 547001 548001	command exceeds maximum size of 256	Reboot the machine, and try later. If the error persists, contact service personnel.
541002 542002 543002 544002 545002 546002 547002 548002	The command transfer fails	Check network environment.

541003 542003 543003 544003 545003 546003 547003 548003	The command reply read fails.	Check network environment.
541004 548004 542004 543004 544004 545004 546004 547004	The FTP server doesn't reply message.	Contact your network administrator.
546005	file transfer fails	Check network environment.
541421 542421 543421 544421 545421 546421 548421	[421] Service not available, closing control connection.	Too many connections from this IP, contact your network administrator.
544450 546450 548450	Requested file action not taken.	The file already exists and is locked by Windows.
546452 548452	Requested action not taken. Insufficient storage space in system.	Ask FTP administrator to increase allotted storage space, or delete unnecessary files.

541500 542500 543500 544500 545500 546500 547500	[500]Codes The command was not accepted and the requested action did not take place.	Contact your network administrator.
541501 542501 544501 546501	[501]Syntax error in parameters or arguments.	Check your input parameters; e.g., make sure there is no wrong characters, spaces, etc.
541502 542502 544502	[502]Command not implemented.	The server does not support this command. Contact your network administrator.
541550 542550 546550	[550]Requested action not taken. File unavailable (e.g., file not found, no access).	Verify that you are attempting to connect to the correct server/location. The administrator of the remote server must provide you with permission to connect via FTP.
546553 48553	Requested action not taken. File name not allowed.	Change the file name or delete spaces/special characters in the file name.
561032	Error share folder name	Please check if the shared folder name is correct.
561003	Error share path	Please check if URL or IP address is correct.
561012	Error account name or password or the date of machine is incorrect.	1. Check if account name or password is correct. 2. Check if current local time on the machine is correct.
561019	No authority to create directory	Check account authority on the shared folder.

564019	No authority to write file	Please check account authority on share folder.
561183	Duplicate directory name	Rename a new directory name.
564183	Duplicate file name	Rename a new file name.
561034	File in use	Please close the file in use.
563021	CIFS service is not ready	1. Please wait CIFS service initialization, and try scan-to CIFS again later. 2. Please check the same host name on different machine.
563039	Disk is full	Please clean up disk space.
562088	Time out	Server busy. Try scan-to CIFS again later.
002013 003205 003206 003207	Paper jam.	Open the front door to remove the jammed paper.
003101	Multiple feed.	Remove paper. Fan your paper and try again.
002014	ADF cover opens.	Close ADF cover.

003005	ADF Bottom Head Light check error.	Restart the device. If the error persists, call service to replace the lamp.
003006	ADF top head light check error.	Restart the device. If the error persists, call service to replace the lamp.
003003	DRAM read and write test error.	Restart the device. If the error persists, call service to replace the main board.
003004	ADF DRAM read and write test error.	Restart the device. If the error persists, call service to replace the main board.
002024	NVRAM read and write test error.	Restart the device. If the error persists, call service to replace the main board.
002037	ADF Bottom head AFE test error.	Restart the device. If the error persists, call service to replace the main board.
000016	UART read and write test error	Restart the device. If the error persists, call service to replace the main board.
000017	Motor Stall	Restart the device. If the error persists, call service to replace the motor.
000020	Download firmware error	Check firmware file and try again.
000022	Lamp off error.	Restart the device. If the error persists, call service to replace the lamp.
000023	Flashrom read and write test error.	Restart the device. If the error persists, call service to replace the main board.

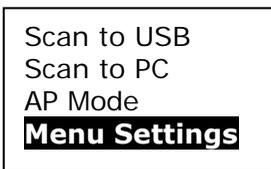
000024	ADF bottom head AFE LVDS test error.	Restart the device. If the error persists, call service to replace the main board.
000025	ADF top head AFE LVDS test error.	Restart the device. If the error persists, call service to replace the main board.
002033	Page skew.	Remove paper. Fan your paper and try again.
000029	ADF AFE read and write test error.	Restart the device. If the error persists, call service to replace the main board.
003211	Page miss-feed.	Make sure the edge of your document slightly touch the paper guides and try again.
002015	ADF no paper.	Load paper into the auto document feeder.

12.4 Accessing the Menu Settings and Service Mode

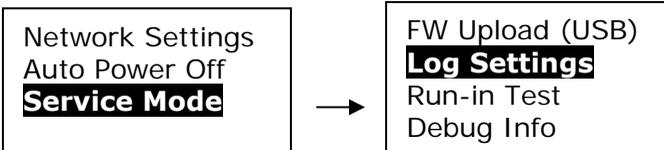
The machine provides the option of menu settings and service mode on the LCD screen for easy troubleshooting or serving purpose. Save your log report and then send to service personnel for a quick troubleshooting solution.

To access the menu settings and service mode, follow these steps:

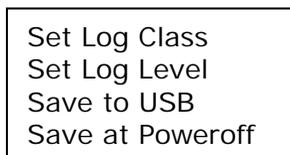
1. Scroll down to [**Menu Settings**] on the LCD screen and press  to select.



2. Select [**Service Mode**] and press  to select.



3. Select [**Log Setting**] and select your Log class and level.
Choice of Class: System, Network, Scan.
Choice of Level: Level 1, Level 2, Level 3.
Save to USB: Save the log file to a removable USB drive.
Save at Poweroff: On/Off.



4. Plug an USB flash drive into the USB flash drive port and then select [**Service Mode**] > [**Log Settings**] > [**Save to USB**] to save the log file to removable USB drive.

Or you may turn [**On**] on the [**Save at Poweroff**] option. The log file will be automatically saved to your USB flash drive whenever the system is turned down and restarted.

5. Choose [**Debug Info**] to record the firmware version.
6. You may send the firmware version and log file to the service personnel for a quick troubleshooting solution.

12.5 Technical Service

Before contacting Avison, please prepare the following information by referring to Section 4.14, The Information Tab:

- Scanner serial & revision number (located on the bottom of the scanner);
- Hardware configuration (e.g., your host CPU type, RAM size, free disk space, display card, interface card);
- The name and version of your scanning software application;
- The version of your scanner driver.

Please call us at:

Headquarter

Avison Inc.

No. 20, Creation Road I, Science-Based Industrial Park,
Hsinchu 300, Taiwan, ROC

TEL: +886 (3) 578-2388

FAX: +886 (3) 577-7017

E-MAIL: service@avision.com.tw

Web Site: <http://www.avision.com.tw>

US and Canada Area

Avison Labs, Inc.

6815 Mowry Ave., Newark CA 94560, USA

TEL: +1 (510) 739-2369

FAX: +1 (510) 739-6060

E-MAIL: support@avision-labs.com

Web Site: <http://www.avision.com>

China Area

Hongcai Technology Limited

7A, No. 1010, Kaixuan Road, Shanghai 200052 P.R.C.

TEL : +86-21-62816680

FAX : +86-21-62818856

E-MAIL : sales@avision.net.cn

Web Site: <http://www.avision.com.cn>

Europe Area

Avision Europe GmbH

Bischofstr. 101 D-47809 Krefeld Germany

TEL: +49-2151-56981-40

FAX: +49-2151-56981-42

E-MAIL: info@avision-europe.com

Web Site: <http://www.avision.de>

Espaço Brasil

Avision Brasil Ltda.

Avenida Jabaquara, 2958 - Cj. 75 - Mirandópolis –

CEP: 04046-500 - São Paulo, Brasil

TEL: +55-11-2925-5025

E-MAIL: suporte@avisionbrasil.com.br

Web Site: <http://www.avisionbrasil.com.br>

13. Product Specifications

All specifications are subject to change without notice. For the most up-to-date and detailed specifications, please refer to our web site at <http://www.avision.com>

Model Number :	FL-1401B (Duplex Scanner)
Optical Resolution:	600 dpi
Scanning Modes:	Black & White Gray Color
ADF Capacity:	Up to 80 pages (70 g/m ²) (20 lb.)
Max. Document Size:	216 x 356 mm (8.5 x 14 in.)
Min. Document Size:	50 x 50 mm (2 x 2 in.)
Paper Weight:	27 ~ 413 g/m ² (7 ~ 110 lb.)
ID Card Thickness:	<1.25 mm (0.05 in.)
Connectivity:	Hi-speed USB 2.0, RJ-45 Ethernet 10/100/1000 Mb, Wi-Fi
Power Source:	24V, 2.0A
Operating Temperature:	10°C~35°C
Dimensions: (WxDxH)	
Open ADF	316 x 680 x 239 mm (12.4 x 26.8 x 9.4 in.)
Close ADF	316 x 191 x 168 mm (12.44 x 7.52 x 6.61 in.)
Weight:	4.1 kg (9.04 lb.)

Wi-Fi Specifications:

Model: GWF-7A05

Main Chipset	MT 7601U
Host interface	USB 2.0
LED	Link/Activity
Antennas	Built-in onboard PCB antenna
Frequency Range	ISM band, 2412~2483.5MHz (depends on country region)
Transmit Power(EIRP)	802.11b (CCK) 11Mbps: 18+/-1dBm 802.11g (OFDM) 54Mbps: 15+/-1dBm 802.11n (HT20@MCS7) 14+/-1 dBm, (HT40@MCS15) 14+/-1 dBm
Receive Sensitivity	802.11b: -88+/-1dBm; 802.11g: -73+/-1dBm 802.11n (HT20), -71+/-1dBm; 802.11n (HT40), -68+/-1dBm
Operating System	Windows XP/Vista/7; Linux 2.6.X
Security	WEP 64/128, WPS; WPA/WPA2 (TKIP,AES); WAPI
Voltage Range/Current	DC 5.0V +/-5% /<150mA @802.11g