



EXPERT II Series User Manual



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NOTICE

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Important Information

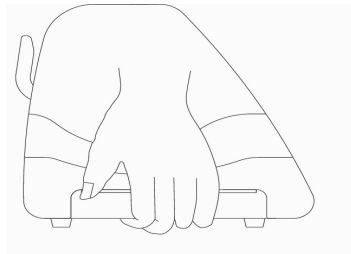
Thank you for purchasing the **Expert II Cutting Plotter**.

Before you use the cutting plotter, please make sure that you have read the safety precautions and instructions below.

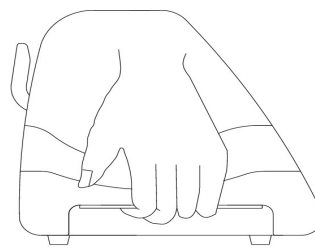


SAFETY PRECAUTIONS!

- For safety concern, please always hold the cutter firmly **from the bottom** while moving it. Do not move the cutter by clasping the depression area on both sides.



O (correct)



X (Incorrect)

- Do not shake or drop the blade holder, a blade tip can fly out.
- During an operation, do not touch any of the moving parts of this machine (such as the carriage). Also be careful to make sure that clothing and hair do not get caught.
- Always connect the power cable to a grounded outlet.
- Always use the accessory power cable which is provided. Do not wire the power cable so that it becomes bent or caught between objects.
- Do not connect the power cable to branching outlet to which other machines are also connected, or use an extension cable. There is danger of overheating and of mis-operation of the machine.
- Keep the tools away from children where they can reach.
- Always put the pinch rollers within the white marks.

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Chapter 1 General Information

1.1 Introduction


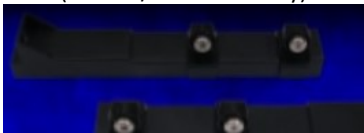





Expert II series cutting plotters have been designed to produce computer-generated images or perform contour cutting on sheets or rolls of vinyl media. In addition to performing quality cutting on sheet or rolls of media, Expert II series cutting plotters can also be used as a pen plotter.

This manual covers the following models of Expert II series cutting plotters:

.Ex II-24	for media width: 50mm(1.97") ~ 719mm(28.3")
.Ex II-24LX	for media width: 50mm(1.97") ~ 719mm(28.3"), with AAS function
.Ex II-52	for media width: 50mm(1.97") ~ 1470mm(57.9")
.Ex II-52LX	for media width: 50mm(1.97") ~ 1470mm(57.9"), with AAS function

1.2 Package Items

The package of Expert II contents the items listed below, please check carefully.
If you find any item missing, please consult your local dealer for further assistance.

Item	Quantity	
Cutting Plotter	1 Set	
Accessories	1 Set	
AC Power Cord 	Desktop Support Brackets (EX II-24/EX II-24LX only) 	Cutting Pad 
USB Cable (1.8m) 	Cushion in tool carriage 	Tweezers 
Paper Slicer 		

1.3 Product Features

The followings are the main features of the Expert II cutting plotters:

- Dual-port connectivity – USB & Serial interface.
- Up to **350** gram cutting force.
- Up to **705** (EXII-24(LX) / **635** mm (EXII-52 (LX)) per second cutting speed (at 45 degree direction.)
- Guaranty **3** meter (10') tracking.
- Enhanced Automatic-Aligning System (AAS II) for auto contour cutting (only for LX models.)

1.4 The Appearance (EX II)

1.4.1 The Front View

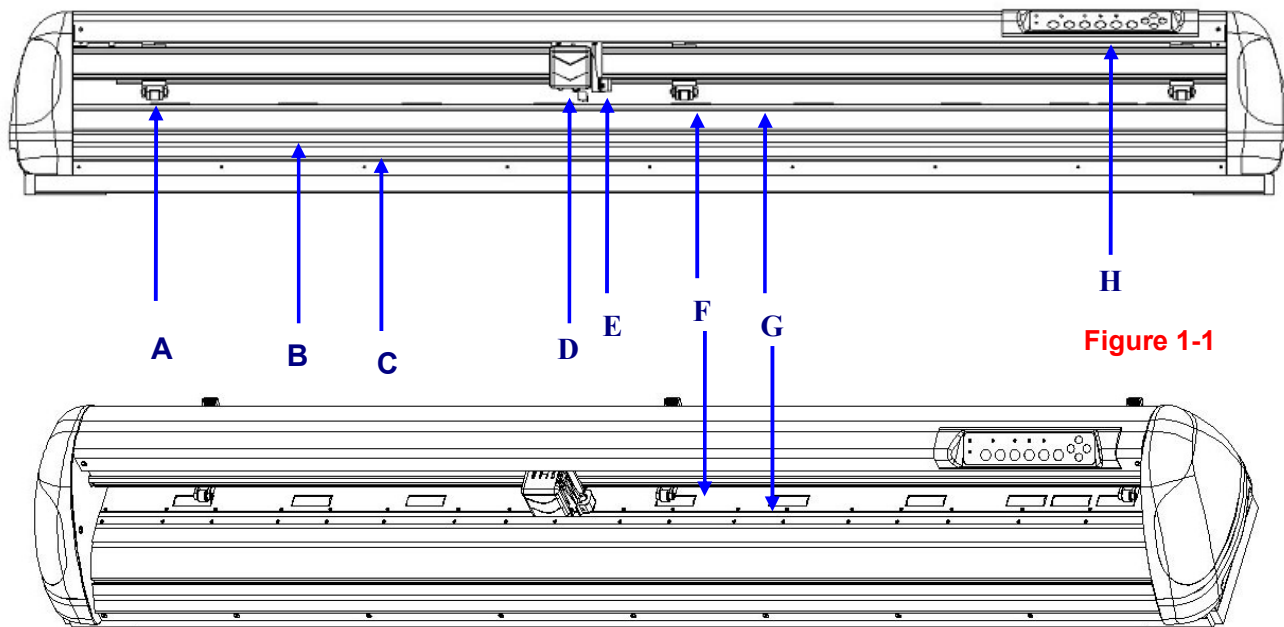
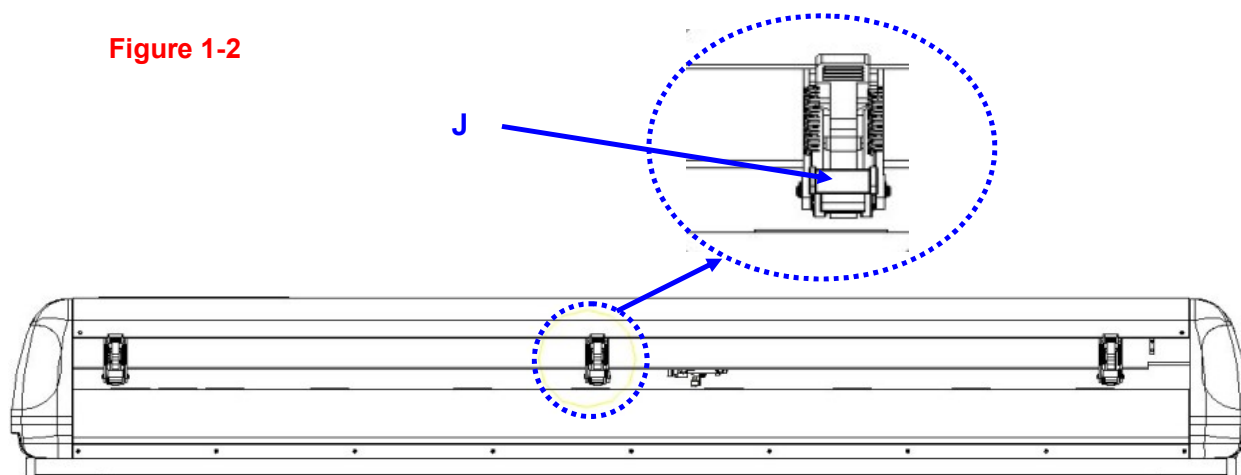


Figure 1-1

Object	Description	
A	Primary Pinch Roller	To help hold the media during cutting.
B	Slicing Groove	To help slice off media.
C	Alignment Ruler	To align media with clear guideline marks
D	Tool Carriage	Performs the cutting or plotting with the installed blade or pen.
E	Blade Holder	To hold the blade.
F	Platen	The surface for holding and supporting media in operation.
G	Cutting Pad	To protect blade and plate in operation.
H	Control Panel	To consist of 10 control keys and 6 LED lights.
J	Grid Drum	To move media back and forth in operation

Figure 1-2



1.4.2 The Side Views

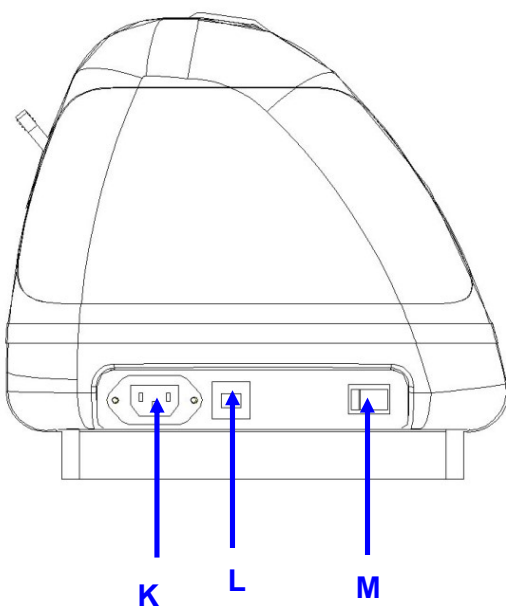


Figure 1-3

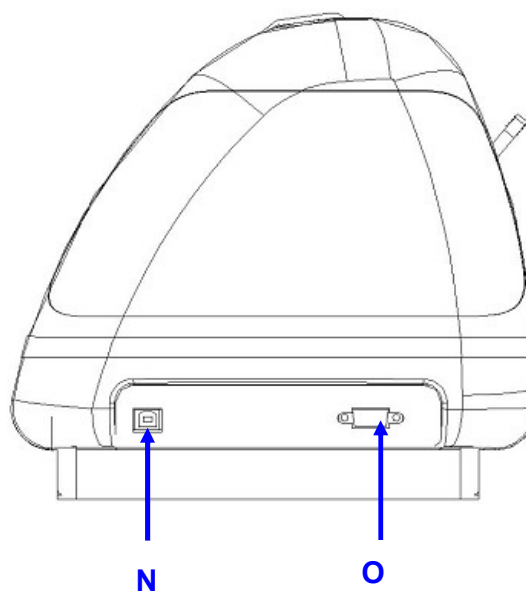


Figure 1-4

Object		Description
K	AC Power Connector	To insert the AC power cord.
L	Fuse	3 Amp.
M	Power Switch	To turn on or off the machine.
N	USB Connector	To connect the machine and a computer through a USB cable.
O	Serial Interface Connector	To connect the machine and a computer through a RS-232 cable.

Chapter 2 Installation

2.1 Precaution

Please read below information carefully before you start installation.

Notice 1

Make sure the power switch is off before installing the cutting plotter.
Carefully handle the cutter to prevent any injuries.

Notice 2 Choosing a proper place before setting up the cutting plotter

Before installing your cutting plotter, select a suitable location, which meets the following conditions.

The machine can be approached easily from any direction.

Keep enough space for the machine, accessories and supplies.

Keep the working area stable, avoiding severe vibration.

Keep the temperature between **15 and 30 °C (60-86°F)** in the workshop.

Keep the relative humidity between **25% and 75%** in the workshop.

Protecting the machine from dust and strong air current.

Preventing the machine from direct sunlight or extremely bright lighting.

Notice 3 Connecting the Power Supply

Check the plug of the power cord to see if it mates with the wall outlet. If not, please contact your dealer.

Insert the plug (male) into a grounded power outlet.

Insert the other end (female) of power cord into the AC connector of cutting plotter.

Notice 4 Tightening or Loosing Screws with Screwdriver

Whether manual or electric screwdriver, be careful not to use excess torque force when tightening or loosening screws. When tightening or loosening iron and stainless steel screws, please refer to the following screw torque standard table, other materials screws are not included.

Screw diameter	Torque value (kgf-cm)
	Torque standard for high hardness materials
M3	6
M4	16
M5	30
M6	50

2.2 Stand Installation

(Stand is an optional item for 24 inch models.)

2.2.1 Stand Installation

Please follow the procedures below for assembling the stand.

Step 1 Please examine the supplied items in the accessory box of the stand carton before you install:

Stand is an optional item for Expert II, Item List :

- 1 Left side vertical stand
- 1 Right side vertical stand
- 1 Support for left side
- 1 Support for right side
- 1 Stand Beam
- 2 Bottom Stands with wheels
- 2 Sliding brackets for paper take up
- 1 Hex Wrench (M5)Φ4
- 28 Socket flat head screws(M6*12L)
- 1 Installation Guide

Step 2

Position the Left side vertical stand perpendicularly to part ❶ and put the screws into the holes and tighten them to form a left side T-stand (Figure 2-1). Repeat the same steps with the Right side vertical stand.

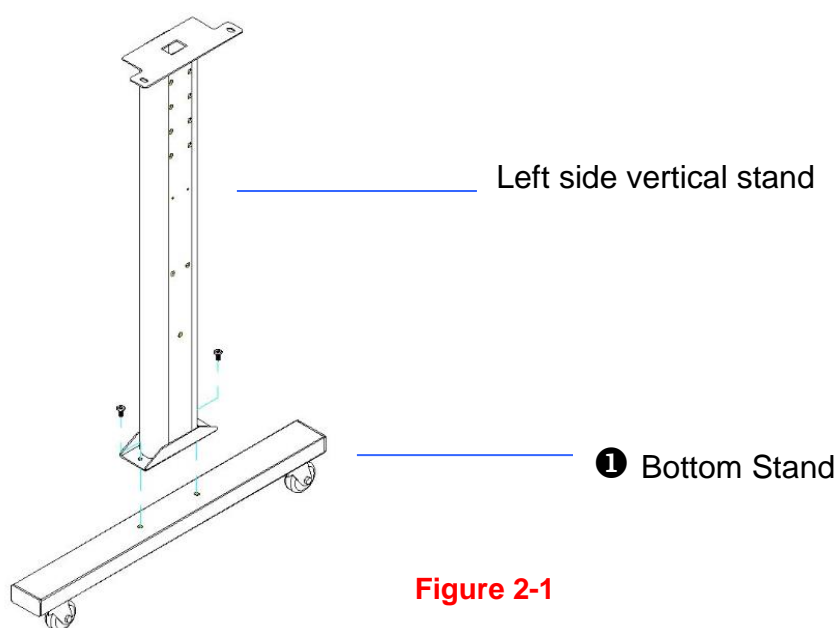
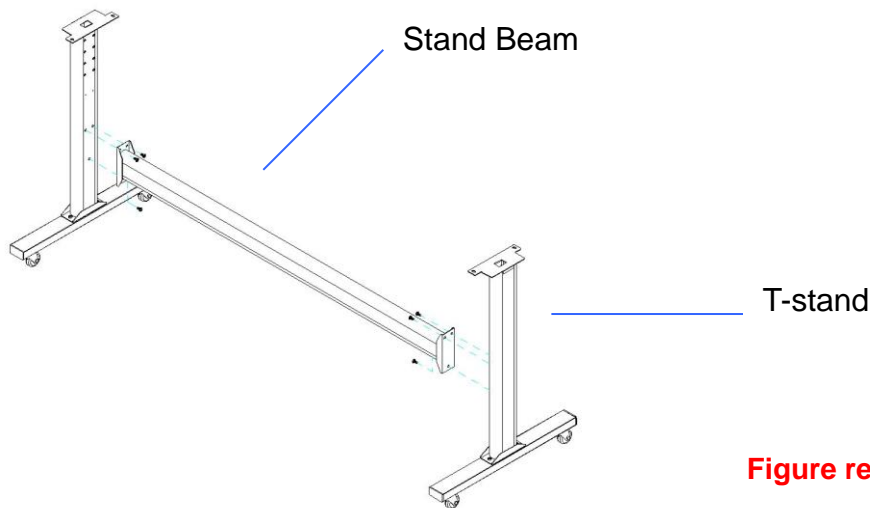


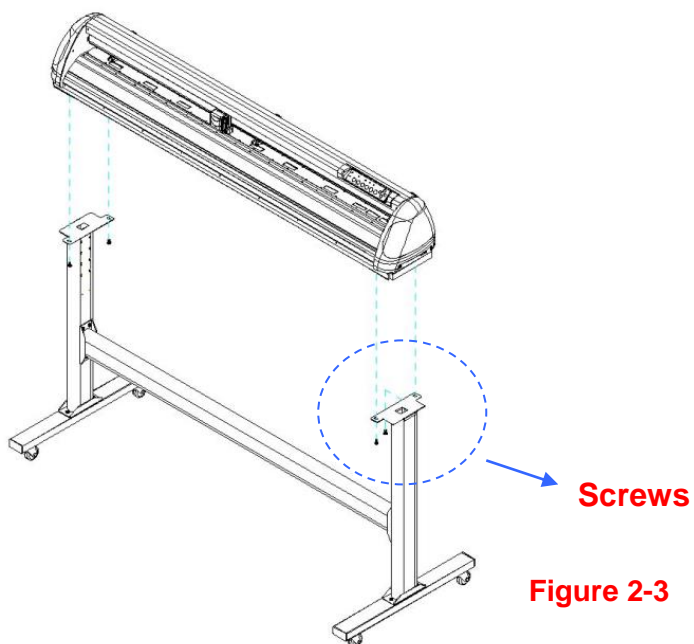
Figure 2-1

Step 3

Place the stand beam upright on the T-stand and put the screws into the holes but do not tighten them at this step. There is hexagon socket head screws fasten on the T-stand on both side taken as locating pins.

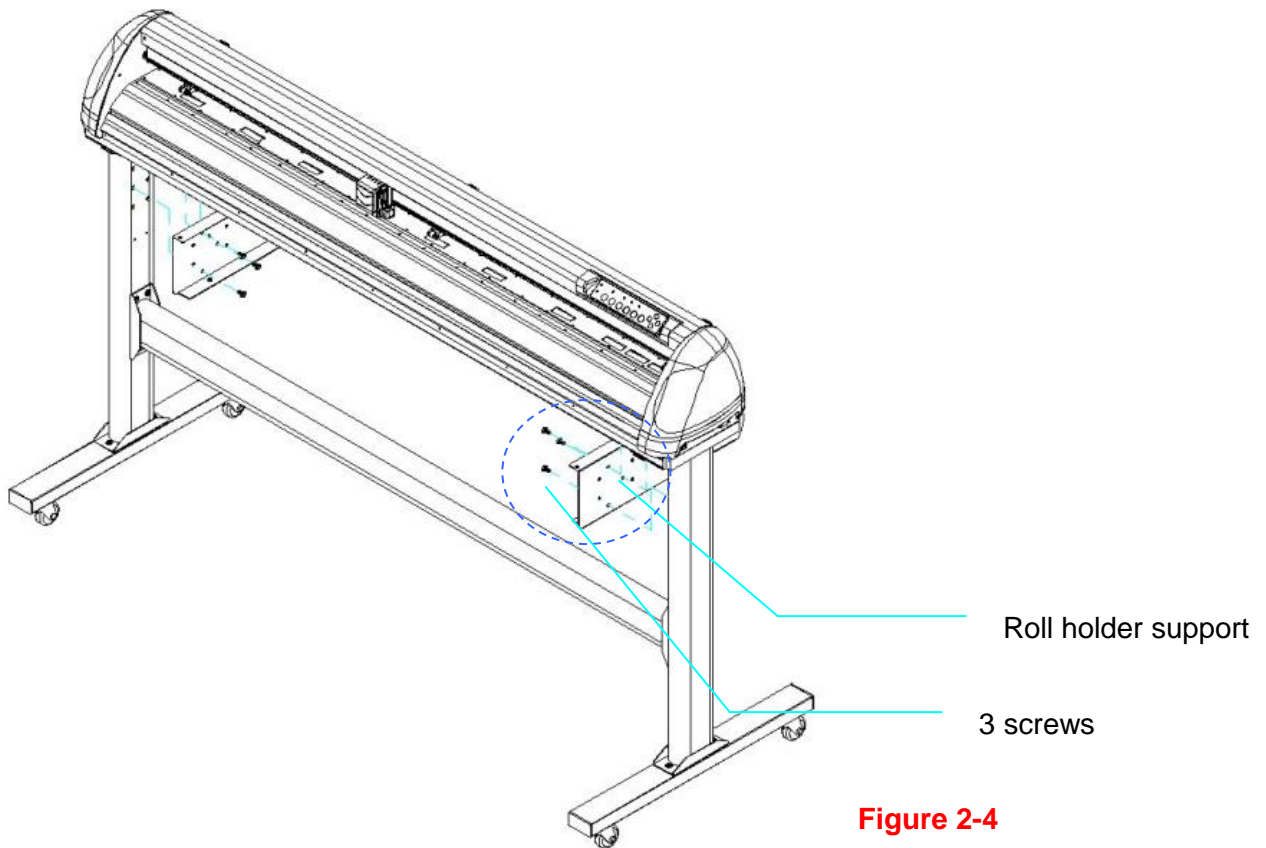
**Figure re 2-2****Step 4**

Remove the cutting plotter from the carton. Position the stand under the plotter, on the bottom of the plotter, there is one hole on each side in the position corresponding to the locating pins, so the locating pins can be located into the holes. Then insert the screws into the holes on the stand to lock the plotter and tighten them up as shown in Figure 2-3.

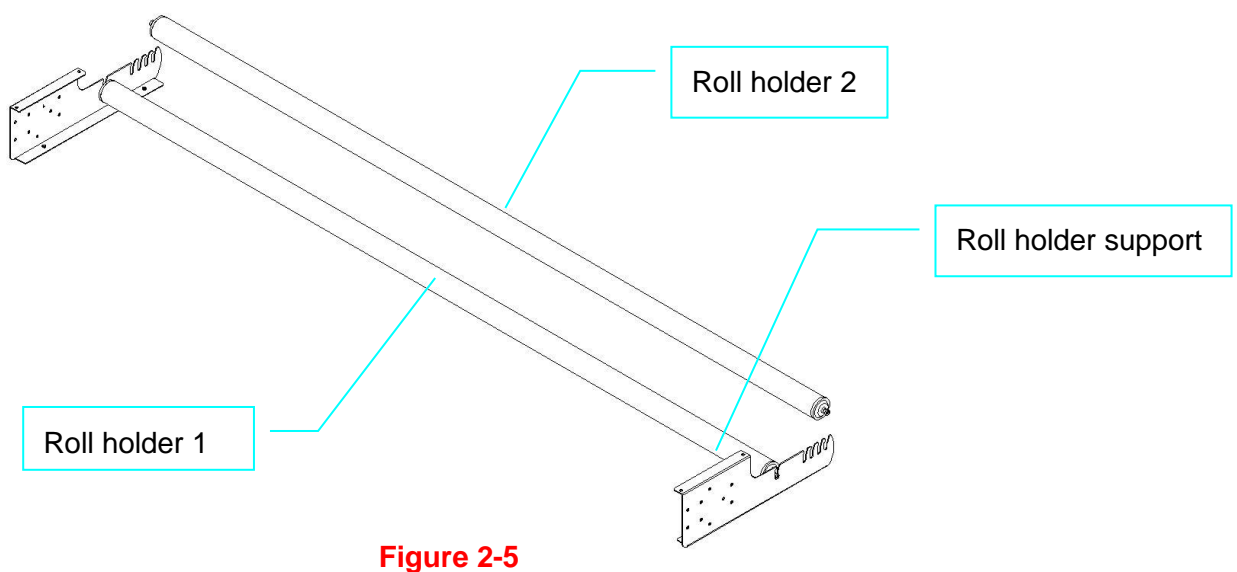
**Figure 2-3**

Step 5

Insert the roll holder support with the screws into the holes of the stand, and then tighten them up as shown in Figure 2-4. You could decide roll holder support's position by inserting into different holes.

**Step 6**

Place two roll holders onto the roll holder support. (Figure 2-5)



Step 7

The complete picture will be shown like below. (Figure 2-6)

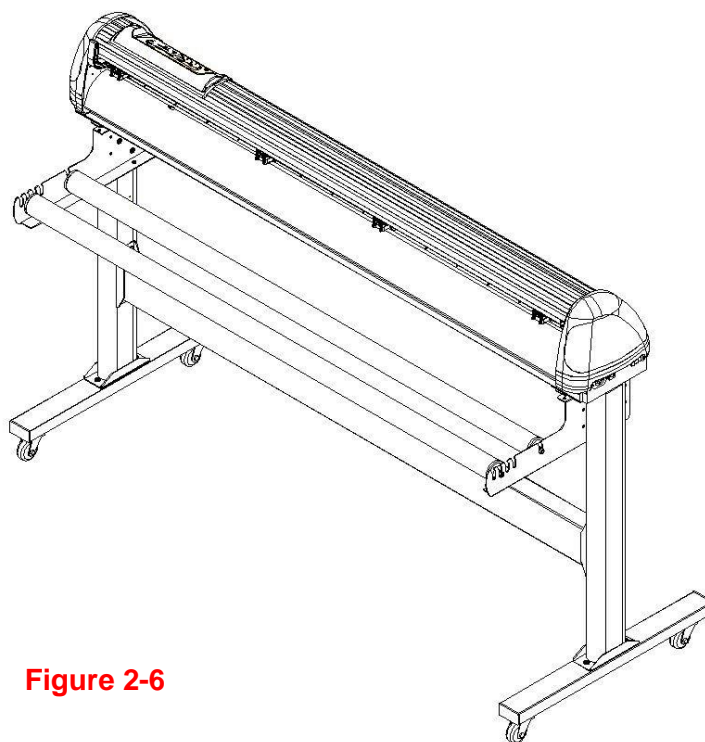
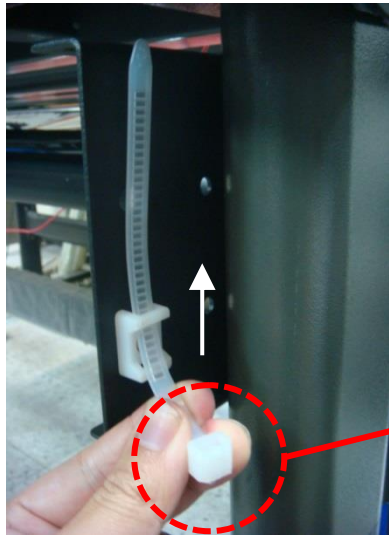


Figure 2-6

2.3 USB Cable Tie and Saddle

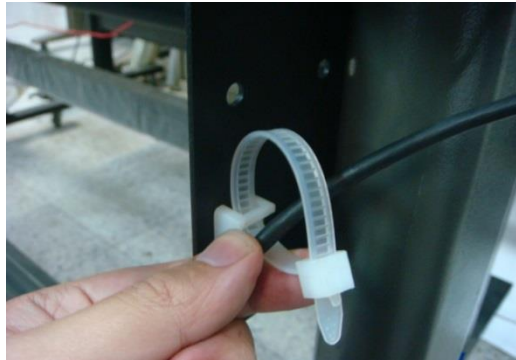
The USB cable tie and saddle assembly for the stands with Flexible Media Support System only.

Step 1 Insert the cable tie into the upper hole of cable saddle from bottom to top.



This side up

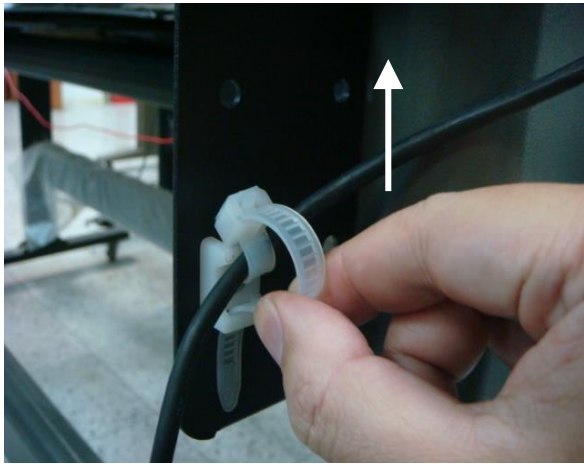
Step 2 Place the USB cable into the cable tie and tighten the cable tie.



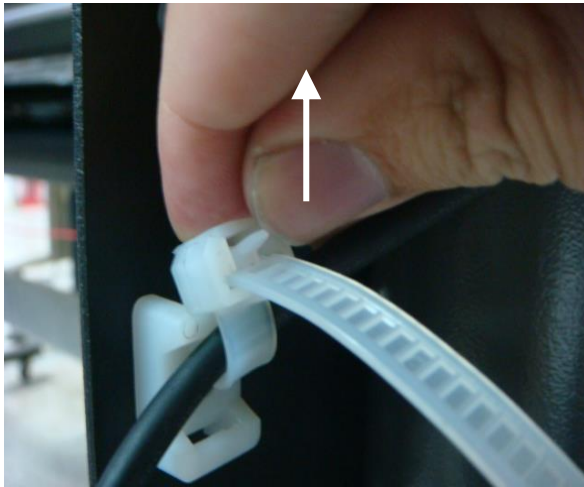
Step 3 Insert the cable tie end into the lower hole of cable saddle to finish the job.



Untied way: pull out the cable tie → pull up the pin → release the cable tie.



Pull out the cable tie



Pull up the pin



Release the cable tie

2.4 Blade Installation

Figure 2-7 is the illustration of the blade holder. Insert a blade into the bottom of the blade holder and remove the blade by pushing the pin. Make sure that your fingers are away from the blade tip.



Figure 2-7

Step 1

Install blade (Figure 2-8).



Figure 2-8

Step 2

Push the blade to the bottom of the blade holder (Figure 2-9).



Figure 2-9

Step 3

Adjust the blade tip to suitable length by screwing “Blade tip adjustment screw” clockwise or count-clockwise. (Figure 2-10).



Figure 2-10

Tips:

“The proper length” means the blade’s length is adjusted 0.1mm more than film’s thickness. That is, if the thickness of film is 0.5mm, then blade’s length is properly adjusted 0.6mm and it can completely cut through the film layer yet avoid penetrating the backing.

Step 4

Insert the blade holder into tool carriage. Please note the outward ring of the holder must put into the grooves of carriage firmly (see Figure 2-11), fasten the case (Figure 2-12).



Figure 2-11



Figure 2-12

Step 5

Use the reversing steps to remove the blade holder.

Step 6

Eject the blade: **Push “Blade eject pin” to eject blade when the blade needs to be replaced.**

Caution!!

The blade will lose its sharpness after a period of usage, the cutting quality might be affected. By increasing the cutting force, it might do the trick. However, once the blade is worn out and no longer provides a reliable cutting, you should replace a new one. The blade is consumable and must be replaced as often as necessary to maintain the cutting quality. The quality of the blade deeply affects cutting quality. So be sure to use a high quality blade to ensure good cutting results.

Tips - When to replace a new blade:

- ✓ If the blade is broken, you have to replace a new one.
- ✓ If cutting quality is not as good as usual, you may need to replace a new one.
- ✓ If the material cannot be cut through by higher cutting force, you may need to replace a new one.

2.5 Media Loading

2.5.1 Loading the Sheet Media

To load the media properly, please follow the procedures below:

Step 1

Lift the 2 levers at the back side of the cutter to lift the pinch rollers (Figure 2-13).

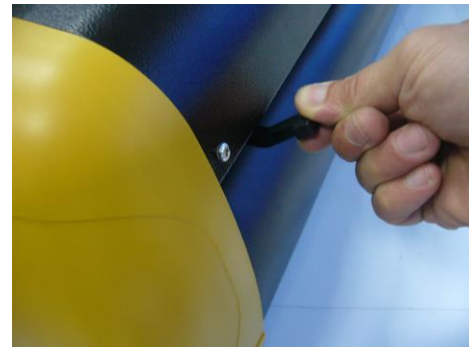


Figure 2-13

Step 2

Load your media on the platen and slide it under the pinch rollers from either the front side or the backside. The **alignment rulers** on the platen extension will help you to adjust the media precisely (Figure 2-14).



Figure 2-14

Step 3

Then move the pinch rollers manually to the proper position. Be sure the pinch rollers must be positioned above the grid drum. The **stickers** on the main beam show the position of the grid drums (Figure 2-15).



Figure 2-15

Stickers

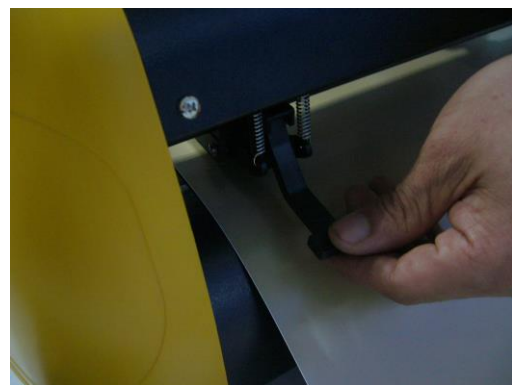
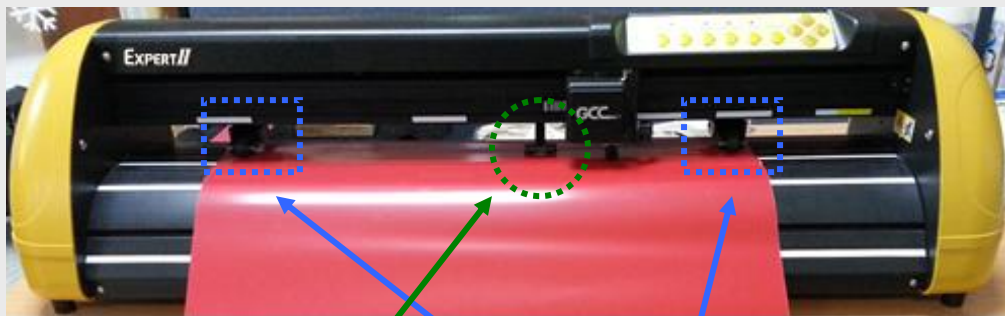


Figure 2-16

CAUTION!!!

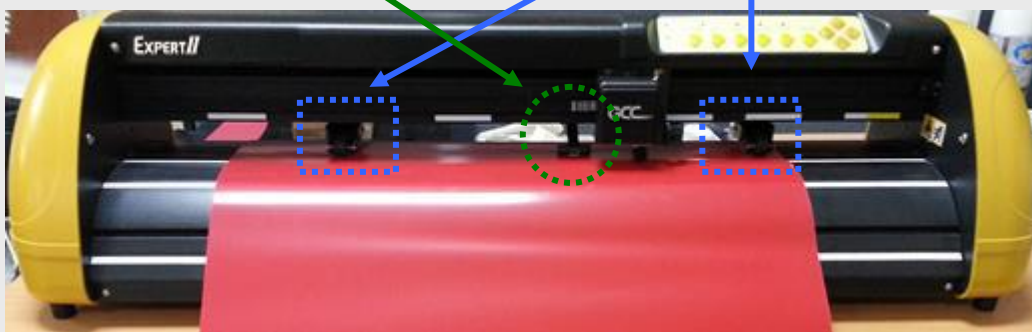
- ✓ Make sure the Primary and secondary pinch rollers are set to right positions.
- ✓ Position the Primary Pinch Rollers at the right and left sides of media.
- ✓ Position the Secondary Pinch Roller at the center of media.

Note: Expert II serves as an illustrator here.

(O)**Correct****Figure 2-17****(X)****Incorrect**

Secondary Pinch Roller

Primary Pinch Roller

**Figure 2-18****Step 4**

Push the lever backward to lower down the pinch rollers (Figure 2-16).

Step 5

After turn on the power, the tool carriage will measure the size of the media automatically. And the plotting cutter begins to work.

Note:

- ✓ Always adjust the position with the pinch rollers raised.
- ✓ Please reposition the pinch roller by holding the center of the pinch roller and moving it from the rear end of the machine. (Figure 2-19)
- ✓ DO NOT move the pinch roller by holding its front rubber roller (Figure 2-20).

**Figure 2-19****(O)****Correct****Figure 2-20****(X)****Incorrect**

2.5.2 Loading the Roll Media

You can use the stand. Please refer to Chapter 2.2 for hardware setup, and Chapter 2.5.1 for media loading.

2.5.3 How to change the poll size without turning off the machine?

Have the machine on-line, press origin set once and the red error light will start blinking, then pressed again and the machine will start moving to get the new size. Then open the VLCD and under the poll size you will find the new measurements.

2.6 Cable Connection

The cutting plotter communicates with a computer through a **USB (Universal Serial Bus)** or a **Serial port (RS-232C)**. This chapter shows you how to connect the cutting plotter to a host computer and how to set up the computer and cutting plotter interconnection.

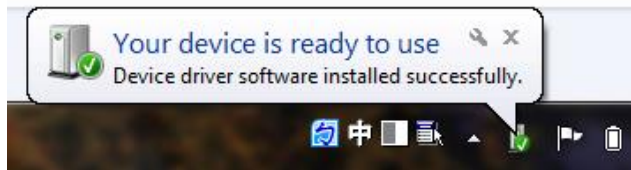
NOTICE: When USB connection is enabled, serial port will be disabled automatically.

2.6.1 USB Interface

Expert II series build-in USB interface are based on the Universal Serial Bus Specifications Revision 2.0 (Full Speed).

2.6.1.1 Connecting your GCC cutter

1. Turn on the machine.
2. Connect the USB connector to the machine and then USB driver will installed automatically. It will take a few minutes to find the device. Please DO NOT disconnect the USB cable until the installation has completed.
3. You can double click the USB icon on the taskbar to make sure the USB device is detected.



2.6.1.2 Installing the driver

Use the USB One-click Installation for quick driver installation. Follow the simple steps below for driver setup.

Caution!!

- ✓ **If you are using Windows 7 and above as your operating system, make sure you log in using the “Administrator” account.**

Step 1 Visit GCC website and go to “SUPPORT” page to download the user manual, driver and software (<https://www.gccworldnew.com/download.php>).



Step 2 You may use search function or directly click the product category to choose the model you want.

Download Area

Download Area

enter keywords to search

SEARCH

Or browse by machine model



Vinyl Cutter



Laser Engraver



Laser Cutter



Download Area

Vinyl Cutter

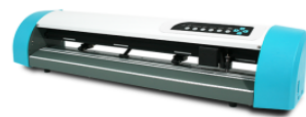
Vinyl Cutter



Expert II A



i-Craft™ 2.0



AR-24



Expert II

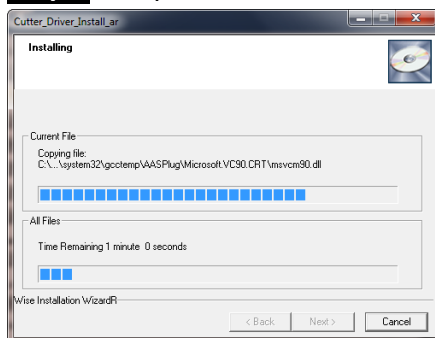


Puma IV

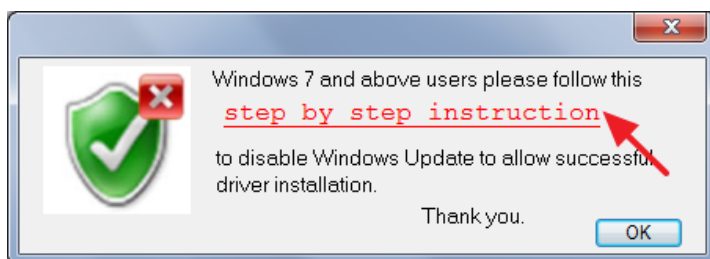


Jaguar V / Jaguar V (PPF)

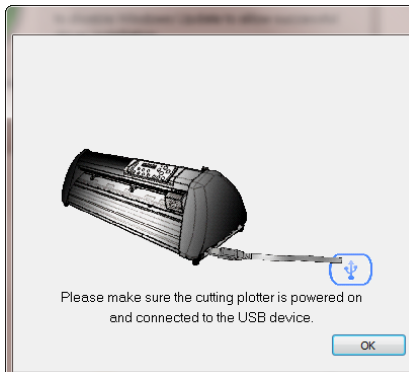
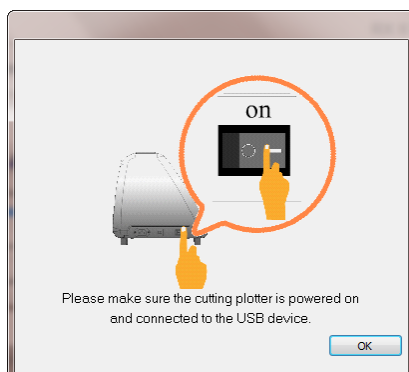
Step 3 Unzip the file and double click the driver.exe to start installing the Driver and AAS plug-in.



Step 4 If you were Windows 7 and above users, please click on the **red words** to instruct you how to disable Windows Update to allow success driver installation. And then click OK to next step.



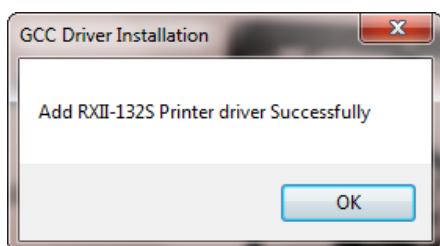
Step 5 Please make sure the cutting plotter is powered on and connected to the USB device, and then click OK to next step.



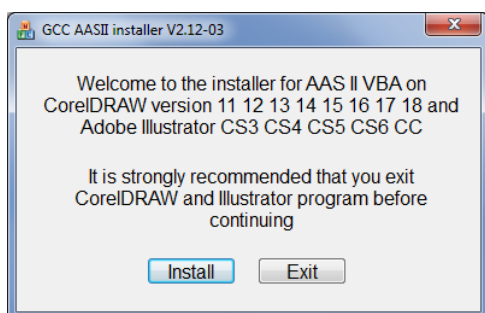
Step 6 Confirm to close all running application programs before you start installing the driver, and then click OK.



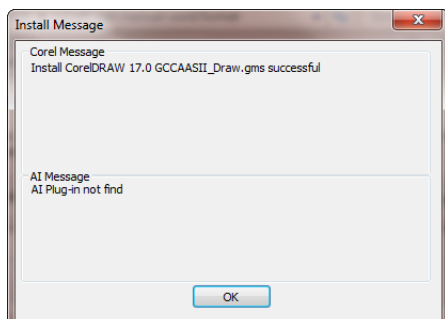
Step 7 The installation will take a few minutes to complete and you will see a message below and click on “OK” upon completion. Enjoy your GCC cutter!



Step 8 If you want to install AASII VBA on CorelDRAW and Adobe Illusatrator, exit CorelDRAW and Adobe Illusatrator program, and then click on “Install.”

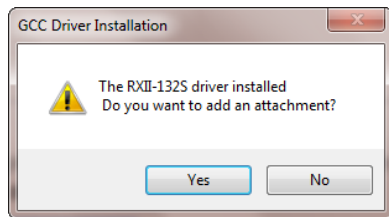


Step 9 Check Install Message to confirm CorelDRAW and AI version and then click OK.

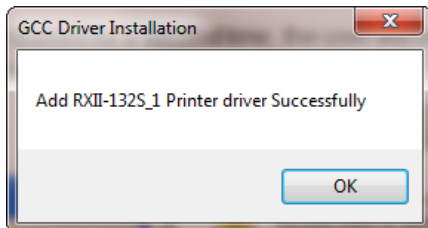


Note:

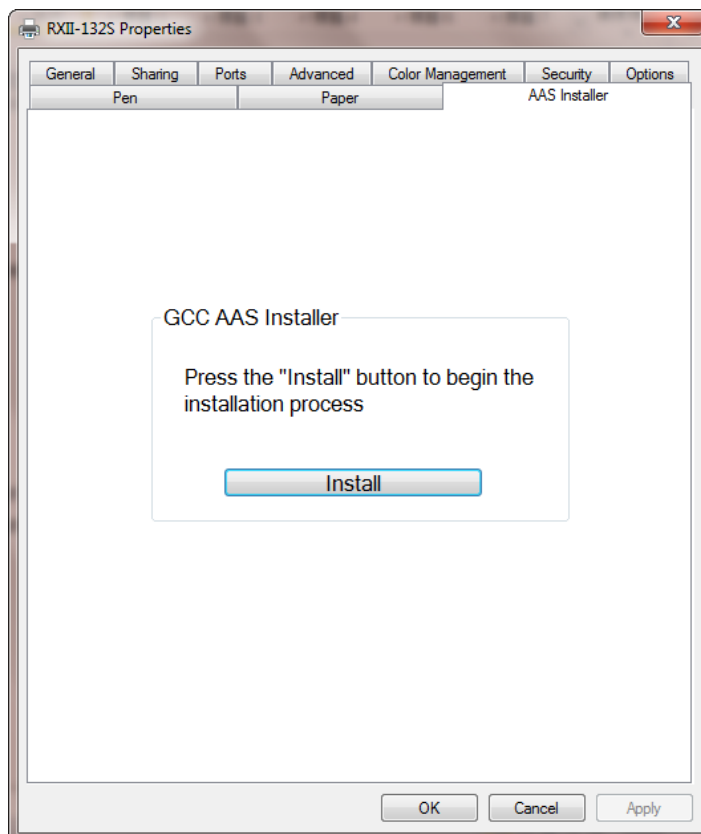
- (1) If the driver is being installed for a second time, the user will be prompted as to whether a second copy of the driver installation is required.



- (2) If the user selects yes, a second copy of the driver will be installed.



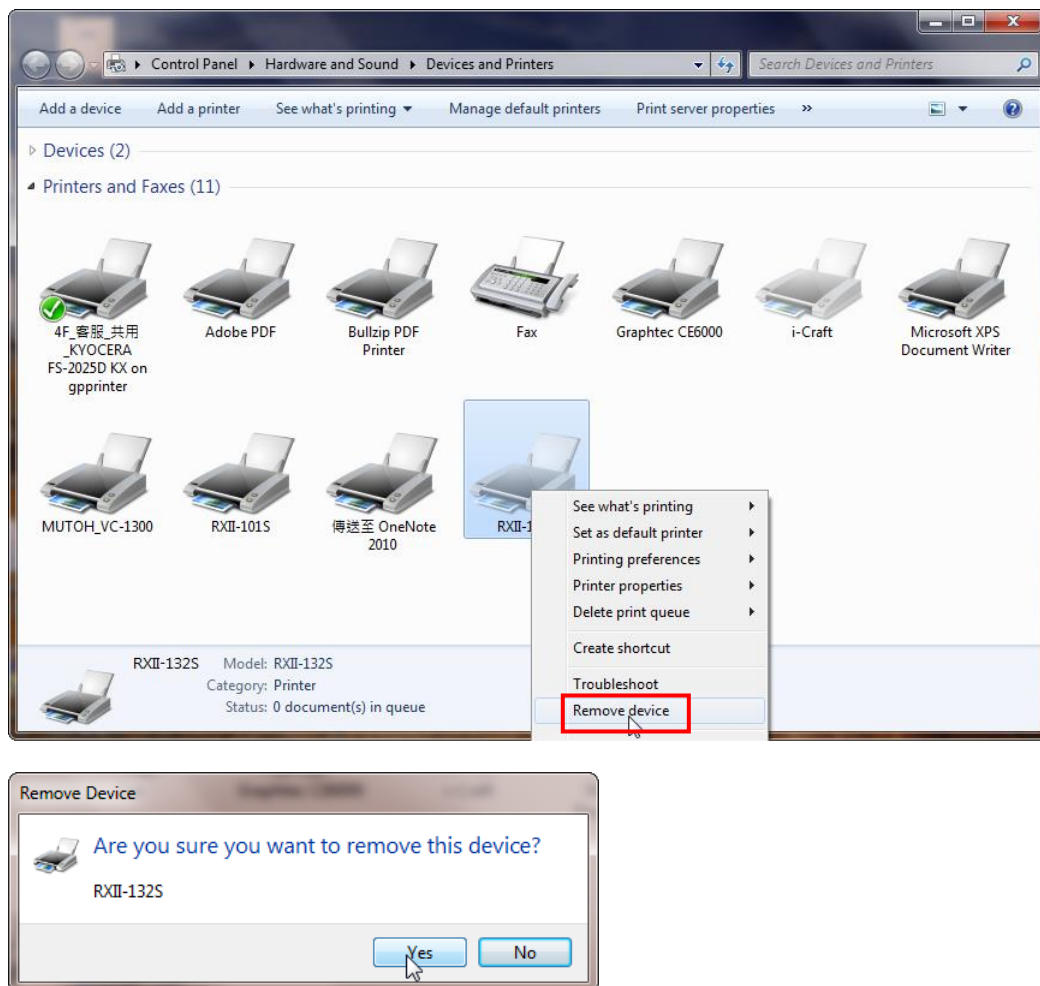
- (3) For users who have upgraded Adobe Illustrator or CorelDRAW, please go to the **AAS Installer** page in the **Printer Properties** window and click “**Install**” to access the latest version of GCC AAS Plug-in.



2.6.1.3 Driver Un-installation

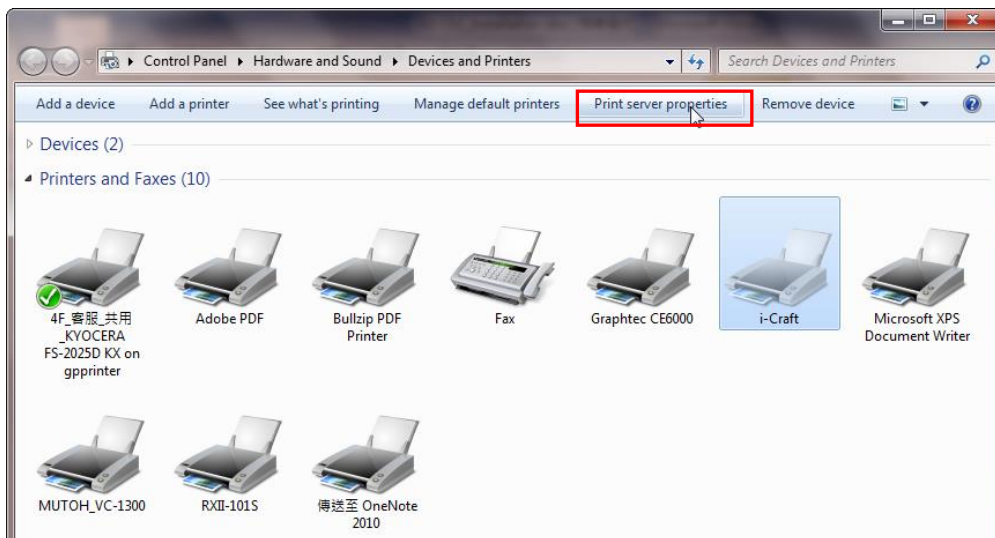
You have to remove previous version driver installed on your PC system completely before you can install the latest version successfully. Please refer to below steps.

Step 1 Go to Control Panel\Hardware and Sound\Devices and Printers window. Right click the printer and select **“Remove device.”**

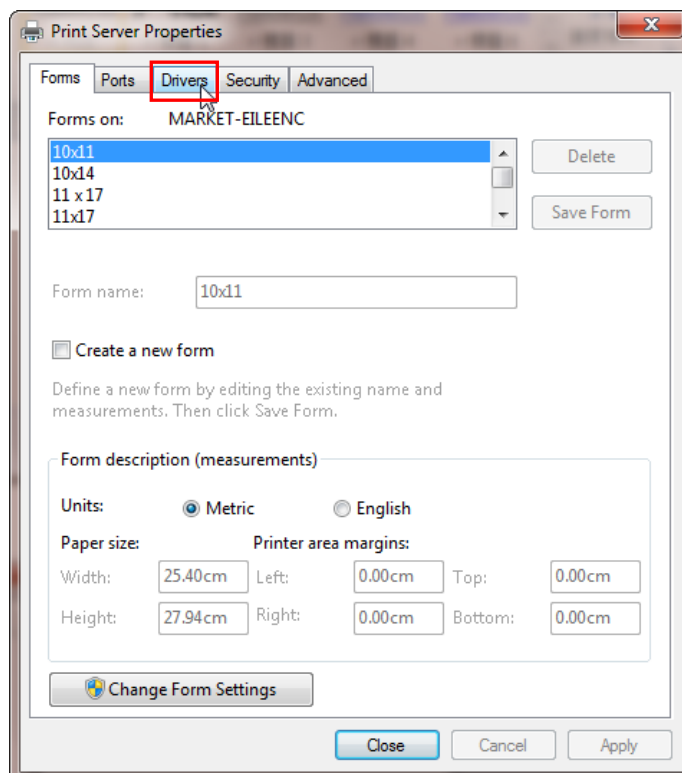


Step 2 After removing the unit, click on any printer on the page and select **“Print server properties.”** (For Win 7 and above)

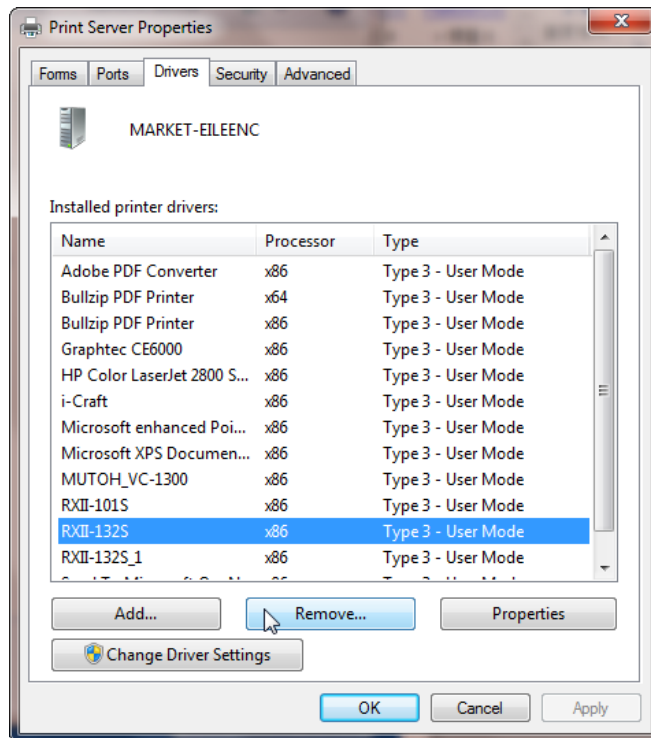
Or right click on blank space and then select **“Print server properties.”** (For Windows XP)



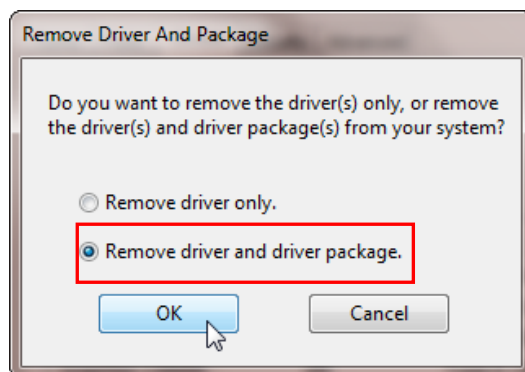
Step 3 Select **“Driver”** page



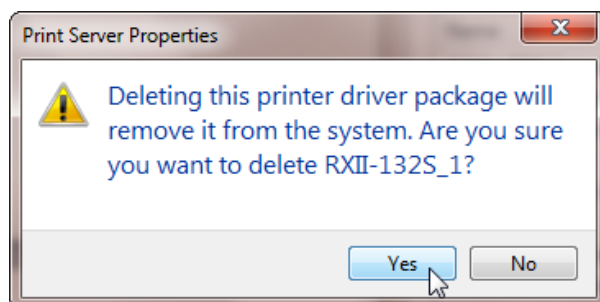
Step 4 Select the model and click on “Remove”.

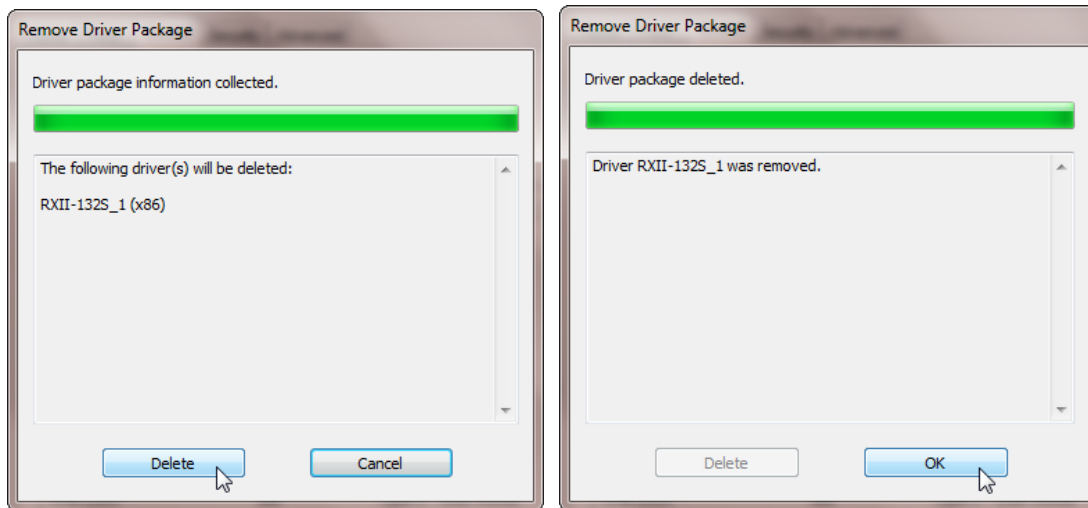


Step 5 Select “Remove driver and driver package” and click OK.



Step 6 Click Yes and then click “Delete” and “OK,” and the driver installed on PC is completely removed.





2.6.2 RS-232 Interface

■ Connecting to the RS-232 (Serial) Port

1. For IBM PC, PS/2 users or compatibles, connect the RS-232C cable to the serial connector of the assigned serial port (COM1 or COM2) of your host computer.
2. Set up the communication parameters (Baud Rate and Data Bits/Parity) to match the setting of software package, refer to chapter 3 – “Misc” key description.

Caution!! Please turn off the plotter before plugging the RS-232C

2.6.3 Data Transmitting

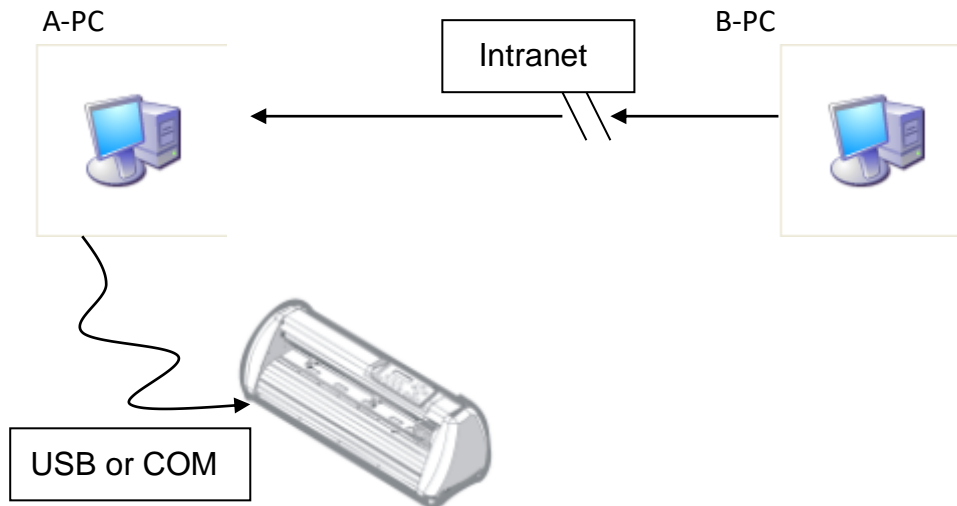
There are two options to transmit the data from the computer to the cutting plotter:

Option 1: With proper interface settings, the data can be transmitted from your application software package to the cutting plotters directly.

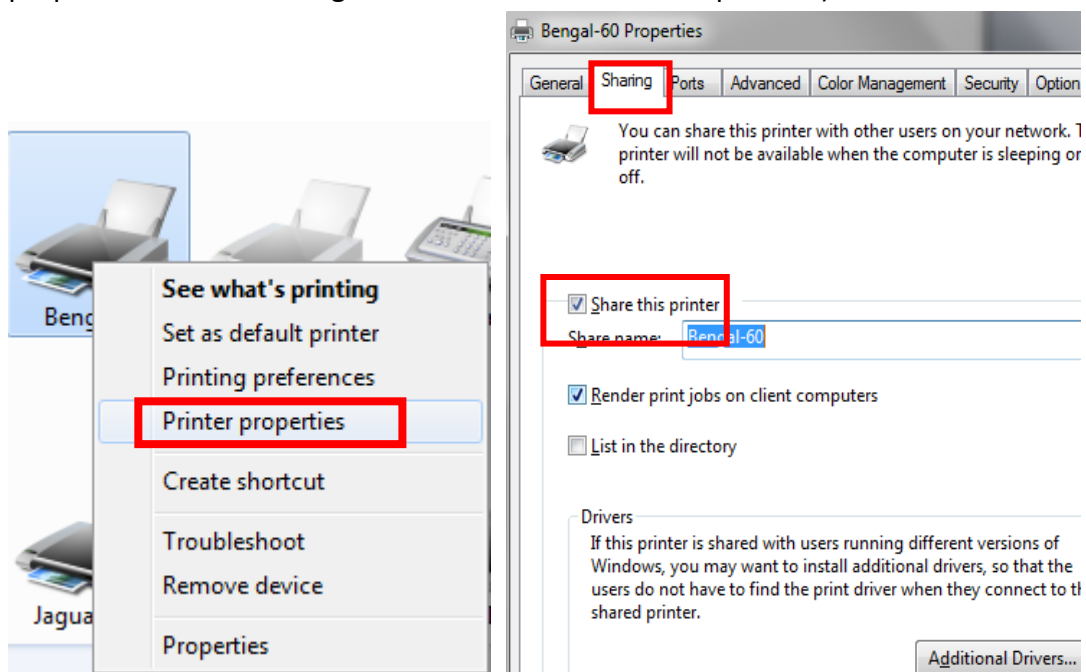
Option 2: Most cutting software packages are able to emulate **HP-GL** or **HP-GL/2** commands. As long as the file is **HP-GL** or **HP-GL/2** format, the cutting plotter can output the data precisely.

2.6.4 Printer Sever Shared Setting

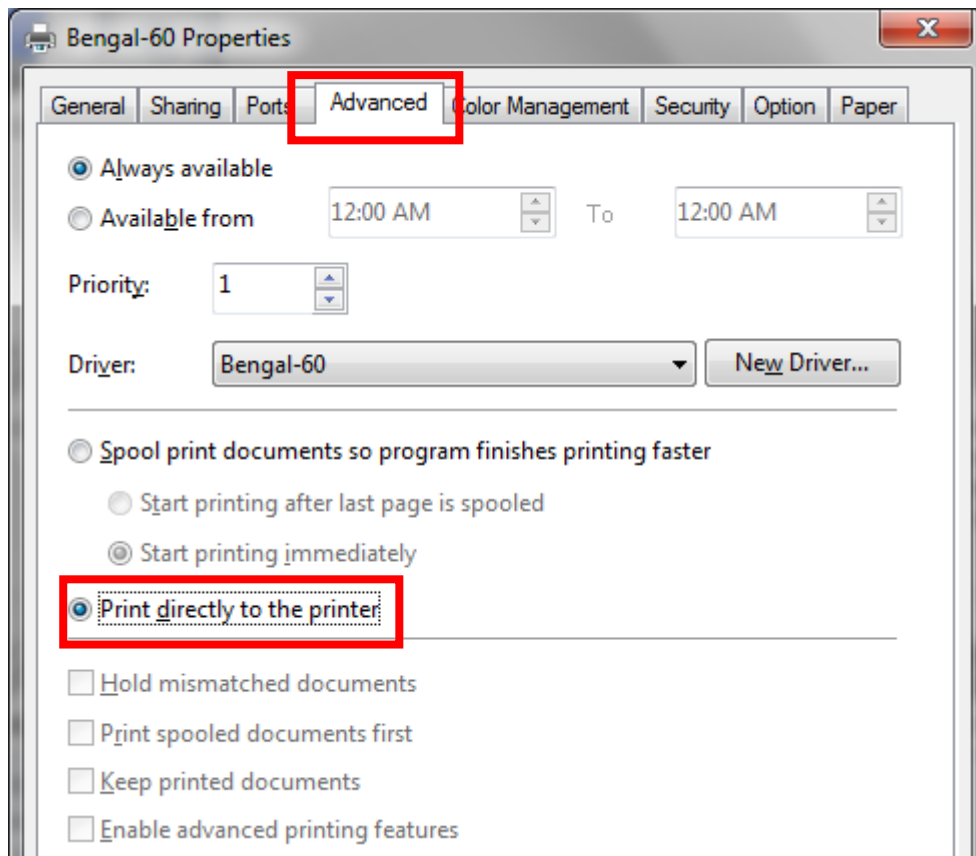
In “A-PC”, set the printer driver as a shared printer, then use B-PC to connect A-PC’s printer driver via Intranet.



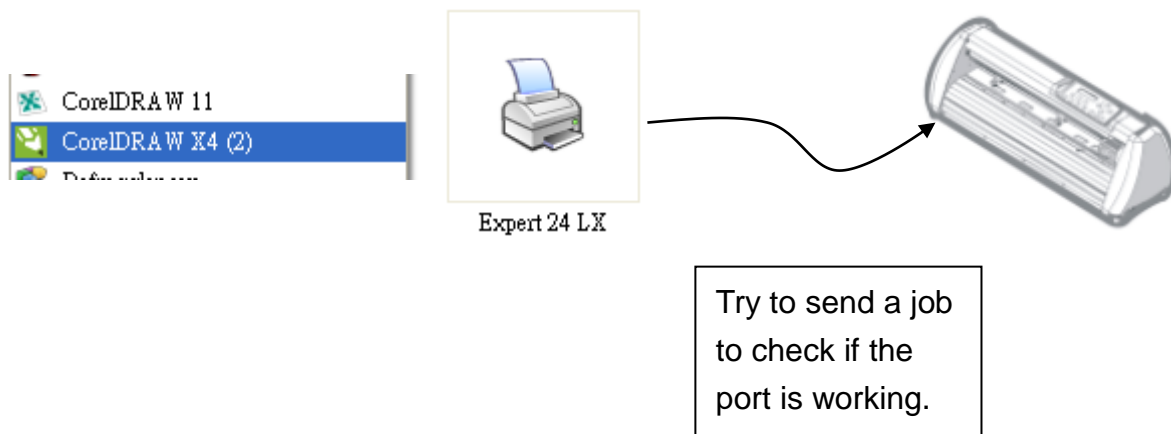
Step 1 Set A-PC’s printer driver as a shared printer (Right-click on printer icon, choose “Printer properties”. Click “Sharing” tab then check “Share this printer.”)



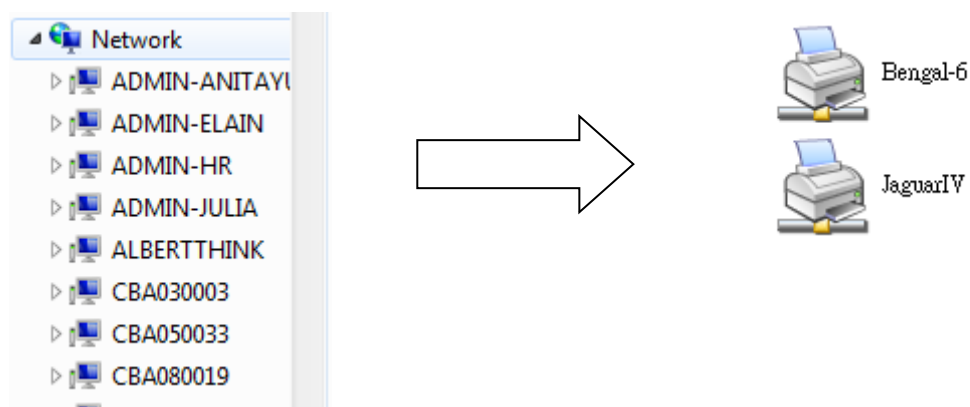
Step 2 Click “Advanced” tab, then choose “Print directly to the printer” option.



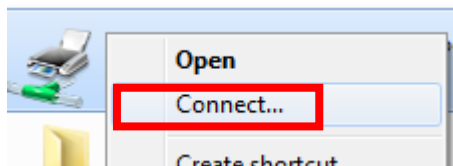
Step 3 Send a job from A-PC to the machine to check if A-PC is connected to the machine.



Step 4 Activate A-PC's Printer Driver from B-PC's Network.



Step 5 Right-click on the printer icon, and select "Connect" to A-PC's printer.



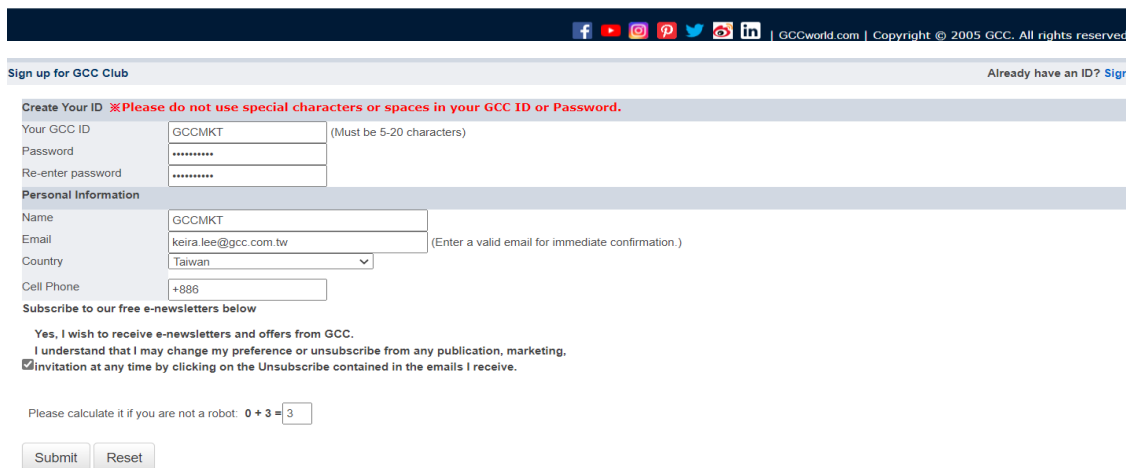
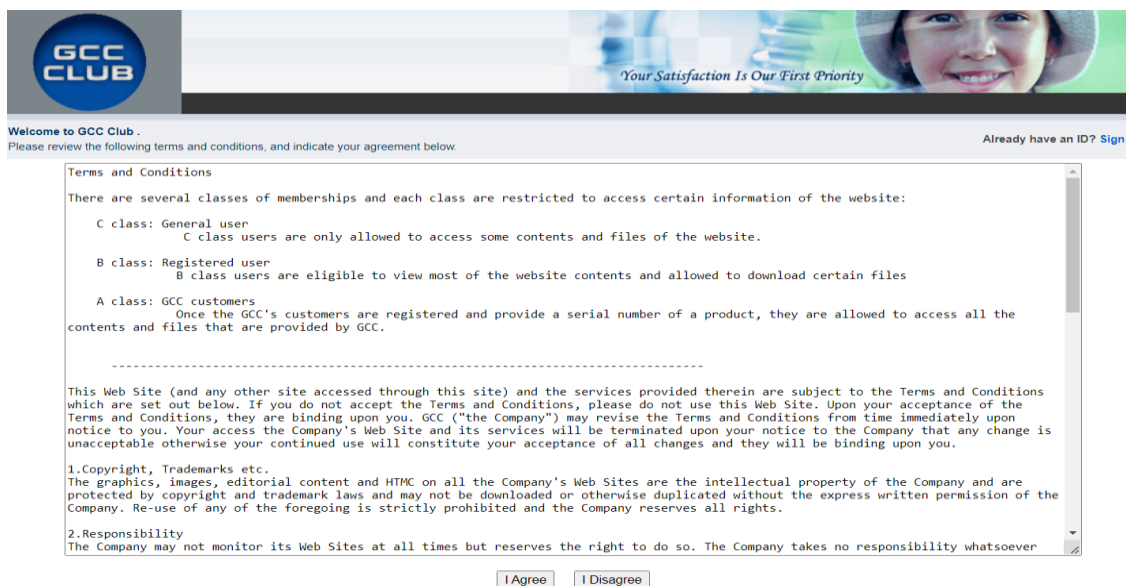
2.7 Software Installation

2.7.1 GreatCut-S auto Installation

1. Visit <http://gccf.gcc.com.tw/gccclub/login.aspx> and log in your GCC Club account.



or create a new GCC club account if you do not have one. Click “I Agree”, fill in the required information and click “Submit” to sign up.



You should receive an eMails with activation link and click the link to activate your account.

Thank you for registering with the GCC Club. Please find your registration information below.

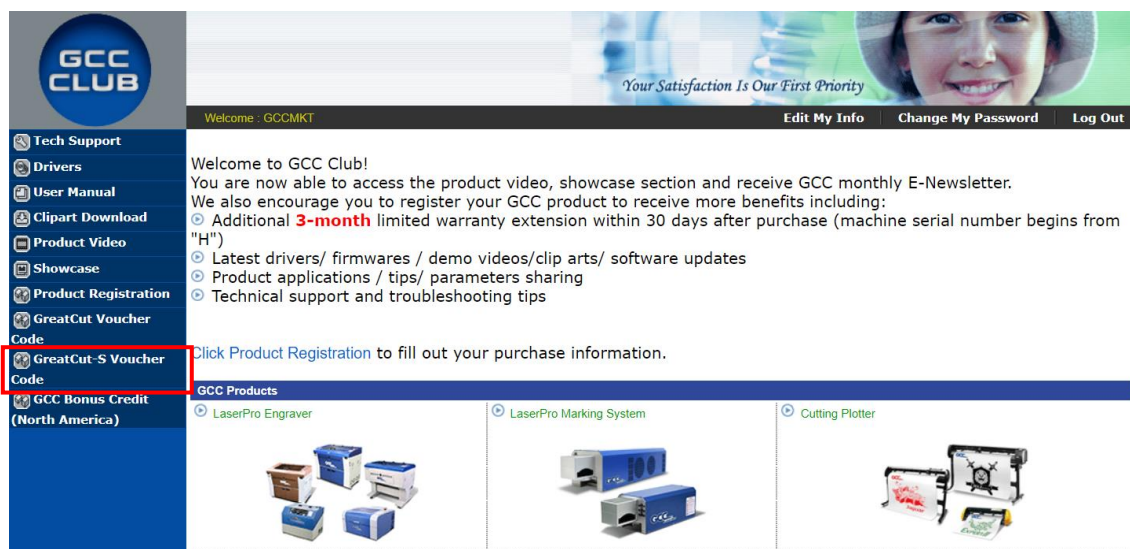
*Please be sure to click

http://gcof.gcc.com.tw/gccclub/mail_confirm.aspx?enable=Y&ID=GCCMKT1&Name=GCCMKT&lang=
to activate your account.

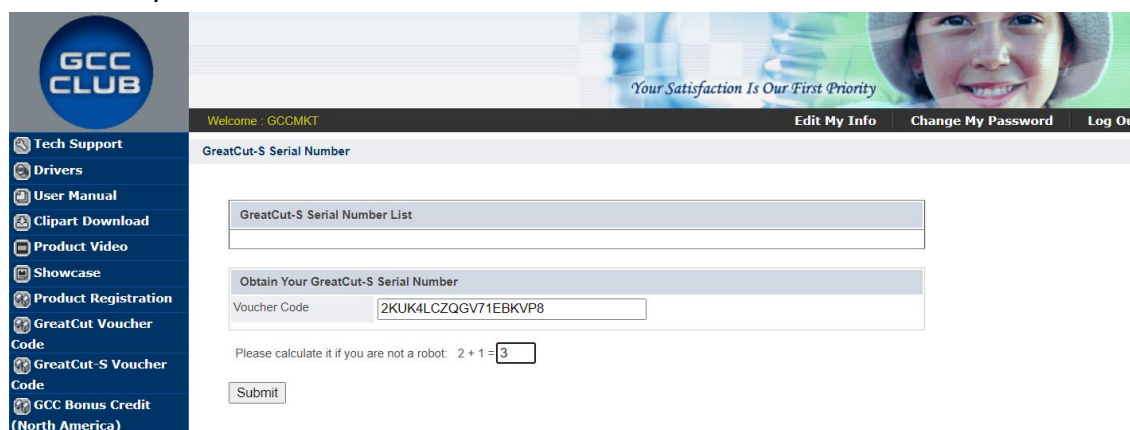
Personal Information	
Name	GCCMKT
Email	keira.lee@gcc.com.tw
Cell Phone	+886972066897
Country	Taiwan

Please note that most of the contents on the GCC Club are exclusive to GCC product owners. If you own a GCC machine and its serial number starts "H" to "L", we encourage you to register your product to receive an additional 3-month limited warranty extension. Other Benefits include: product applications, tips and parameters, technical support and trouble shooting tips, driver and software updates, user manual document.


2. Go to GCC Club, click "GreatCut-S voucher code" on the left side.



3. Enter your voucher code and click "submit".



4. You will get your GreatCut-S serial number.



- Tech Support
- Drivers
- User Manual
- Clipart Download
- Product Video
- Showcase
- Product Registration
- GreatCut Voucher Code
- GreatCut-S Voucher Code
- GCC Bonus Credit (North America)

Welcome : GCC-MKT

GreatCut-S Product Key

GreatCut-S Key List	
Date	2022/10/11 上午 05:24:21
Product Name	Cutting Plotter / Puma IV / P4-132LX
Machine S/N	W70233
Voucher Code	AALD2MPORF7LVPDP4KQQ
GreatCut-S Product Key	AC198BD4-BDA8-4B1F-8CCA-712086A0D9D6


Obtain Your Product Key

Voucher Code


Please calculate it if you are not a robot: 8 + 7 =

5. Visit <https://www.gccworld.com/download.php> click the product category and choose a proper model.


Or browse by machine model



Vinyl Cutter



Laser Engraver




Laser Cutter


↓

Download Area

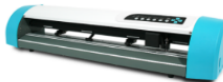
Vinyl Cutter Vinyl Cutter



Expert II A



i-Craft™ 2.0



AR-24



Expert II



Puma IV

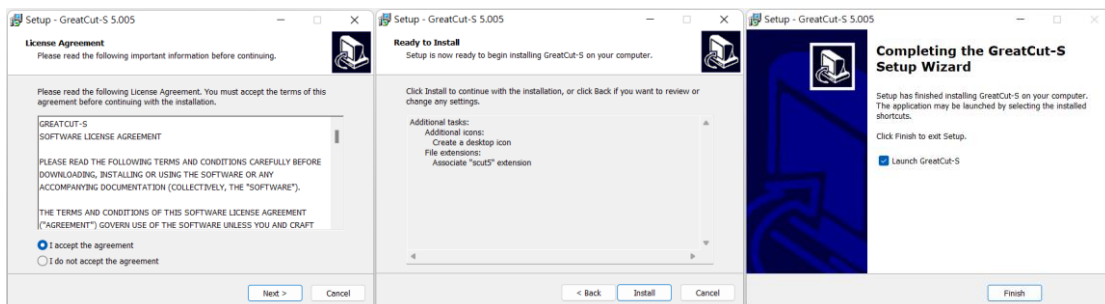


Jaguar V / Jaguar V (PPF)

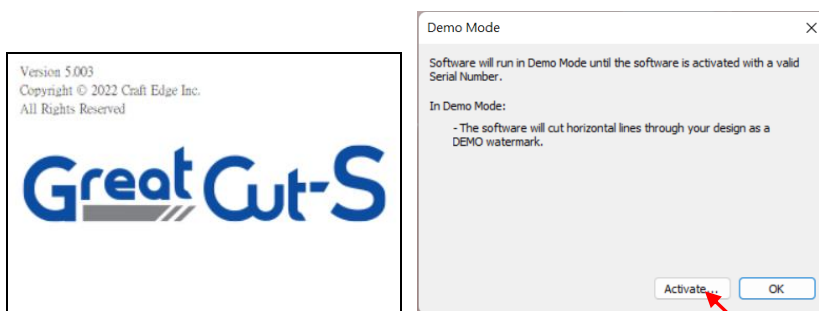
6. Download GreatCut-S to start the installation.

Software		
Title	Size	Download
Sure Cuts A Lot Pro 5 _ Win64bit	52.1 MB	Download
Sure Cuts A Lot Pro 5 _ Win32bit	34.0 MB	Download
Sure Cuts A Lot Pro 5_Mac	39.9 MB	Download
SignPal V19	818 MB	Download
GreatCut-S for Windows	303 MB	Download
GreatCut-S for Mac	303 MB	Download

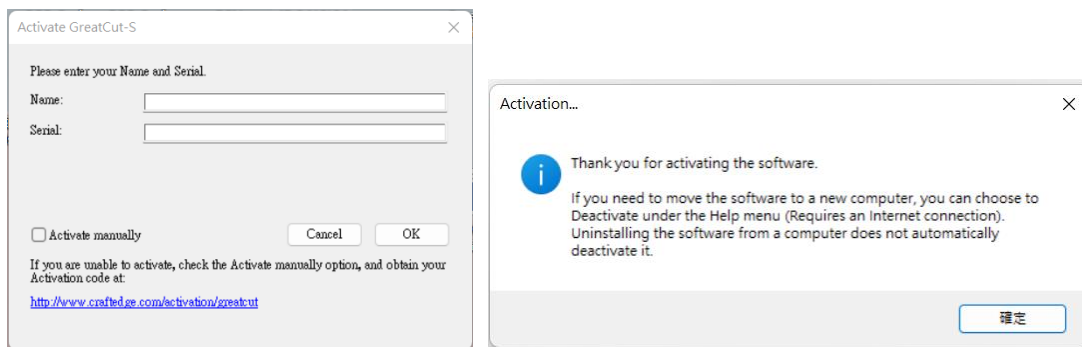
7. Press Next to continue, tick “Launch GreatCut-S” and then press “Finish” to complete the installation.



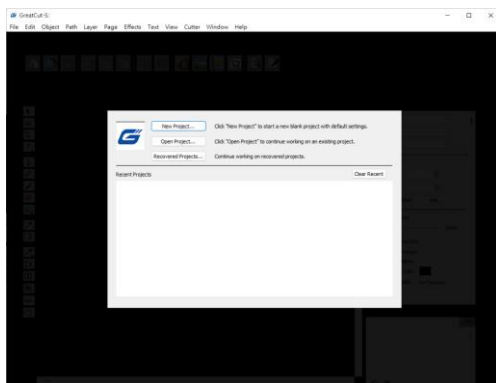
8. Run GreatCut-S and press “Activate...” to activate GreatCut-S. Please make sure it is connected to the internet.



9. Enter your name in the Name column and GreatCut-S serial number to the Serial column and press "OK" to complete the activation.



10. GreatCut-S is ready to use.



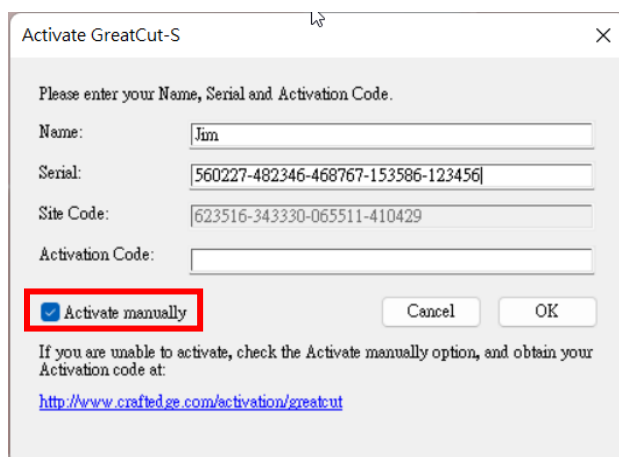
Note

- ✓ If you use a trial version to output graphics, meaning you do not enter the software key to activate the Sure Cuts A Lot mentioned above, there will be two extra lines cut through the design, therefore, make sure the Sure Cuts A Lot software is activated before implementing cutting jobs.

2.7.2 Manually Activate GreatCut-S

If the computer connected to the cutter doesn't have an internet connection to complete the software activation process, you can alternatively use the "Activate manually" function to enter the "Activation Code" and begin using GreatCut-S. However, you will need to find another computer with internet access in advance to obtain the "Activation Code" by following the instructions below.

1. Check the "Activate manually" checkbox and you should see the Site Code and Activation Code fields appear. The Site Code field will be pre-filled in and cannot be changed.



2. Visit <https://craftedge.com/activation/greatcut/> via an internet connected computer. Enter your name, serial and site code.



Activate "GreatCut-S"

Important: You only need to do the following if you are having trouble activating from within "GreatCut-S" or do not have an Internet connection on the computer you are trying to activate on.

You must activate in order to use the full version of the software. Generally, you will just need to choose Activate.. from the Help menu in GreatCut-S and enter your name and serial number. The software will try to activate automatically and you can disregard this web page. **Do not** use this web page if you have not installed the software yet or have not purchased.

If you view the About box in GreatCut-S and it shows your name and serial number, the software is activated ok.

If you have problems activating automatically, you must use this web page and generate a Manual Activation Code. The Name and Activation Code information is obtained from your purchase confirmation e-mail. The Site Code is obtained by running the program and choosing "Activate.." and checking the "Activate Manually" option.

Name
Jim

Serial
560227-482346-468767-153586-123456

(Ex: 123456-123456-123456-123456-123456) What is this?

Site Code
626304-661486-172829-153129

(Ex: 123456-123456-123456-123456-123456) What is this?

Generate Activation Code

After entering in your Name, Activation Code, and the Site Code, click the Generate Activation Code button to create your Manual Activation Code. Copy and paste the value back into the "Activation" dialog box in the application to activate your copy.

3. Click on the "Generate Activation Code" button, and your activation code will be shown in the Activation Code field.



Activate "GreatCut-S"

Important: You only need to do the following if you are having trouble activating from within "GreatCut-S" or do not have an Internet connection on the computer you are trying to activate on.

You must activate in order to use the full version of the software. Generally, you will just need to choose Activate.. from the Help menu in GreatCut-S and enter your name and serial number. The software will try to activate automatically and you can disregard this web page. **Do not** use this web page if you have not installed the software yet or have not purchased.

If you view the About box in GreatCut-S and it shows your name and serial number, the software is activated ok.

If you have problems activating automatically, you must use this web page and generate a Manual Activation Code. The Name and Activation Code information is obtained from your purchase confirmation e-mail. The Site Code is obtained by running the program and choosing "Activate.." and checking the "Activate Manually" option.

Name
Jim

Serial
560227-482346-468767-153586-123456

(Ex: 123456-123456-123456-123456-123456) What is this?

Site Code
626304-661486-172829-153129

(Ex: 123456-123456-123456-123456-123456) What is this?

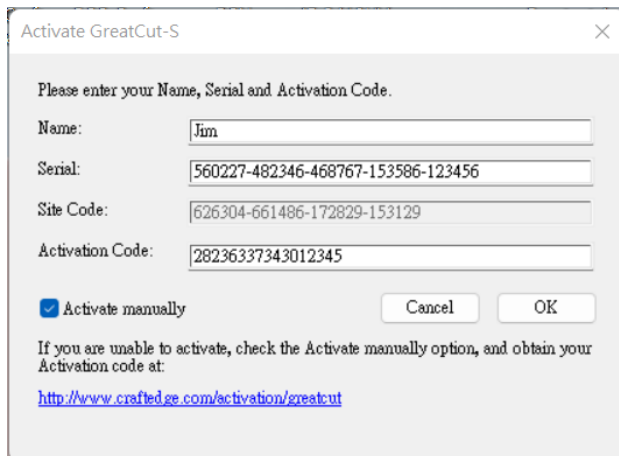
Activation Code
28236337343012345

Activation Code is for "GreatCut-S"

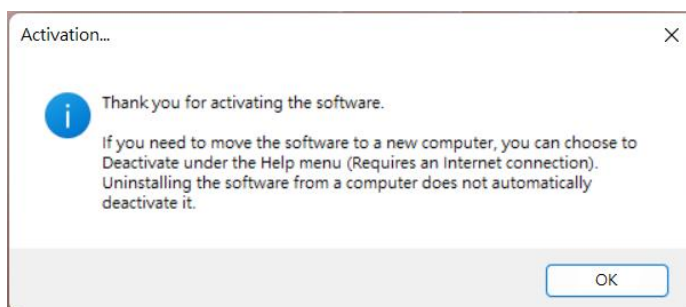
Generate Activation Code

After entering in your Name, Activation Code, and the Site Code, click the Generate Activation Code button to create your Manual Activation Code. Copy and paste the value back into the "Activation" dialog box in the application to activate your copy.

4. Copy and paste the activation code back into the activation dialog box of Sure Cuts A Lot program and hit ok.



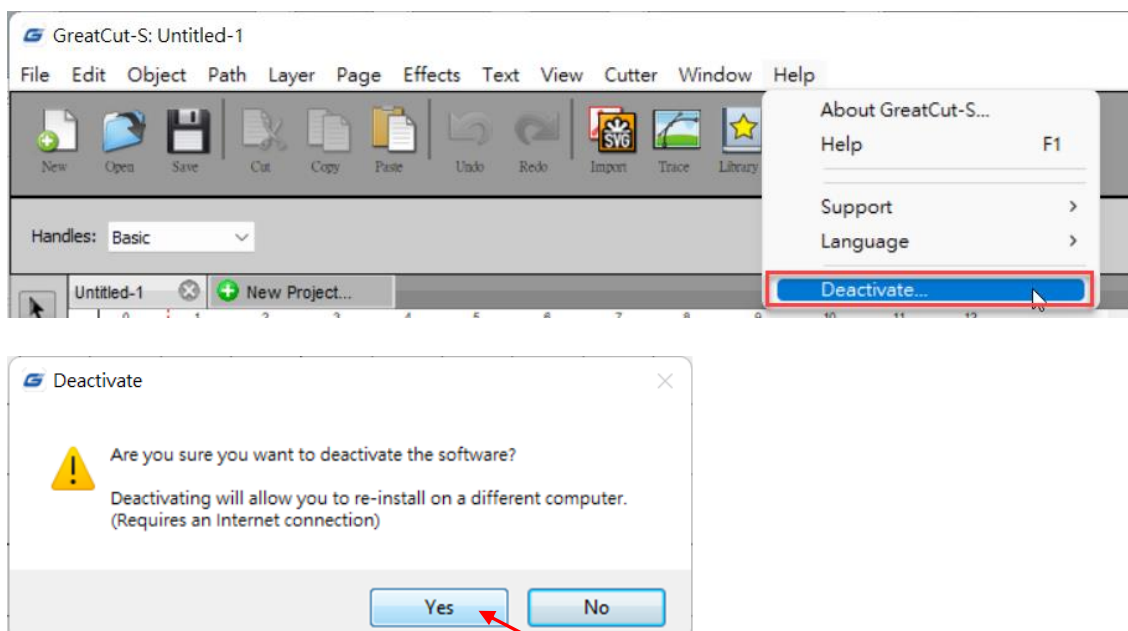
5. Click OK and GreatCut-S is ready to use.



2.7.3 Re-install GreatCut-S Software

If you change a new computer, you may need to deactivate your GreatCut-S software and re-install it on your new device.

Go to “Deactivate...” under Help and press Yes to confirm, then follow the installation procedure and use **the same code** to activate it on another computer.



2.7.4 Reset GreatCut-S Serial Code

If you need to re-install the software again due to problems such as a computer crash/reformat where you were not able to de-activate your copy off the computer first, you may visit <https://craftedge.com/activation/deactivateGC.php> to reset your serial number



Deactivate "GreatCut-S"

This page can be used to reset your serial number if you need to re-install the software again due to problems such as a computer crash/reformat where you were not able to de-activate your copy off the computer first.

If you still have an activated copy installed and you wish to deactivate to install on a different computer, you can choose Deactivate under the Help menu in GreatCut-S instead of using this webpage. The deactivation option in GreatCut-S requires an internet connection.

Important: You will only be able to use this page on a limited basis to reset your serial number. If you need your serial reset again after using this page, you will need to contact GCC Support for help.

IP Address Logged: 180.218.237.36

Name:

Email:

Serial:

Please describe the reason you are needing to reset your serial number

Submit

Chapter 3 Operation

3.1 The Control Panel

3.1.1 The Outline of control panel

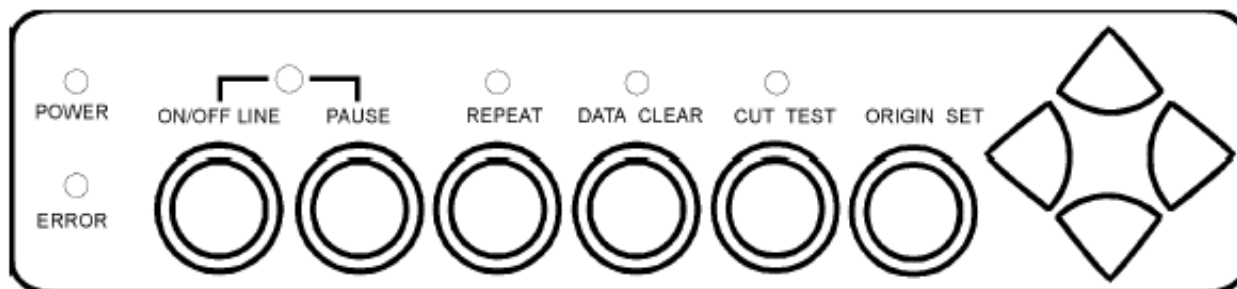


Figure 3-1

Key	Function
POWER LED	To indicate the power status (light up: power on; light off: power off)
ERROR LED	To indicate the error status (light up: error; light off: normal)
ON/OFF LINE	To switch modes or stop cutting job(light up: on-line; light off: off-line) While in on-line mode: only ON/OFF LINE and PAUSE keys activated While in off-line mode: the settings in VLCD can be adjusted.
PAUSE	To temporarily halt cutting process or to continue
REPEAT	To repeat last job.
DATA CLEAR	To clear up buffer memory.
CUT TEST	To perform cutting tests on different media.
ORIGIN SET	To reset origin at a new position.
4 Arrow Keys	To move carriage position, select function, or change setting.

3.1.2 Reset Origin

Note:

- ✓ Make sure the machine is in off-line mode to enable this function.

Step 1 Move the carriage to a new position.

Step 2 Press the ORIGIN SET button to reset origin.

3.1.3 Cut Test

Note:

- ✓ Make sure the machine is in off-line mode to enable this function.
- ✓ It's recommended to keep performing this function until the cutting quality meets your demand before executing the cutting job.

Step 1 After sizing, press the ON/OFF LINE button to set as off-line mode.

Step 2 Move the carriage to a preferred position.

Step 3 Press CUT TEST button to perform.

3.1.4 Repeat

Note:

- ✓ Make sure the machine is in off-line mode to enable this function.

Step 1 Press the ON/OFF LINE button to set as off-line mode.

Step 2 Press the REPEAT button to perform re-plot function starting at the position where the carriage locates. It is also available to move carriage to a preferred position, re-set origin, and then perform this function.

3.1.5 Repeat AAS Job

This feature allows users to repeat AAS jobs automatically without having to operate on the computer side.

Step 1 When the first AAS job finishes, press "Repeat" on the control panel to activate this function.

Note:

- ✓ Please be noted that this feature is mainly applied to the Single paper mode; ensure a new piece of material is loaded and the origin repositioned to the first registration mark before "Repeat" is pressed.

3.2 VLCD

“VLCD” is a computer program to help modify parameters of cutting functions.

3.2.1 Installation

Step 1 Download the VLCD.exe file from download area on GCC website onto your local drive to finish installation (Download Area → Vinyl Cutter → Expert II → Software, <https://www.gccworld.com/download.php?act=view&id=21>).

Step 2 Launch VLCD by double-click on the icon.

Note:

- ✓ Make sure the machine is in on-line mode to enable this program.
- ✓ There is media in the machine.

Step 3 Choose the right port connected to your computer (Figure 3-2).

If you are using the USB cable, choose the **model name** from the pull down menu. If you are using a Serial cable, choose either **COM1** or **COM2**. Make sure no other devices are occupying the port that you are going to use.

Step 4 Press the **Connect** button to connect your computer and the cutter. If the connection succeeds, the model info, firmware version, and adjustable parameter columns will be showing (Figure 3-3).

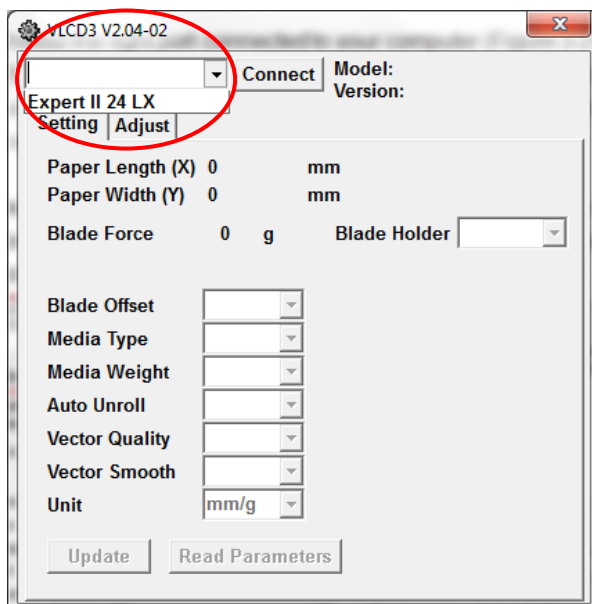


Figure 3-2

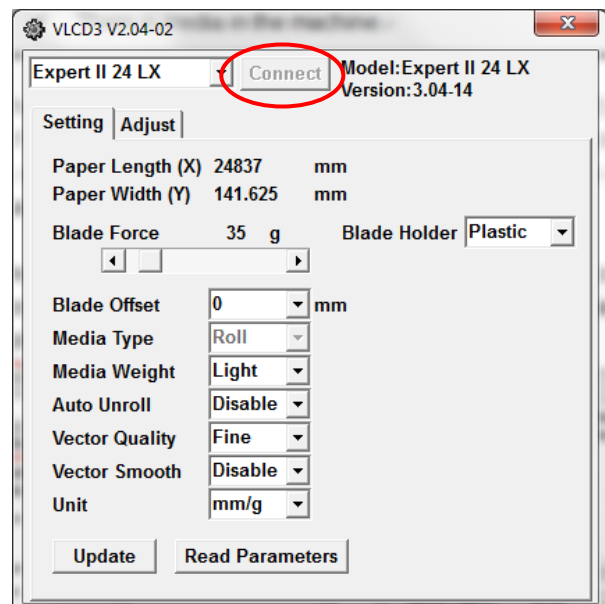


Figure 3-3

3.2.2 Functions of VLCD

Below are the functions adjustable in VLCD for Expert II.

- Poll Size
- Blade Force
- Blade Holder
- Media Weight
- Blade Offset
- AAS Offset
- Auto Unroll
- Update

■ Poll Size

To reveal the X/Y values.

In the case, the maximum plotting length is 25000mm, and the distance between the farthest two pinch rollers is 158.975 mm (Figure 3-4).

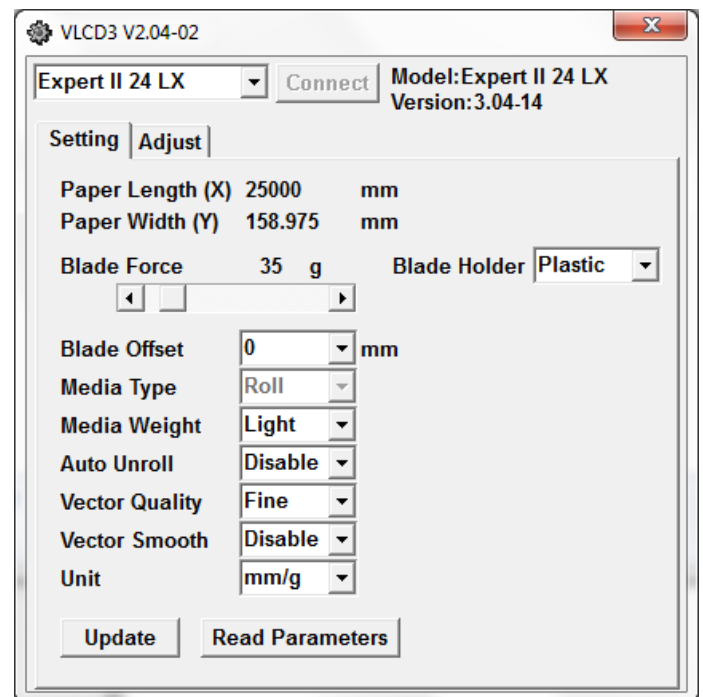


Figure 3-4

■ Blade Force

To adjust the blade force between 0 and 350 (Default = 35).

Note: when plotting with a pen, adjust the Force to the lowest setting to avoid faint lines as well as to extend the life of a pen.

■ Blade Holder

To choose the blade holder- Plastic (Default) or Metal.

■ Media Weight

To choose different weights of media in two options: Heavy, and Light (Default).

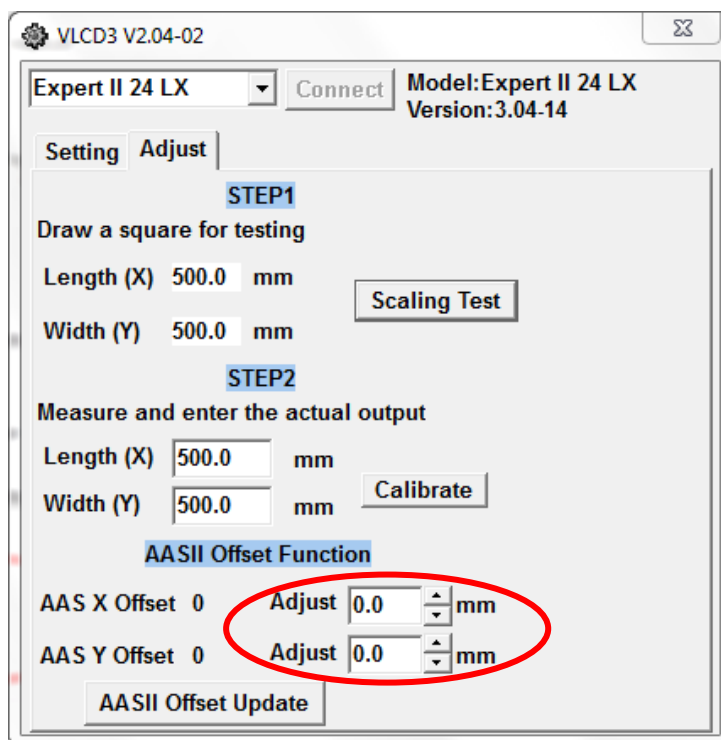
■ Blade Offset

To adjust the blade offset to ensure cutting quality in 8 options: 0.000, 0.175, 0.250 (Default), 0.275, 0.300, 0.500, 0.750, and 1.000.

■ AAS Offset

To set or modify AAS offset value.

You can refer to “5.3 Printer Test” for more details.



■ Auto Unroll

To switch options for sheet media and roll media (Auto Unroll On: Default).

■ Update

To apply the changed setting onto the cutter by presses the **Update** button.

3.2.3 Restore factory default settings

VLCD allows you to turn all parameters to factory-default settings.

Step 1 Enter the USB-port switching mode by pressing “Pause”(2) after “On/Off line”(1) and then press “Origin Set” (3).



Step 2 Press the left key (4) and then up (5)



Step 3 You have now entered the Data clear and restoring default settings mode; press “Data clear” (6) and then “Origin Set” (7) to confirm.



Step 4 The default settings restoring process has been completed. All buttons will be ineffective before the cutter is rebooted.



Step 5 Restart your cutting plotter now.

3.3 File Uploader

3.3.1 Installation

- ✓ “File Uploader” is a tool to help loading files for direct output.
- ✓ The program **ONLY** supports HPGL format-files generated via GCC Cutter driver.
- ✓ Download the **GCC File Uploader.exe** file from GCC website onto your local drive to finish installation (Download Area → Vinyl Cutter → Expert II → Software, <https://www.gccworld.com/download.php?act=view&id=21>)
- ✓ Launch GCC File Uploader by double-click on the icon (Figure 3-5).

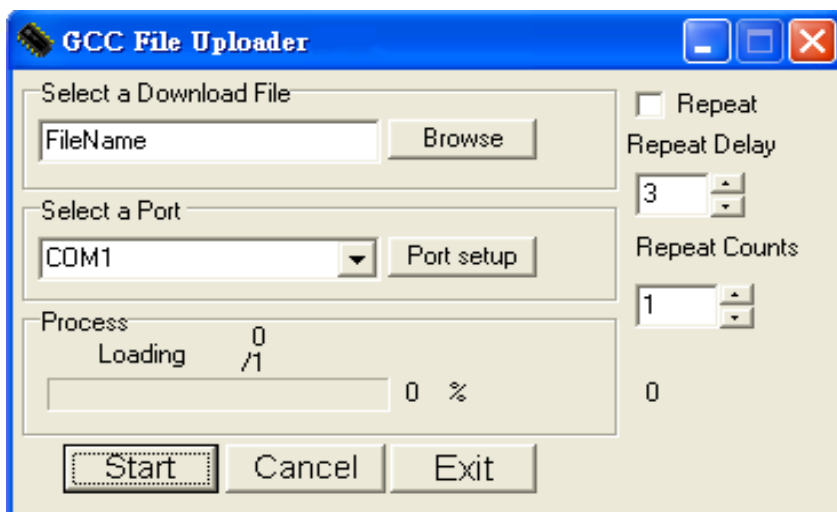


Figure 3-5

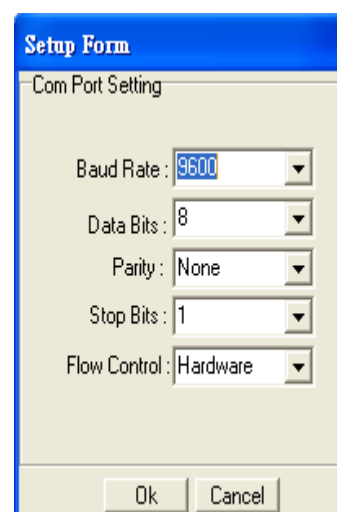


Figure 3-6

3.3.2 Functions of File Uploader

■ Port setup

- ✓ This function will be activated while choosing COM port for data transmission.
- ✓ Press the Port setup button to pop up the setup window for parameter change (Figure 3-6).

■ Repeat

- ✓ Activate this function by click on the Repeat's checkbox.
- ✓ Repeat Delay – the pause time between jobs; Unit: second.
- ✓ Repeat Counts – the number of repeat jobs.

3.4 Data Transmission

There are two options to transmit the data from the computer to the cutting plotter:

Option 1: With proper interface settings, the data can be transmitted from your application software package to the cutting plotters directly.

Option 2: Most cutting software packages are able to emulate **HPGL** or **HPGL/2** commands, therefore. As long as the file is **HPGL** or **HPGL/2** format, the cutting plotter can output the data precisely.

3.5 Expert II Print Driver Setting

3.5.1 Expert II Print Driver setting>Option Page

File Function:

The file function section allows users to set the parameters of Speed, Force, Offset and Quality for later use. This section is useful when performing repeated jobs on a variety of objects, allowing you to save your frequently used cutter parameters and load them in the future.

- **Custom Media:** This section lists the files for the parameter settings that you have recently created and worked. You can save more than 50 files to simplify your cutting job.
- **Default:** This section contains the reference settings that are applicable with the verified materials to achieve the best cutting results. Please note that the setting value might need to be adjusted according to different suppliers of materials.
- **SAVE:** This function will save current print driver parameter settings to a file under the specified location on your computer. (Saved parameter setting files will be tagged with the Expert II series extension)
- **LOAD:** This function allows you to load previously saved print driver parameters.
- **ORIGINAL:** This function will load the print driver's original factory parameter settings.
- **SAVE TO DEFAULT:** This function allows you to save your current print driver parameters as the default startup settings.
- **DELETE:** This function will delete the file you select from the Custom Media section, whereas the

settings in Default section cannot be deleted. Please note the delete function only removes the list shown in Custom Media section, it does not remove the file from your hard drive, if you wish to completely remove the file from your hard disk, you will have to manually delete the file from your operating system.

Die Cut

The Die Cut function must be activated with the Kiss Cut function to avoid the falling of cut-through materials and material jam beneath the carriage. Die Cut helps you to cut through the backing of the material while Kiss Cut cuts through only the top layer but not the backing. This will leave only tiny bits of the backing attached to the top layer, creating complete individual patterns with backing sheets (see figure 3-7 and 3-8).

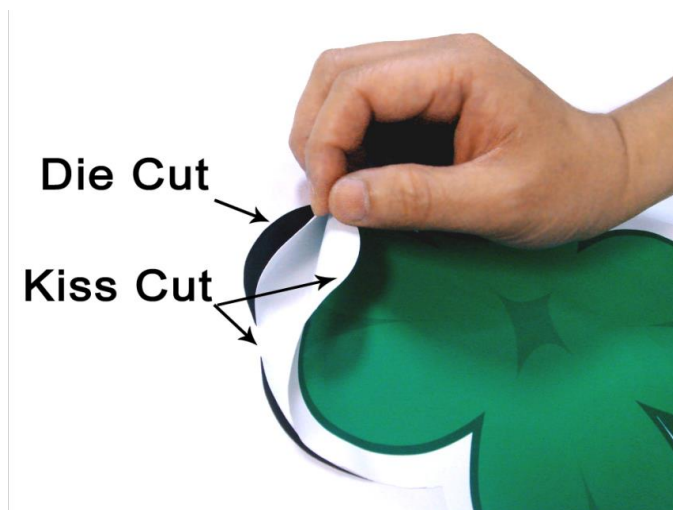
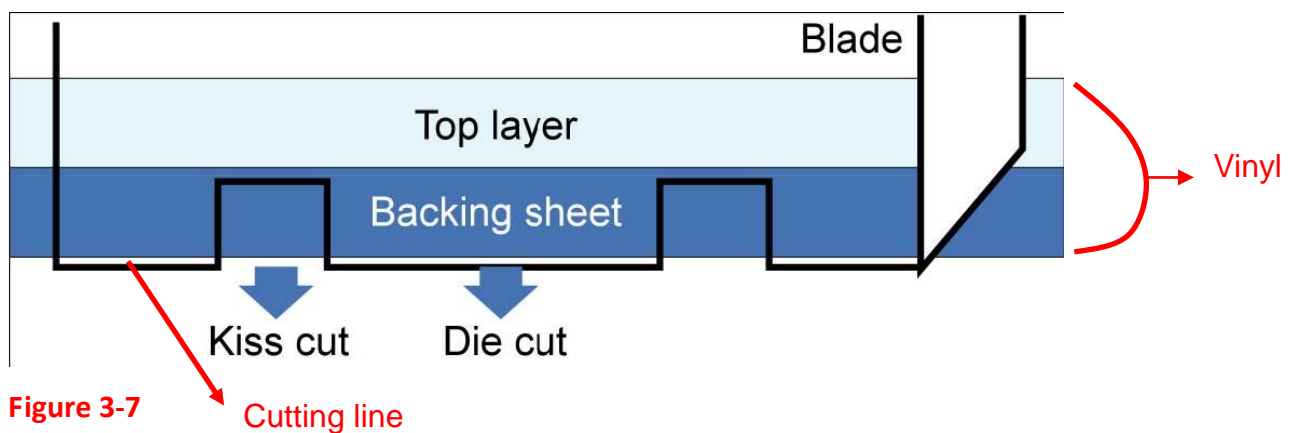
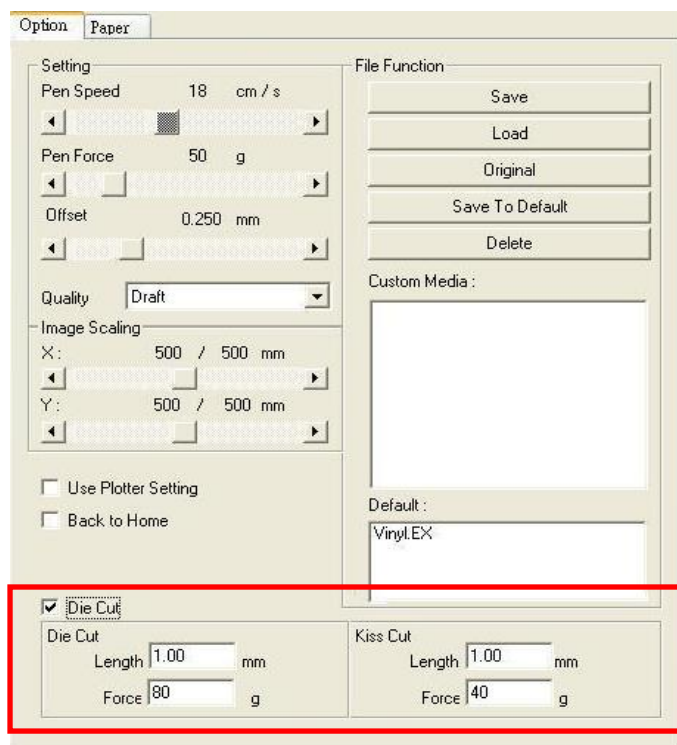


Figure 3-8

To activate the Die Cut function, go to “Option”, tick “Die Cut”, and enter the amount you wish for the “Length” and “Force” of both Die Cut and Kiss Cut, then click “OK” (see figure 3-9).

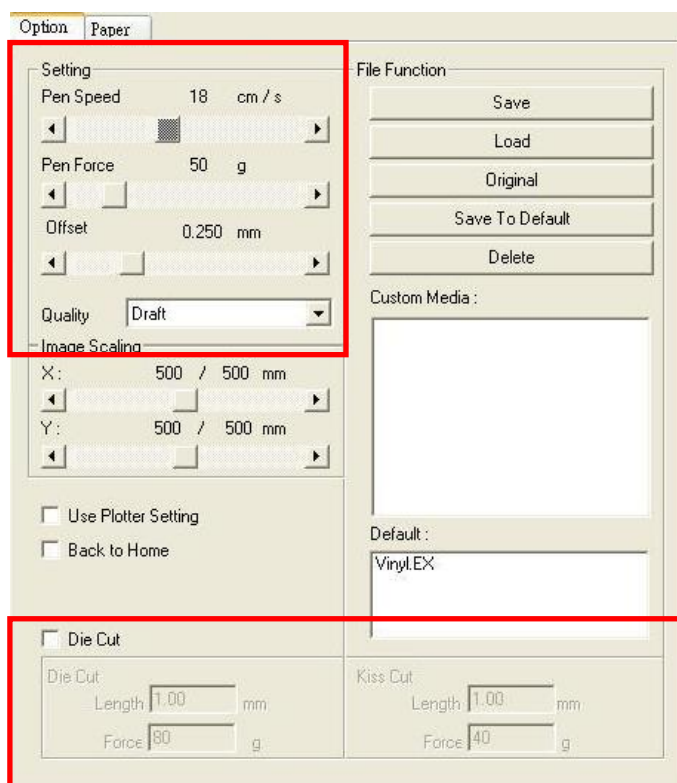


*Note:

The length setting for the cutting line of Die Cut is in the range of 0-2000mm whereas that of Kiss Cut is 0-100mm.

Figure 3.9

When the job is completed and you untick the Die Cut function, you will be able to adjust the pen speed, pen force, and offset in the section on the top following normal operating procedures (see figure 3-10).



Note:

1. The extension of the blade has to be set to cut through both the top layer and the backing in the very beginning. You then adjust the tool force for the best cutting performance.
2. Once the Die Cut function is activated, it will perform on all the line segments on the object.

Figure 3-10

3.5.2 Expert II Print Driver setting>Pen Page

The Expert series incorporates the use of 6 different colors to represent 6 different parameter settings including cutting speed, force and blade offset settings when cutting. These colors are referred to as “Pens”. Think of each pen as a designated cutter setting, rather than as a color. An image that is made up of black, red and blue colors will be processed using the cutter settings designated for each particular color. In order to utilize up to 6 different pens (cutter parameter settings), make sure your graphics software can recognize and utilizes the 6 pen colors designated by the GCC Expert series print driver.

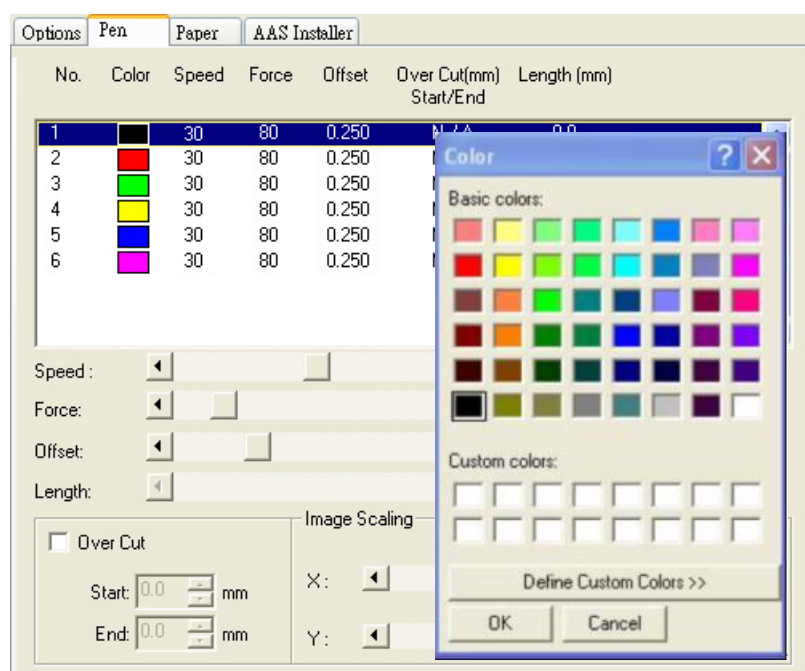
No.	Color	Speed	Force	Offset	Over Cut(mm) Start/End	Length (mm)
1	Black	30	80	0.250	N / A	0.0
2	Red	30	80	0.250	N / A	0.0
3	Green	30	80	0.250	N / A	0.0
4	Yellow	30	80	0.250	N / A	0.0
5	Blue	30	80	0.250	N / A	0.0
6	Magenta	30	80	0.250	N / A	0.0

Speed: 30 cm/s
 Force: 80 g
 Offset: 0.250 mm
 Length: 0.0 mm ☐ Die Cut

☐ Over Cut
 Start: 0.0 mm
 End: 0.0 mm

Image Scaling
 X: 500 / 500 mm
 Y: 500 / 500 mm

If you would like to specify your own colors to designate to a particular cutter setting, then all you have to do is to double-click on that particular pen color from the pen menu and a color manager window will open where you can select “define custom colors” to define your own color (shown in the picture below). This is useful when your image is composed of colors that are not part of the pen menu’s default color selection, and instead of modifying your image, you simply would like to assign the cutter settings based on the existing colors from your current image.

**Note:**

The GCC Expert series driver cannot store more than 6 pen colors or different cutter parameter settings per file.

Speed (Pen Page) [DEFAULT SETTING: 30cm/sec]

The speed slider controls the cutter's cutting speed during operation.

Force (Pen Page) [DEFAULT SETTING: 80g]

The force slider controls the cutting force during operation.

Offset (Pen Page) [DEFAULT SETTING: 0.25mm]

The offset slider controls the blade offset depending on the blade you used.

Die Cut (Pen Page)

The Die Cut function can allow you to cut through the backing of the material. You can only use the first 3 pen for this function. If you choose Pen No.1 and click the Die Cut function, the Pen No.4 will become Pen No.1* for setting different parameter for the same cutting line.

Options Pen Paper A&S Installer

No.	Color	Speed	Force	Offset	Over Cut(mm) Start/End	Length (mm) Start/End
1	Black	30	80	0.250	N / A	0.0
2	Red	30	80	0.250	N / A	0.0
3	Green	30	80	0.250	N / A	0.0
4	Yellow	30	80	0.250	N / A	0.0
5	Blue	30	80	0.250	N / A	0.0
6	Magenta	30	80	0.250	N / A	0.0

Speed: 30 cm/s
 Force: 80 g
 Offset: 0.250 mm
 Length: 0.0 mm ☐ Die Cut

☐ Over Cut
 Start: 0.0 mm
 End: 0.0 mm

Image Scaling
 X: 500 / 500 mm
 Y: 500 / 500 mm

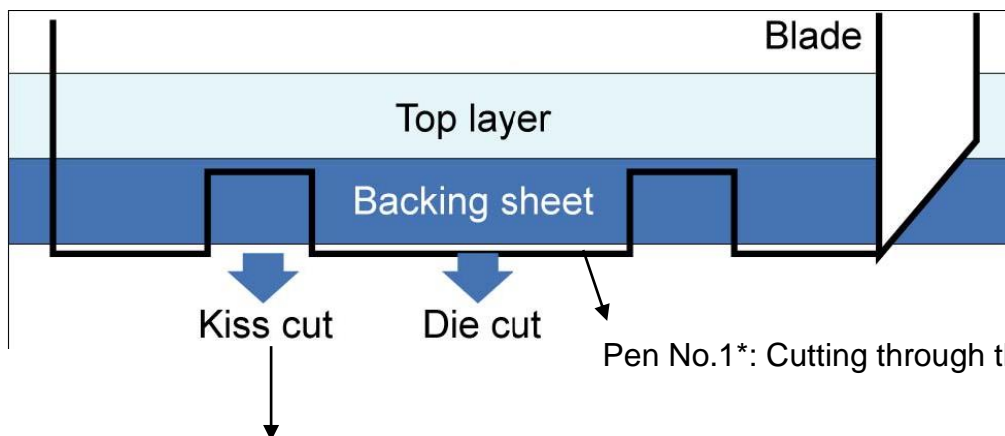
Die Cut warning

No.4 will be set as the Die Cut parameter of No.1, continue? (Yes/No)

Yes No

You can adjust the parameter such as force and length in both Pen No.1 and Pen No. 1* as you need.

For example:



Pen No.1: Cutting through the vinyl only



Image Scaling (Pen Page)

The Image Scaling function can allow you to set the image scale of media length and width to decrease the difference between the actual length and the ideal length caused by various media used while processing cutting job.

3.5.3 Expert II series Print Driver setting > Paper Page

Option Pen Paper AAS Installer

Paper Size

X: 1200.00

Y: 600.00

Unit

☒ Metric (mm)

☐ Imperial (inch)

Version No.

ExpertII 24 LX

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DV 2.28-01

GCC

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OK Cancel Apply

Paper Size (Paper Page) [DEFAULT SETTING: Y = the width of machine; X will be automatically set to be twice the length of Y]

The paper size represents your total work area. The X value represents the length and the Y value represents the width. The paper size should be set as the same as your image so you can get a better cutting quality.

Unit (Paper Page) [DEFAULT SETTING: Metric (mm)]

Here you can set your preferred measurement standard in which you would like use with the print driver. You can choose between metric or imperial standards.

3.6 Reference Parameter Setting for Different Materials

The following reference parameter is used on GCC verified materials shown in the table.

Material	Personalized/ Wall stickers	Vehicle stickers	Window decoration	Window tint
Blade	red	red	red	red / yellow
Blade tip length (mm)	0.28	0.27	0.25	0.09
Force (g)	105	85	95	70
Speed (cm/sec)	72	60	65	72
Offset (mm)	0.25	0.25	0.25	0.25
Recommend model	RX, Jaguar, Puma, EX, AR	RX, Jaguar, Puma, EX, AR	RX, Jaguar, Puma, EX, AR	RX, Jaguar, Puma, EX, AR
Material	Stencil	Reflective film	Flock	Cardboard
Blade	red / green	green	green	green
Blade tip length (mm)	0.3	0.5	0.3	0.3
Force (g)	180	380	135	165
Speed (cm/sec)	15	3	30	30
Offset (mm)	0.25 / 0.5	0.5	0.5	0.5
Recommend model	RX, Jaguar, Puma, EX, AR	RX, Jaguar, Puma, EX	RX, Jaguar, Puma, EX, AR	RX, Jaguar, Puma, EX, AR
Material	Magnets	Protective tint	Rhinestone	Sandblast mask
Blade	green	green	green	blue
Blade tip length (mm)	0.8	0.3	0.8	0.27
Force (g)	580	320	190	85
Speed (cm/sec)	3	3	15	60
Offset (mm)	0.5	0.5	0.5	0.25
Recommend model	RX, Jaguar	RX, Jaguar, Puma, EX	RX, Jaguar, Puma	RX, Jaguar, Puma, EX, AR
Material	Small text (vinyl)			
Blade	black			
Blade tip length (mm)	0.27			
Force (g)	thick: 150 thin: 90			
Speed (cm/sec)	9			
Offset (mm)	0.175			
Recommend model	RX, Jaguar, Puma			

Chapter 4 Basic Maintenance

This chapter explains the basic maintenance (i.e. cleaning the cutting plotter) required for the cutting plotter. Except II for the steps mentioned below, all the other maintenances must be performed by a qualified service technician.

4.1 Cleaning the cutting plotter

In order to keep the cutting plotter under good conditions and have the best performance, you need to clean the machine properly and regularly.

Precaution in Cleaning



- ✧ Unplug the cutting plotter before cleaning.
- ✧ Never use **solvents, abrasive cleaners or strong detergents** for cleaning. They may damage the surface of the cutting plotter and the moving parts.

Recommended Methods

- ❖ Gently wipe the cutting plotter surface with a lint-free cloth. If necessary, clean it with a water-rinsed or an alcohol-rinsed cloth. Wipe the cutting plotter to remove any residues on the cutting plotter. Finally absorb water with a soft, lint-free cloth.
- ❖ Wipe all the dust and dirt from the tool carriage rail.
- ❖ Use a vacuum cleaner to clean any accumulated dirt and media residue beneath the pinch roller housing.
- ❖ Clean the platen, paper sensors and the pinch rollers with a water-rinsed cloth or alcohol-rinsed cloth. Finally absorb water with a soft, lint-free cloth.
- ❖ Use the same method mentioned above to clean dust and dirt from the stand.

4.2 Cleaning the Grid Drum

- ❖ Turn off the cutting plotter, and move the tool carriage away from the area needed to be cleaned.
- ❖ Raise the pinch rollers and move them away from the grid drum for cleaning.
- ❖ Use a bristle (a toothbrush is also acceptable) to remove dust from the drum surface. It needs to rotate the drum manually to clean the drum completely (Figure 4-1).

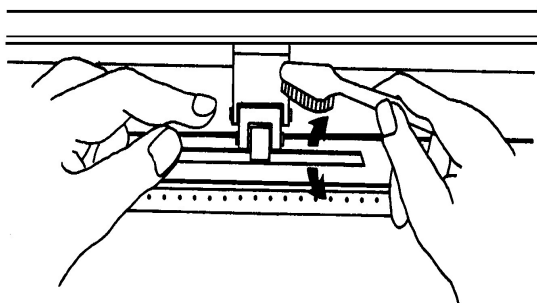


Figure 4-1

4.3 Cleaning the Pinch Rollers

If the pinch rollers need a thorough cleaning, use a lint-free cloth or cotton swab to wipe away the accumulated dust from the rubber portion of the pinch rollers. To prevent the pinch rollers from rotating while cleaning, use your fingers to hold the pinch rollers in place.

Use a lint-free cloth or cotton swab rinsed with alcohol to remove the embedded or persistent dust.

Chapter 5 Automatic-Aligning System

AAS II (Automatic-Aligning System II) is only available for Expert II LX models. For Expert II 24 or 52 users, you can skip this chapter.

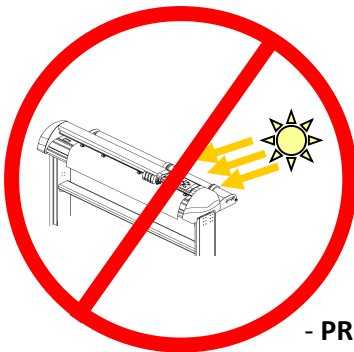
Please note that this chapter is only an instruction to AASII; for step-by-step instructions, please refer to the following chapters: 07_A-4 CorelDraw Plug-In, 07_A-5 Illustrator Plug-In, 07_A-6 GreatCut Plug-In.

5.1 Introduction

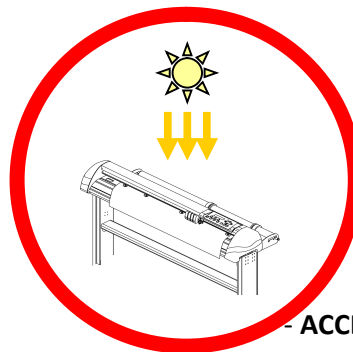
The Expert II cutting plotters feature a standard Automatic-Aligning System (AAS II) to guarantee precise contour cutting quality by detecting the registration marks printed around the graphic.

Notice

- Avoid any kind of light source horizontally illuminating the AAS module.



- PROHIBITED



- ACCEPTABLE

- DO NOT take off the cover of AAS module while in operation.



- PROHIBITED

5.2 AAS Contour Cutting System

The AAS system has one calibration procedures to ensure maximum accuracy of AAS operation. To operate the AAS you need to learn about the method of media feeding firstly. (Refer to 2.4 Media Loading.)

5.2.1 Notice for Registration Marks

The first registration mark is designed to be different in order to identify the origin for AAS auto-detection. The following precaution must be aware for registration marks to be read automatically.

- Type of media
- Registration mark pattern
- Reading range required for detection the registration marks
- Position for registration marks and medium

The registration marks have to be:

- Created by cutting software like GreatCut or GCC CorelDRAW plug-in
- In black color (printing quality of registration marks is essential; incorrect, misaligned colors, blurry or smeared printout might leading to inaccurate cutting result)
- Length: The length of marks
 - Range: 5mm~50mm
 - Optimized Setting: 25mm
- Thickness: The line thickness of marks
 - Range: 1mm~2mm
 - Optimized Setting: 1mm
- Margin: The distance between marks and images
 - Range: 0mm~50mm
 - Optimized Setting: 5mm

The cutter can not detect the marks while:

- Cutter carriage is not located near the outside area of first mark before detecting (See the picture in page 5-7 for auto-detecting area of first mark.)
- Medium thickness is more than 0.8mm
- Transparent medium is used
- Non-monochrome drawing. The marks can't be read if is printed on colored medium
- Dirty or creased medium surface

5.2.2 AAS II on Expert II

There are three types of AAS II mark patterns: 4-Point Positioning, Segmental Positioning, and Multiple Copies. Note that before print out your designs by inkjet printers, the registration marks have to be created on your graphic designs by cutting software like SignPal, GreatCut or GCC CorelDraw plug-in.

Hand-made marks or drawings won't be reorganized by GCC cutting plotters. For more details about registration mark setting in cutting software, please refer to 'Appendix A-4 : CorelDraw Plug-In Instruction', 'Appendix A-5 : Illustrator Plug-In', Appendix A-6 -S quick manual.

1. 4-Point Positioning

This is the basic mark pattern that AAS II will auto detect four registration marks and contour cut images inside those marks.

- Command: Esc.D1;(XDist);(YDist):
- Layout: 4 registration marks at the 4 corners around the design



2. Segmental Positioning

In addition to 4 original points, the intermediate registration marks are added on both X axis and Y axis to help contour cut accurately, especially for cutting large images.

- **Command:** Esc.D2;(XDist);(YDist);(XStep);(YStep):
- **Layout:**
In-between distance on X: 200~600mm, default 300mm
In-between distance on Y: 200~600mm, default 300mm

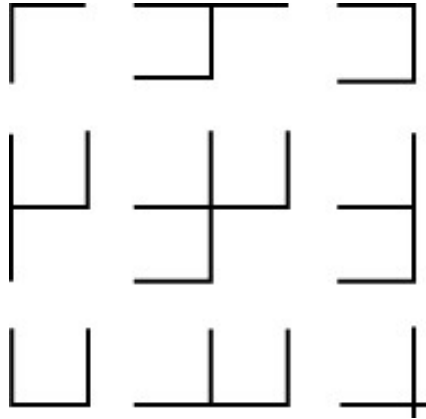


3. Multiple Copies

The function is used to duplicate images to let you cut quantities of images at a time. The AAS II sensor will automatically scan registration marks for each individual image to ensure the contour cutting precision.

- **Command:** Esc.D3;(XCopies);(YCopies);(Space):

■ Layout:



5.3 Printer Test

Before performing AAS contour cutting, it's recommended to print out a test file to make sure the AAS II cutting accuracy. Please visit GCC website and go to Download Area to download the test files.

<https://www.gccworld.com/download.php?act=view&id=20>

Title	Size	Download
Cutter AAS Offset Test Files	3.0MB	Download
Cutter Clipart Library (AE file)	1107KB	Download

There are two testing files for AASII:

1. AAS II_X_Y_Offset_Caberation_A4 .eps (A4 size)
2. AAS II_X_Y_Offset_Caberation_600_600 .eps (Default setting, it is recommended for testing)

- Print out the testing graphic. (Please use high precision printer)
- Load the graphic to Expert II and sent the file to test the cutting job
- If there are any adjustments to be made, you can change the offset value by following the steps:

- Measure the offset values from the printed line and the actual cutting line.

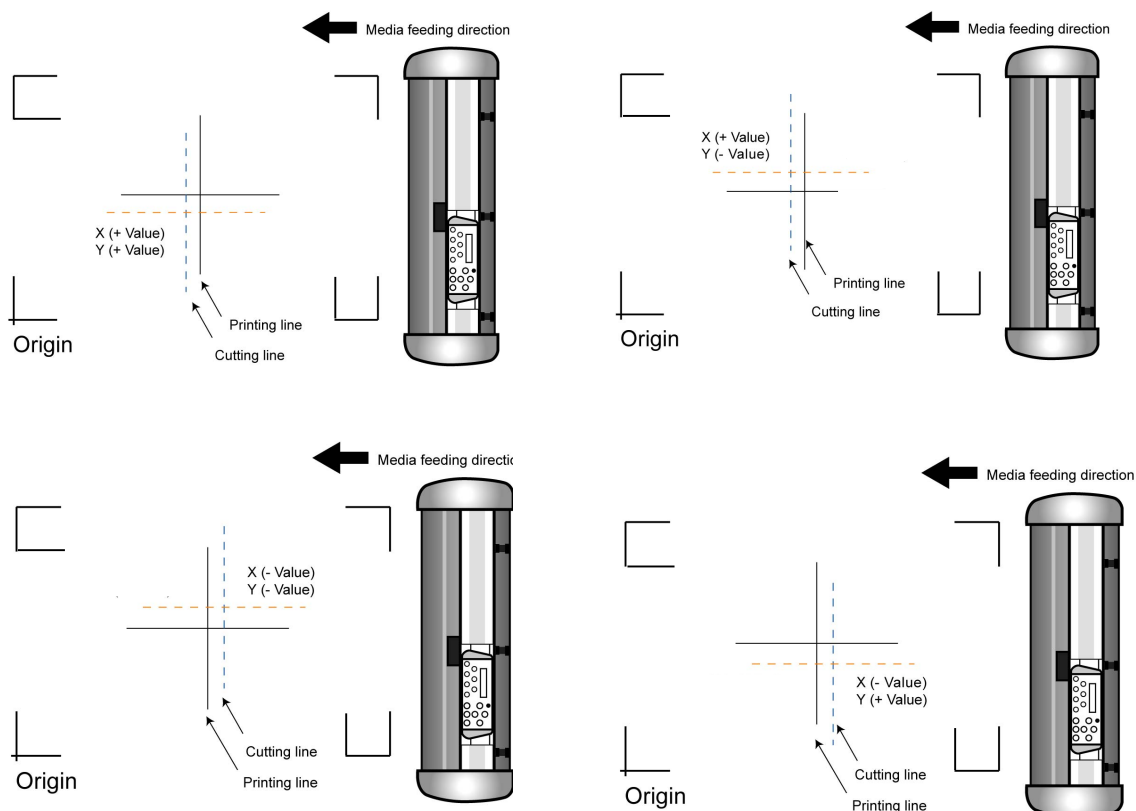
- Enter the AAS Offset under MISC function for the values you just measured, then press Enter

- Test the cutting again

- AAS II offset X and Y value is defined as following:

Horizontal line is defined as X and vertical is defined as Y (when facing the cutting plotter)

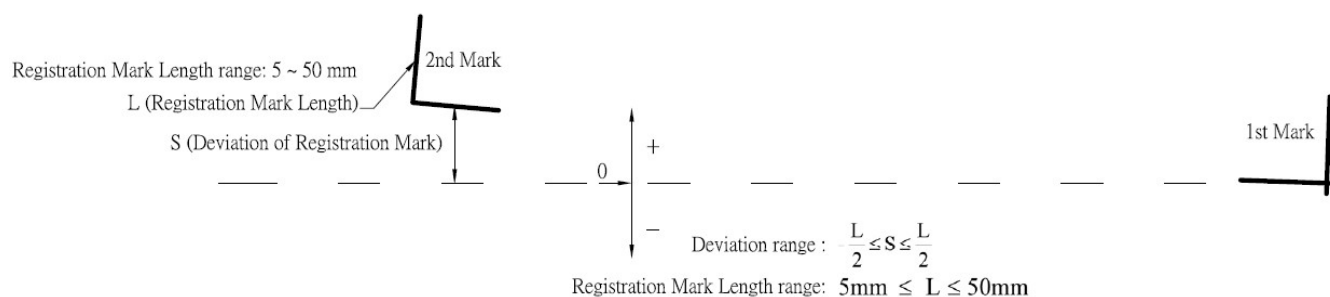
- When the actual cutting line and the printed line need to be changed towards the direction of origin mark, then simply add the negative value of the offset. If the direction is from the opposite of the origin mark, then enter positive values for the offset (see the following figures). This method applies to both X and Y axes.



- Before adjusting the AAS II settings, please proceed scaling for width and length.
- The blade offset value isn't set for this test graphic, please set it according to the blade you use.
- If you have any question, please contact us or your local distributor for assistance.

5.4 Registration Mark Offset Range

Please correctly load your media (refer to the alignment ruler on the platen) to make sure the registration marks are successfully detected. Deviation exceeds the range below will lead to detection failure.



5.5 Contour Cutting

For accurate contour cutting with AAS function, please proceed the following steps:

Step 1 Creating Graphics

- Create the graphic that you want to print and cut in your software.



- Create a contour for cutting around the graphic.



TIPS1: Leave some space between the graphic and contour line.

TIPS2: Create the contour in a separate layer and assign a different color for it.

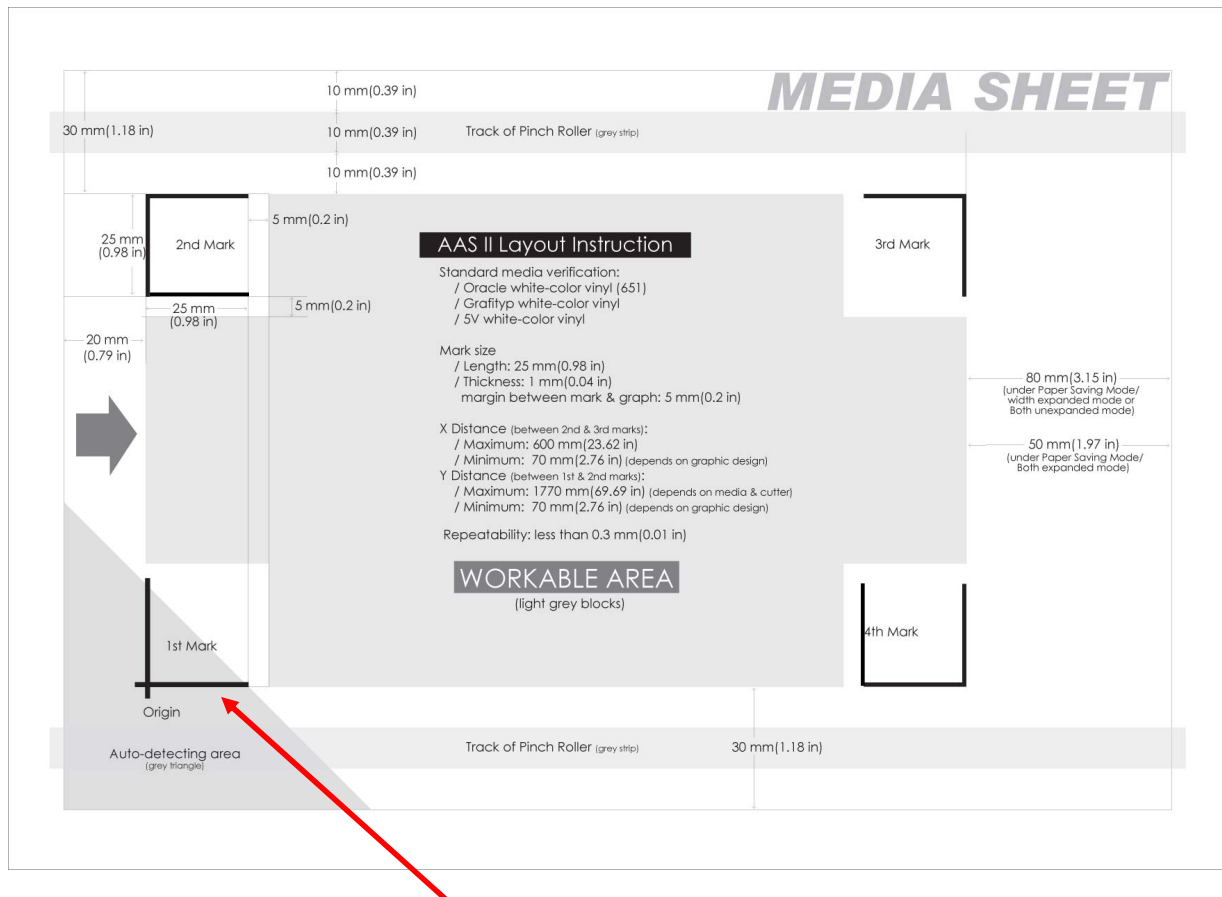
- Add registration marks around the graphic.

Note:

The Multiple Copies function is also available. It automatically copy the graphic and registration marks.

Step 2 Placing the Registration Marks

■ The AAS Layout Instruction:

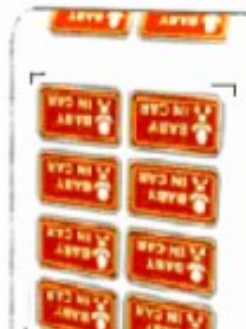


* Auto-detection function on the 1st mark covers the grey area

- Suggested 30mm margin on both left and right sides of media sheet.
- Suggested 20~30mm margin on top of media sheet, and at least 50mm margin on the bottom edge to prevent sheets dropping or any error occurred while media sizing.

Step 3 Print the Graphics

- Print the graphic and the marks with your printer

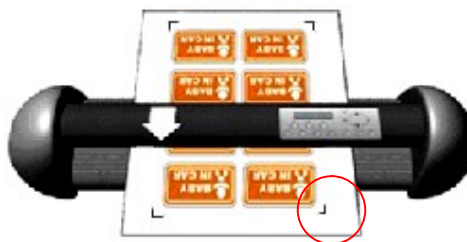
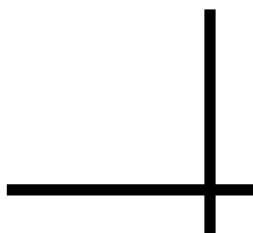


(Scaling = 100%).

- When printing on a roll media, make sure the orientation as following:

Step 4 Load the printout onto cutter

- The Origin Mark is different from the rest registration marks. Please make sure the media is fed with correct direction.

**Step 5 Cut the Contour**

- Send out the command from software to perform the contour cutting job.

5.6 Tips for AAS

For getting better results of contour cutting, there are some tips below for your reference.

- Keep light sources simple and avoid illuminating from the sides of cutter.
- Before operating AAS, change the maximum paper size in Expert II driver property.

Step 1 Find the **Expert II model** in the “Printer & Fax” folder of your PC.

Step 2 Open the Properties window and select the “Paper” tab.

Step 3 Change the maximum Paper Size of X to **1200mm**.

- Adjust the cutting speed to between 200~400mm/sec.
- Avoid the registration marks locating on the tracks of pinch rollers.
- Make sure the edge of the media is not bent up when detecting registration marks.

Chapter 6 Trouble Shooting

This chapter helps you to correct some common problems you may come across. Prior to getting into the details of this chapter, please be sure that your application environment is compatible with the cutting plotter.

Note:

Before contacting your local dealer, please make sure that the problems are coming from your cutting plotter, not from the communication between the computer and cutting plotter or from a malfunction in your computer or software.



Why doesn't the cutting plotter operate?

6.1 What if Expert II cannot operate?

If your cutting plotter doesn't plot, please check the following items first:

- Is the power cord plugged in properly?
- Is the power cord connected to the power connector properly?
- Is the power switch turned on properly?







Solutions: If the POWER LED lights on, the cutting plotter should be in a normal condition.
Turn off the cutting plotter and turn it on again to see if the problem still exists.
If the POWER LED doesn't light, please call your local dealer to resolve this problem.

6.2 Light Indicators

Some of the operating problems can be identified by the lights on the control panel.
When your cutting plotter stops operating or the lights are on or flashing unexpectedly, see the following descriptions of the panel light patterns and the actions you should take.

6.2.1 Warning Indicators

When the ERROR LED flashes (as shown below), take the necessary actions according to the following instructions. When the problems are solved, the ERROR LED will turn off automatically. Pressing the ON/OFF LINE button can also turn off the ERROR LED.

Warning Indicators		ERROR	ON/OFF LINE	REPEAT	DATA CLEAR	CUT TEST
1	Graph was clipped		●	●	○	○
2	HPGL/2 command Error		●	○	●	○
3	Lever up or no media		●	○	○	○
4	Cannot repeat		○	●	○	○
5	Communication error		○	○	●	○
6	Width sensor error		○	○	○	●
7	Check media, drum or X motor	●	○	○	●	○



= flash

● = on

○ = off

Warning 1 The graph is clipped

This condition indicates that the cutting graph is bigger than the cutting area.

You can solve the problem by:

1. Reload a wider or longer media.
2. Move the pinch rollers to widen the cutting area.
3. Re-scale the graph to a smaller size. Then send the cutting job again from your computer to the cutting plotter.

Warning 2 HPGL/2 command error

If the cutting plotter cannot recognize the commands from your computer, please check the commands applied to your cutting plotter in the HP-GL/2 or HPGL commands. Then send the same job to the cutting plotter again.

If that doesn't solve the problem, please contact your local dealer.

Warning 3 Lever up or no media

Check that you have lowered the lever down and make sure that you load the media before cutting.

Warning 4 Cannot repeat cutting

There are two possibilities:

1. There is no data in the buffer: please send the job again from your computer;
2. The buffer is full: please send the same job from your computer again.

Under both conditions, press the ON/OFF LINE key to clear the warning message.

Warning 5 Communication error

Check that the serial/USB cable has been connected to the cutting plotter and computer properly.

If so, then check whether the interface settings are correct. Check that the communication settings in your PC are the same as the ones on your cutting plotter (for example – 9600bps, no parity, 8 bits, 1 stop bit). Then, press ON/OFF Line key to switch back to On Line mode.

Warning 6 Width sensor error

Check that the pinch rollers are positioned above the grid drum and reload the media again.

Note:

In order to identify the warning messages easily, please stick the warning sticker (in accessory box) on the side cover of your cutting plotter.

6.2.2 Error Indicators

If some mechanical problems occur during the operation, the ERROR LED will turn on. Please follow the instructions below to solve the problem. If the cutting plotter still cannot work, please contact your local dealer and tell him or her about the error indicator.

	Error Indicators	ERROR	ON/OFF LINE	REPEAT	DATA CLEAR	CUT TEST
1	SRAM error	●	●	○	○	○
2	DRAM error	●	○	●	○	○
3	Check media, drum, or X motor	●	○	○	●	○
4	Check media or Y motor	●	○	○	○	●



= flash

● = on

○ = off

Error 1 and 2

Please contact your local dealer to replace SRAM or DRAM.

Error 3 Check the media, drum or X-motor (Drum driven motor)

This message indicates that there might be a problem on the **X-axis**.

Please check that the drums are working normally and see that the media is well loaded. Then turn on the power and reboot the cutting plotter.

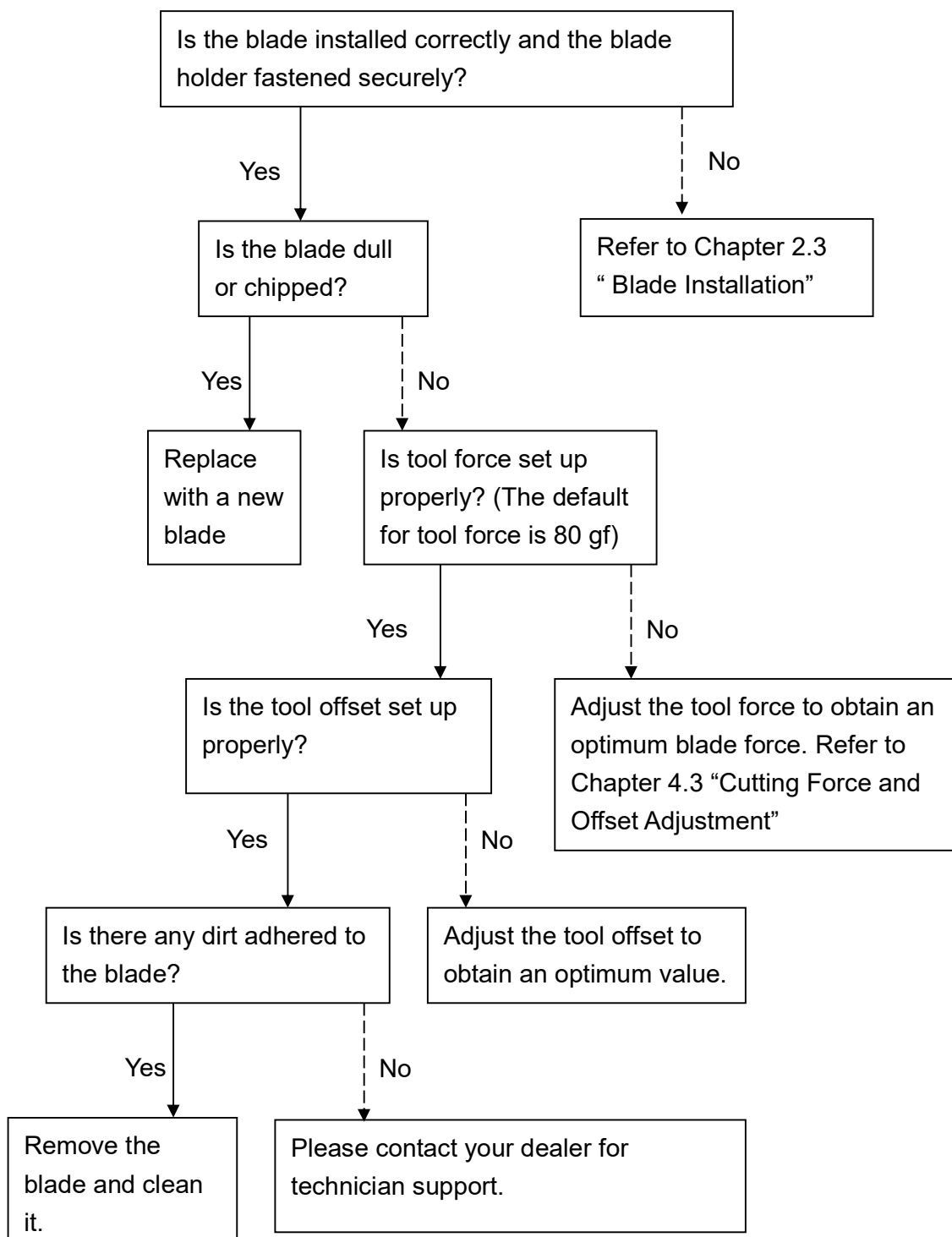
Error 4 Check the media, or Y motor (carriage driven motor)

This message indicates that there might be an obstruction to the carriage relating to a problem on the **Y-axis**.

Please clear the obstruction and check that the carriage can move smoothly. Then turn on the power and reboot the cutting plotter.

6.3 Cutting Quality Problems

Note: The daily maintenance of your cutting plotter is very important. Be sure to clean up the grid drum and pinch rollers regularly for better cutting accuracy and output quality.








Expert II Series Specification

Model Number		EX II-24	EX II-24LX	EX II-52	EX II-52LX
Max. Cutting Width		600 mm (23.6 in.)		1320 mm (51.96 in)	
Max. Media Width		719 mm (28.3 in.)		1470 mm (57.87 in.)	
Material Thickness		0.8 mm			
Max. Cutting Force		350 g			
Max. Cutting Speed		705 mm/sec (27.8 ips) (at 45 degree direction)		635 mm/sec (25 ips) (at 45 degree direction)	
Mechanical Resolution		0.009 mm (0.00035 in.)		0.012 mm (0.00049 in.)	
Software Resolution		0.025 mm (0.00098 in.)			
Distance Accuracy		±0.254 mm or ±0.1% of move, whichever is greater			
Repeatability		±0.1mm			
Tracking		3M			
Memory Buffer		1 MB / 500 KB (when using AAS)			
Interfaces		USB 2.0 (Full Speed) & RS-232			
Type of Command		HPGL, HPGL/2			
Configurable Origin		Yes			
Control Panel		6 LEDs / 10 Keys			
Diameter of Blade		2.5 mm			
Dimension	(H*W*D) mm	233*880*255		1065*1632*620	
	(H*W*D) in	9.1*34.6*10		41.93*62.25*24.41	
Net Weight		11KG (24.3lb)		53KG (116.4lb)	
Stand		Optional		Standard	
Automatic-Aligning System (AAS II)		Available on Expert II LX models			
Power Supply		100-240 VAC, 50 /60 Hz (auto switching)			
Power Consumption		Max. 288 W			
Operation	Temperature	15°C~30°C / 60°F~86°F			
Environment	Humidity	25% ~ 75%			

- Compatible with Windows 7 and above & MAC OS X 10.6 and above. (*Purchasing serial number for "Sure Cuts A Lot" software to work with Mac OS.)
- The specification and data sheet may vary with different materials used. In order to obtain the best output quality, please maintain the machine regularly and properly.
- GCC reserves the right to change the specifications at any time without notice
- GCC certified material in tracking is Avery MPI 3000.
- The above listed specification values are effective only when operated with media certified by GCC.

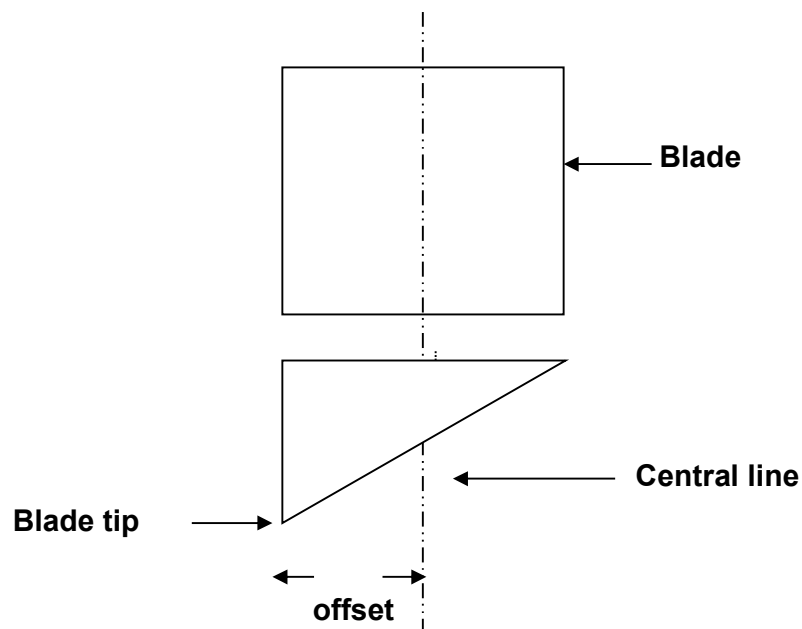
Blade Specification

202003480G	For cutting thick fluorescent and reflective vinyl. Also for cutting detailed work in standard vinyl.
	The blade is 45° with Red Cap (5-unit package), 0.25 mm offset, and 2.5 mm blade diameter.
	
290088080G	For cutting reflective vinyl, cardboard, sandblast, flock, and stencil sharp edge.
	The blade is 60° with Green Cap (2-unit package), 0.50 mm blade offset, and 2.5 mm blade diameter.
	
265017550G	For cutting thin sandblast mask and stencil. The blade with sharp angle and special design, allowing it to maneuver around sharp corners.
	The blade is 60° with Blue Cap , 0.25 mm blade offset, and 2.5 mm blade diameter.
	
265017560G	For Cutting small text and fine detail. Sharp blade with smallest offset.
	The blade is 50° with Black Cap , 0.175 mm blade offset, and 2.5 mm blade diameter.
	
265017530G	For thin and delicate media such as window tint.
	The blade is 25° with Yellow Cap , 0.25 mm blade offset, and 2.5 mm blade diameter.
	

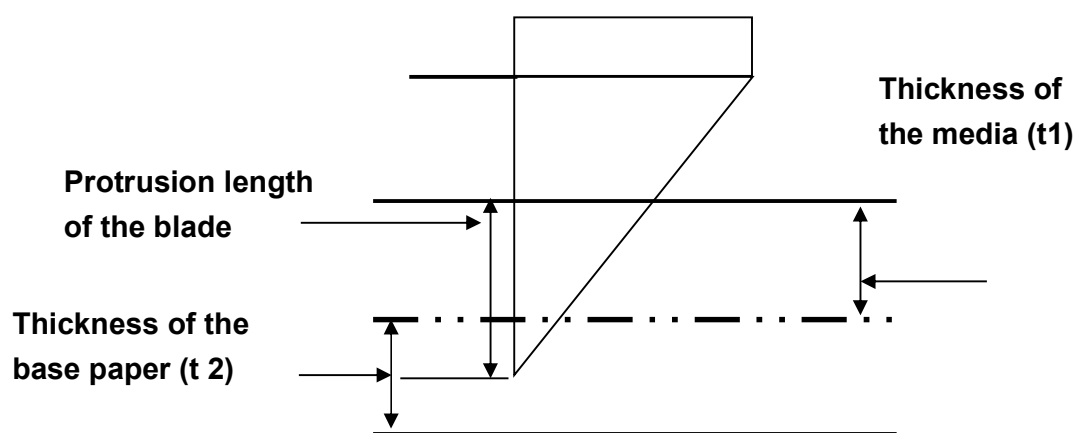
About the Tool

A generic term referring to the blade that cuts the sheet, the pen that does plotting, and the LED bombsight (option) used for pointing to the reference point.

OFFSET is the distance that the blade tip is displaced from the centerline of the blade.



Protrusion Length of the Blade



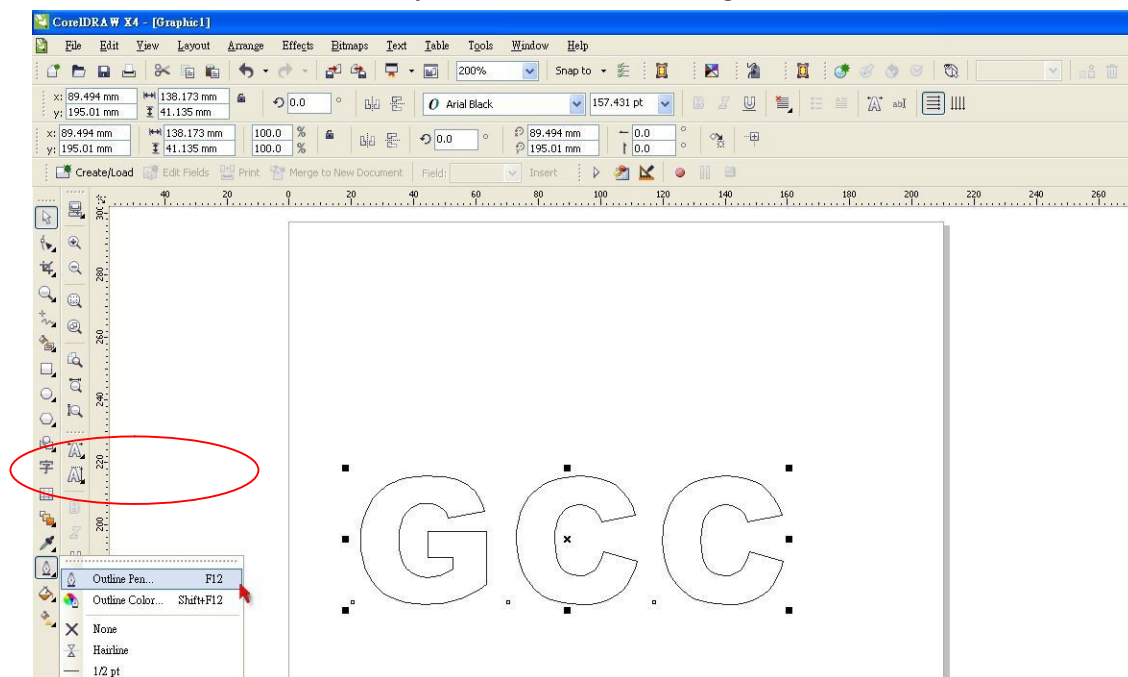
Length of protrusion = $t_1 + t_2 / 2$, but for your convenience you may just make it about 0.3mm ~ 0.5mm beyond the blade holder tip.

CorelDRAW Output Instruction

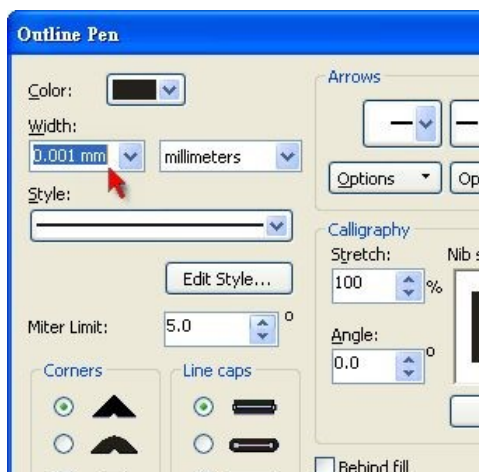
The following is an example of how to output the file with CorelDRAW.

User Instructions

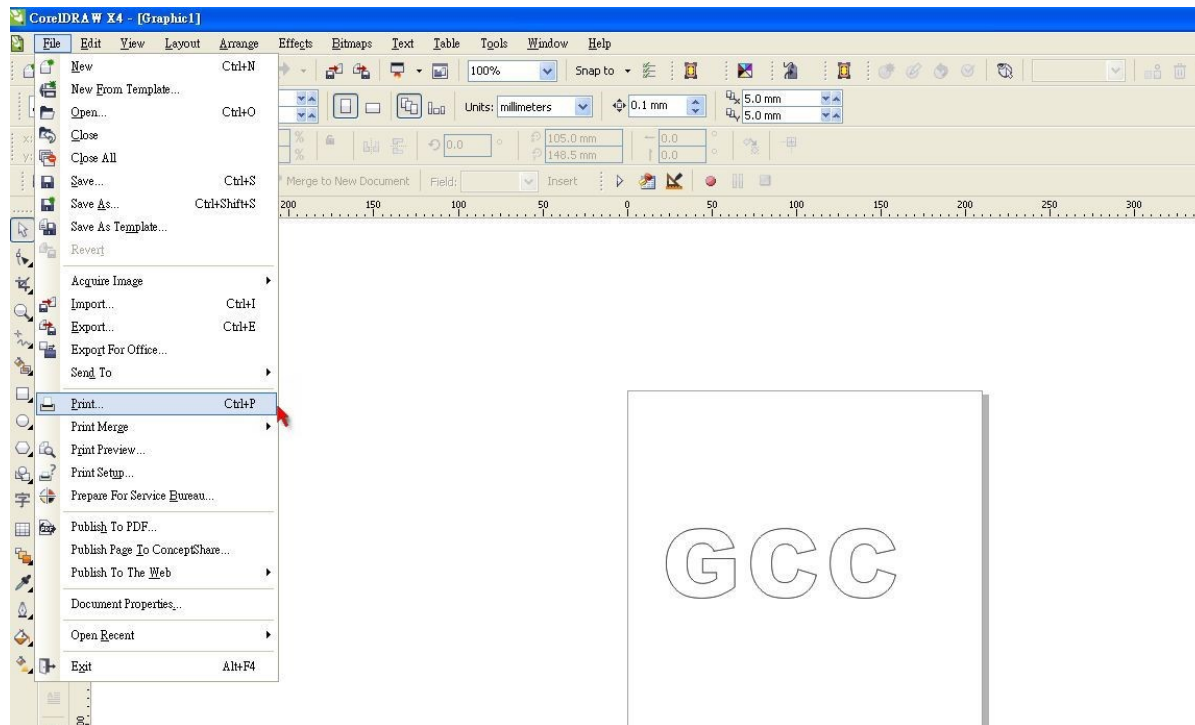
1. Open CorelDRAW, finish editing all the files you wish to plot and select all the images at once.
2. Select “Outline Pen” to adjust the outline for cutting.



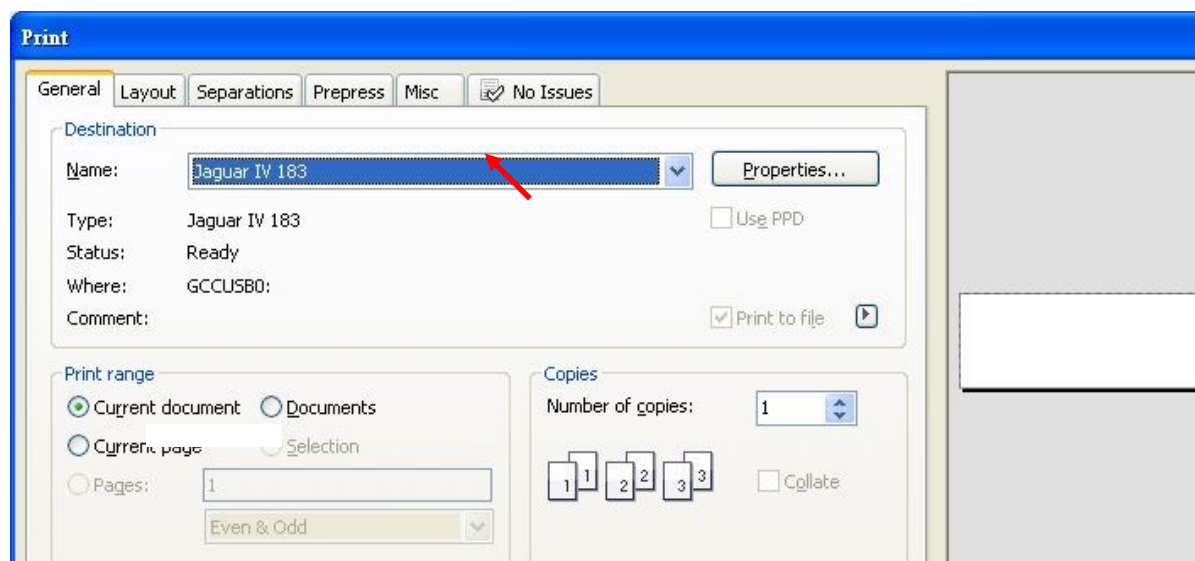
3. Adjust the value of pen width to 0.001 mm and click “OK” to save your input.



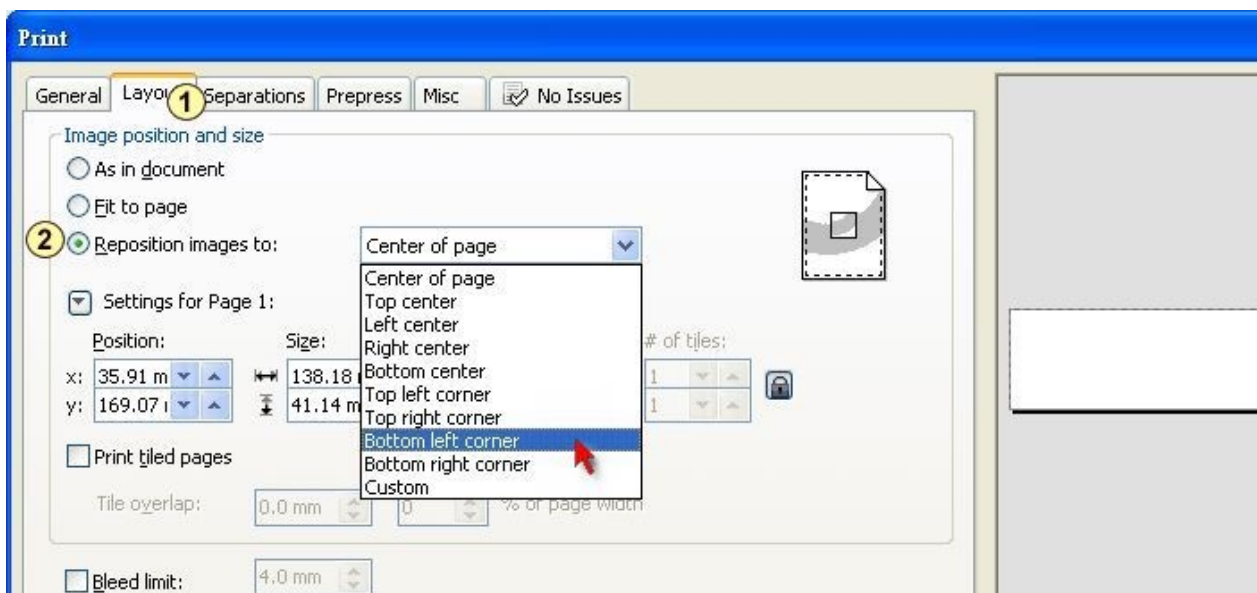
4. Select “File → Print” to output the file to your cutters.



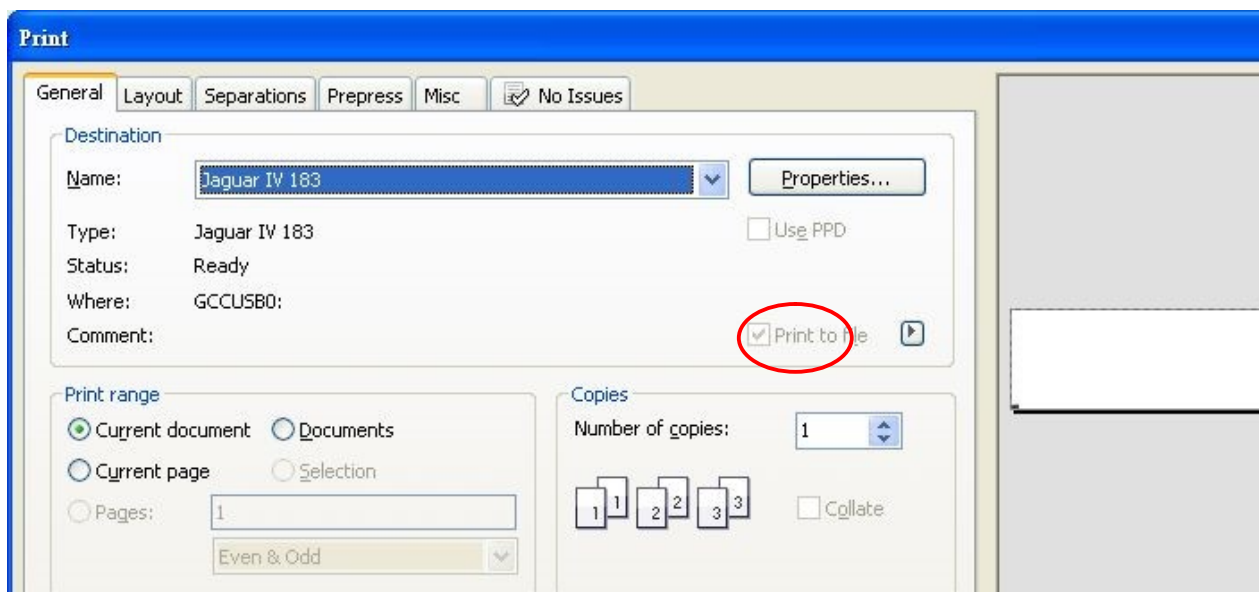
5. Choose the correct model you have installed.



6. Choose the “Layout page” and click the “Reposition images to: → Bottom left corner”. **Please note that you must put your image at the bottom left corner.**



7. Go back to the General page and check that your image is at the bottom left corner. Click “Print” and get a wonderful cutting image.



CorelDRAW Plug-In Instruction

AASII VBA Installer is applicable for CorelDRAW Version 13, 14, 15, 16, 17, 18

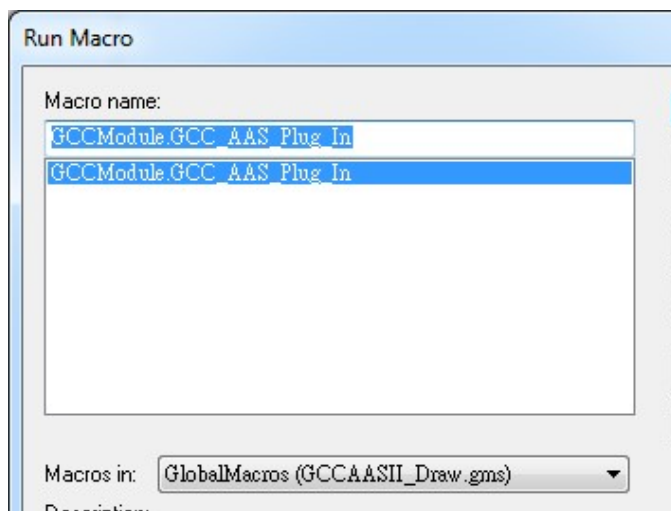
Installation

Please refer to Step 8 in Chapter 2.7.1.2 Driver Installation to install AAS plug-in for CorelDRAW.

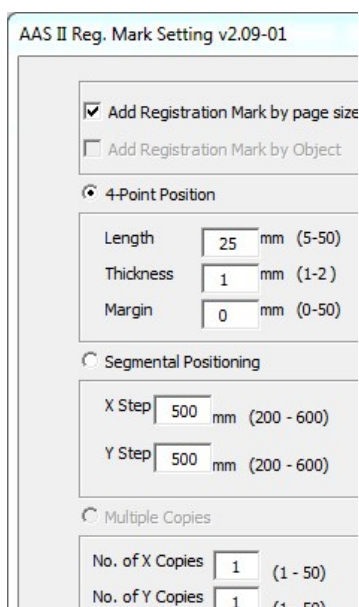
Run CorelDRAW AAS Plug-in

Step 1 Run CorelDRAW to edit your graphics and select all images at once when you wish to plot.

Step 2 Select “Tools→Macros→Run Macro.” Then select **Global Macros (GCCAASII_Draw.gms)** under the “Macros in” manual, and press “Run”.



Step 3 Click on “Apply” and select whether you would like to add the registration marks by page size or by object.

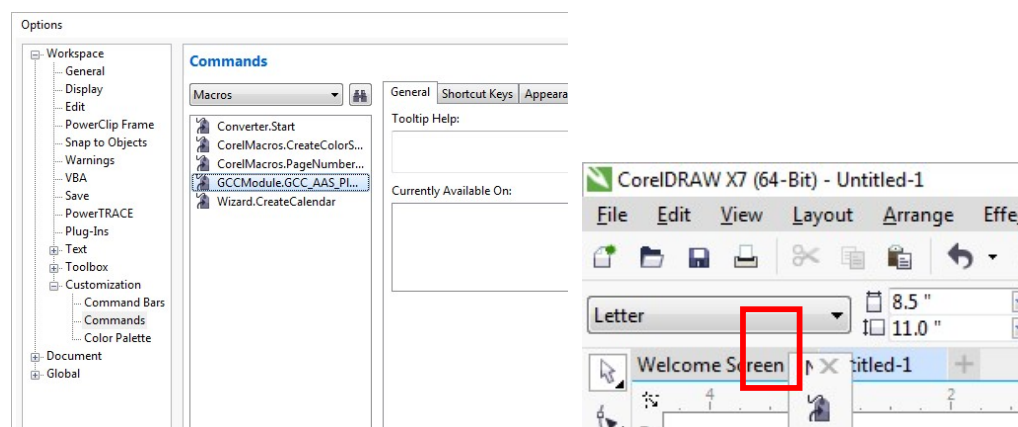


Step 4 Now you can print out the image file with registration marks.

Note: “Add Registration Mark by Object” will be the default selection if you click on the image whereas “Add Registration Mark by page size” will be the default one when the blank area on the page is clicked.

You can also add a Hot Icon for the AAS Plug-in

Select “Tools→ Options→ Workspace→ Customization→ Commands→ Macros→ GCCMadual.GCC_AAS_Plug_In” and Click OK.



Add Registration Mark by page size

If you tick “Add Registration Mark by page size” as shown in the figure below and click “Apply”, your registration marks will be created automatically (please see Figure A3-1).

Note:

1. The length setting will be in the range of 5-25mm according to your page size.
2. Please **DO NOT** make any changes to the “Origin” section when you choose to add registration marks by page size as indicated below otherwise the position of the marks will be changed (please see Figure A3-2).

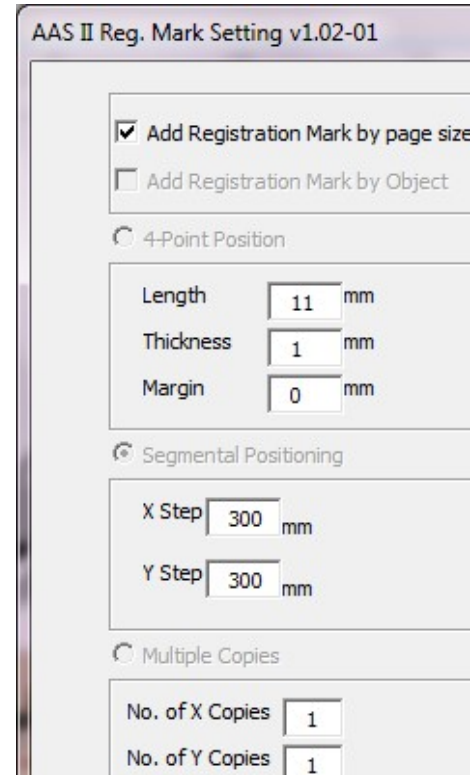
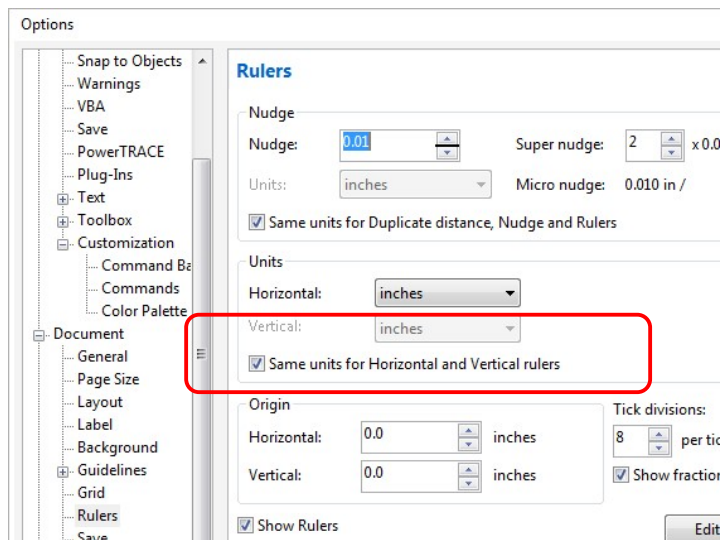


Figure A3-1

Figure A3-2

The system will create the 4 marks on the 4 corners of the page as shown in the picture below wherever you move your image.

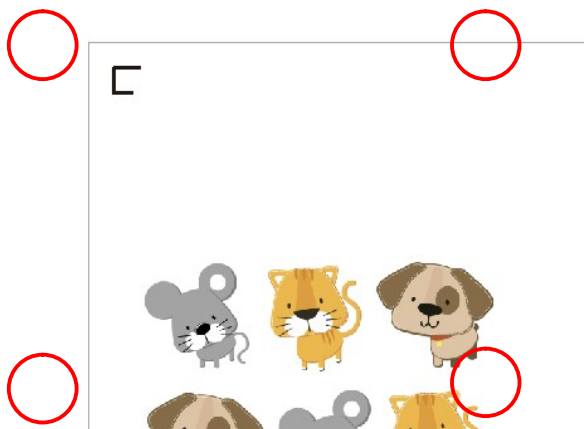


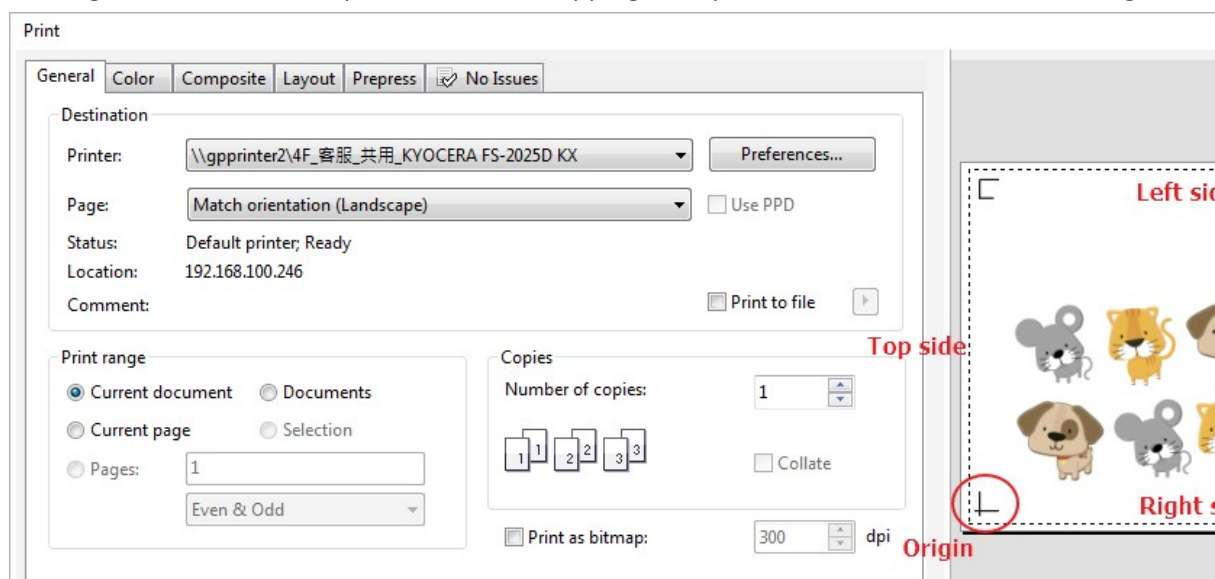
Figure A3-3

Workable area

It allows users to edit and cut graphics in the area outside the registration marks when adding registration marks by page.

For A4 size media sheet, the workable area is 2.5mm extended from the registration mark on left and right sides and 4.5mm extended from the registration mark on top side. On the bottom side, it is suggested to leave at least 25mm margin from the edge of media sheet to prevent sheets dropping or any error occurred while media sizing.

For A3 size media sheet, the workable area is 10mm extended from the registration mark on the left side, 9mm extended from the registration mark on the right side and 11mm extended from the registration mark on top side. On the bottom side, it is suggested to leave at least 25mm margin from the edge of media sheet to prevent sheets dropping or any error occurred while media sizing.



Note: Select “**Edge**” mode when media sizing to allow the media sheet to be unrolled. If you select “**Single**” mode, the media sheet will not be able to be moved back and hence fail to be detected by front paper sensor.

Add Registration Mark by Object

If you tick “Add Registration Mark by Object”, you will be offered three options of registration marks as shown below.

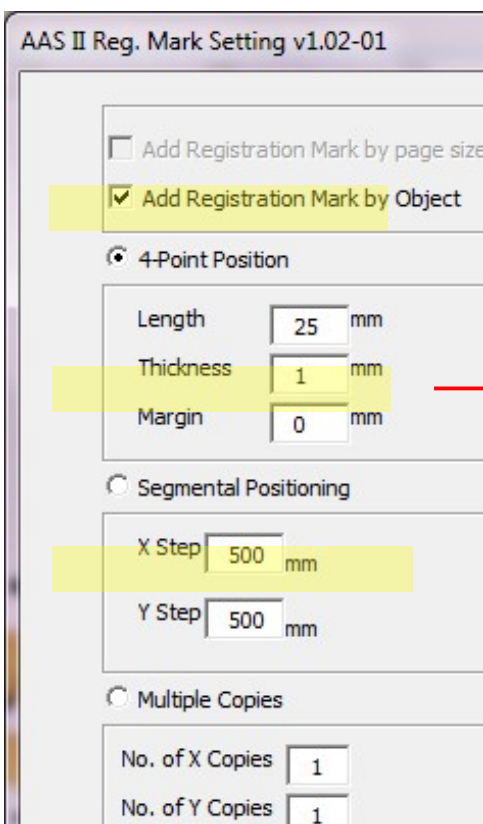


Figure A3-4

4-Point Positioning

- Length: The length of marks
→ Range: 5mm~50mm
→ Optimized Setting: 25mm
- Thickness: The line thickness of marks
→ Range: 1mm~2mm
→ Optimized Setting: 1mm
- Margin: The distance between marks and images
→ Range: 0mm~50mm
→ Optimized Setting: 5mm

Segmental Positioning

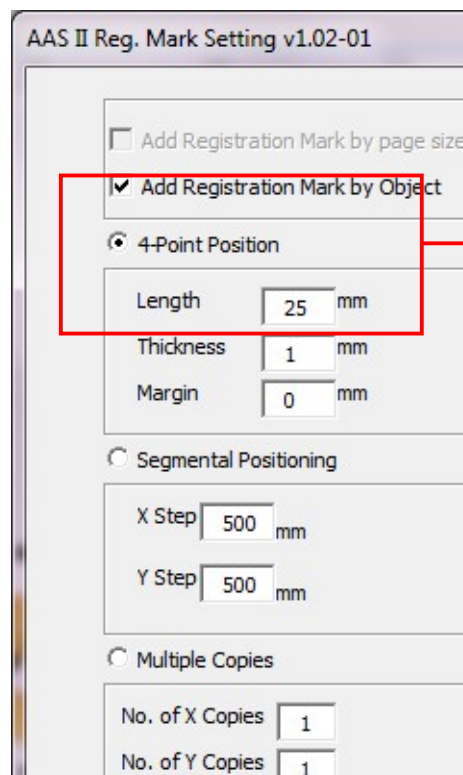
- X Step: The distance of intermediate position on the X axis
- Y Step: The distance of intermediate position on the Y axis
→ Range: 200mm~600mm
→ Optimized Setting: Less than 500mm

Multiple Copies

- No. of X Copies: The numbers of copies on X axis
- No. of Y Copies: The numbers of copies on Y axis
→ Range: 1~50. (The more copies you make, the more time is needed for data transmission.)
→ Numbers of X Copies * Numbers of Y Copies = The total amount of image copies
- Copies with outline: To show outlines of image graphics

Note: The values entered in the “4-Point Positioning” section (length, thickness and margin) will still be applied when you tick “Segmental Positioning” or “Multiple Copies”.

4-Point Positioning



4-Point Positioning

- Length: The length of marks
→ Range: 5mm~50mm
→ Optimized Setting: 25mm
- Thickness: The line thickness of marks
→ Range: 1mm~2mm
→ Optimized Setting: 1mm
- Margin: The distance between marks and images
→ Range: 0mm~50mm
→ Optimized Setting: 5mm

Figure A3-5

The system will create the 4 marks as shown in the picture below.

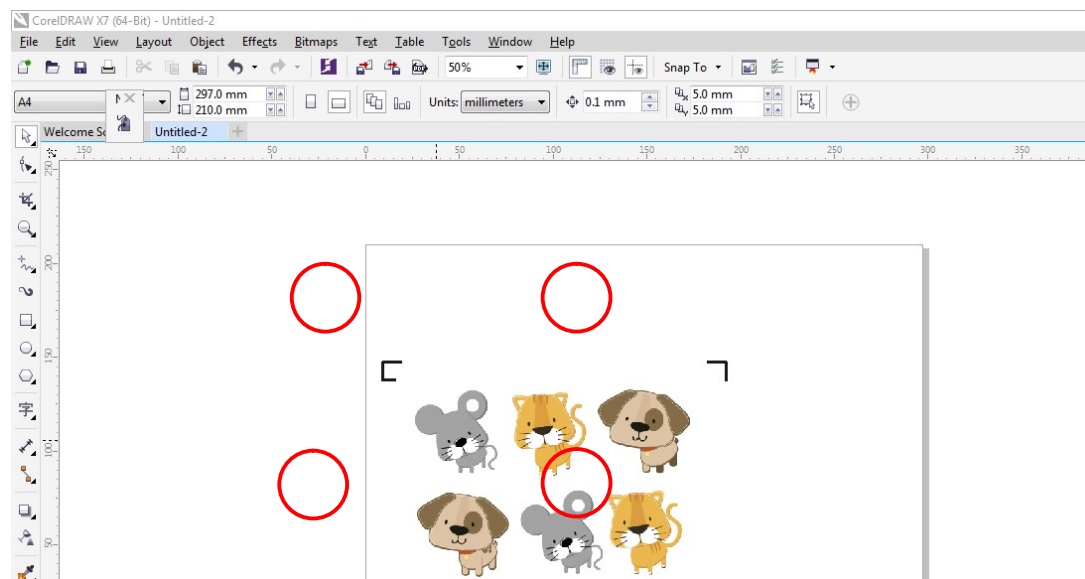
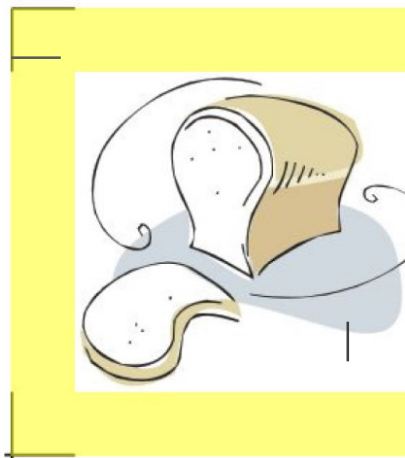
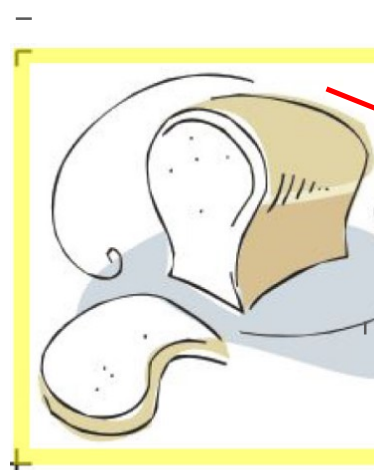


Figure A3-6

Note:

1. To save your materials, in addition to amending object margins, you can also adjust the length of the registration marks (5mm minimum) when you apply 4-Point Positioning (see table 1 for suggestions based on different material sizes). The smaller the size is, the smaller the distance between the object and the registration marks is (see the figures below).

**Figure A3-7****Figure A3-8**

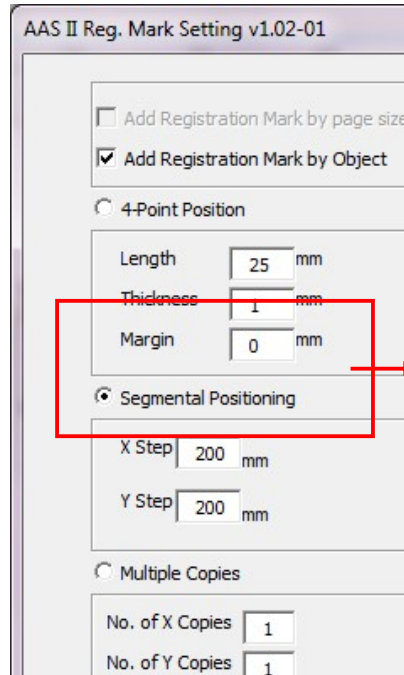
Page size (unit: mm)	Suggested mark length (unit: mm)
A6 (105 × 148)	5
A5 (148 × 210)	8
A4 (210 × 297)	11
A3 (297 × 420)	16
A2 (420 × 594)	23
A1 (594 × 841) and above	25*

Table 1

*25mm is the suggested value for the registration mark length

2. The size of the registration marks would affect the accuracy of registration mark detection so please make sure the amount you enter is reasonable.
3. If you change the paper size, you will have to reset the registration marks otherwise the previous setting will be applied.

Segmental Positioning



For precise cutting quality, it is suggested to select “Segmental Positioning” when you are working on an extra long or large-sized image to increase cutting accuracy.

Segmental Positioning

- X Step: The distance of intermediate position on the X axis
- Y Step: The distance of intermediate position on the Y axis
 - Range: 200mm~600mm
 - Optimized Setting: Less than 500mm

Figure A3-9

The system will create the as shown in the picture below

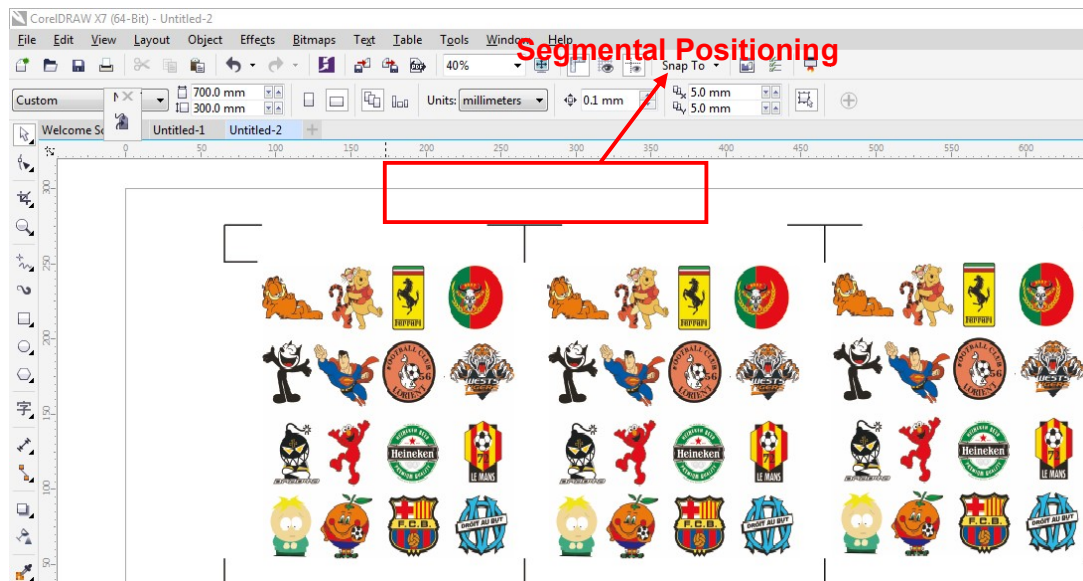
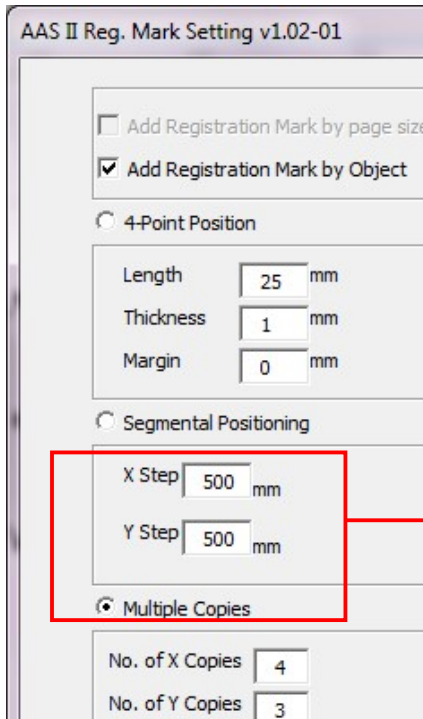


Figure A3-10

Segmental Positioning will be applied to Multiple Copies when the object to be copied is of large size (with the length or width over 200mm) to increase the accuracy of registration mark detection.

Multiple Copies

It is suggested to select “Multiple Copies” when you would like to make several copies of one image on your material to increase cutting accuracy.



Multiple Copies

- No. of X Copies: The numbers of copies on X axis
- No. of Y Copies: The numbers of copies on Y axis
→ Range: 1~50. (The more copies you make, the more time is needed for data transmission.)
→ Numbers of X Copies * Numbers of Y Copies = The total amount of image copies
- Copies with outline : To show outlines of image graphics

Figure A3-11

The system will create the as shown in the picture below.

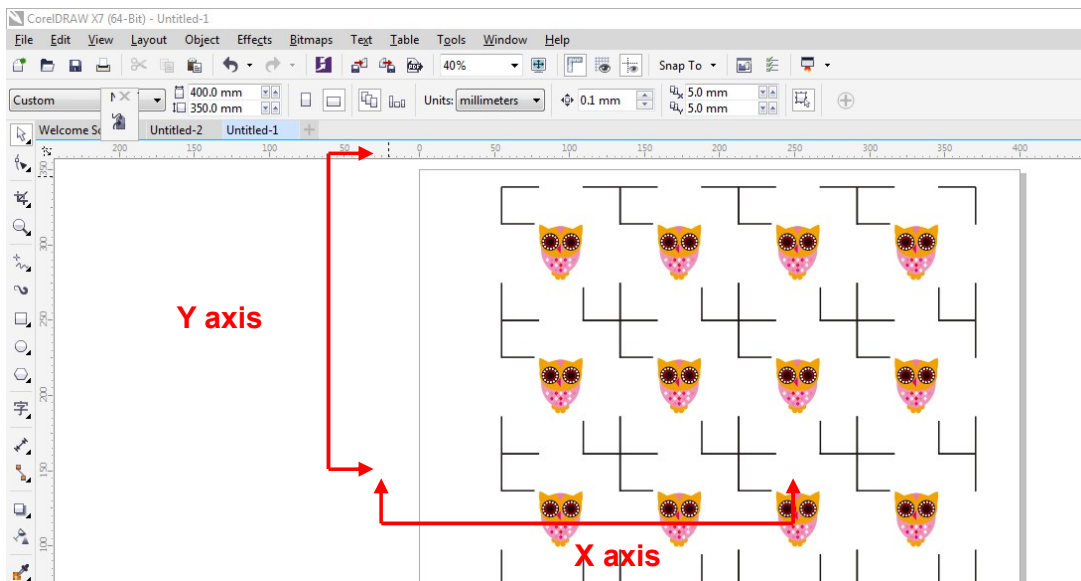


Figure A3-12

Contour cutting through CorelDraw

Step 1 Position the paper with registration marks printed by your printer on the GCC cutter.

Step 2 Select “Files→Print”.

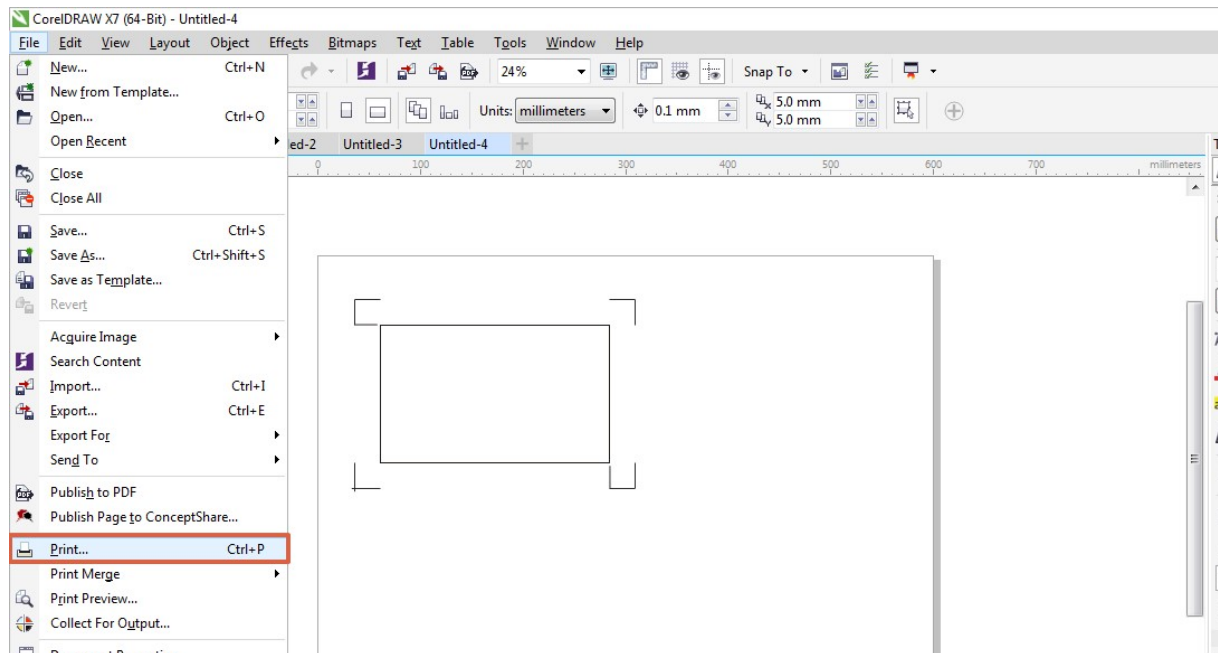


Figure A3-13

Note: if you use CorelDraw X5 and later, you must follow the steps below.

Step 1 Click the “color” page and go to the “Color conversions performed by:” and then select the model name of you cutter (please refer to Figure A3-14).

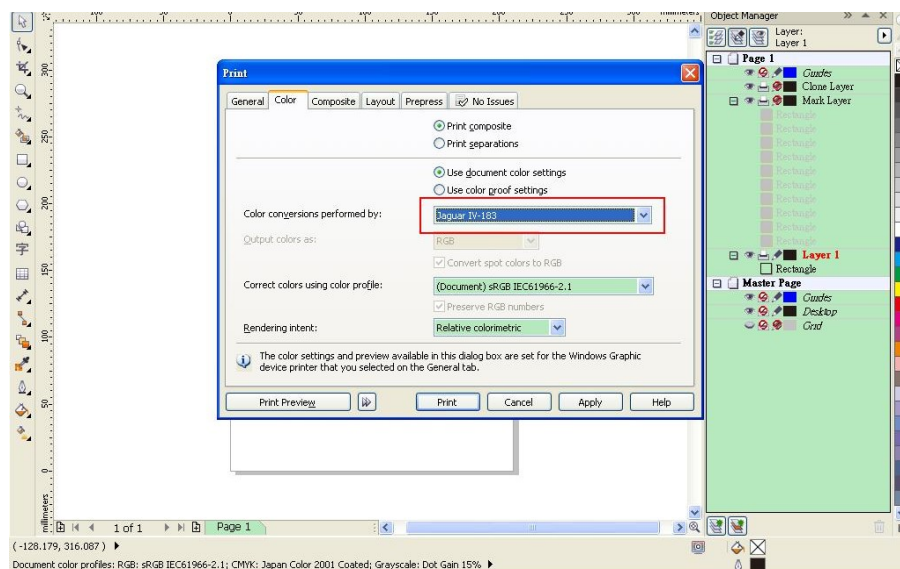


Figure A3-14

Step 2 Go to the “Layout” page and select Bottom left corner at “Reposition images to”.

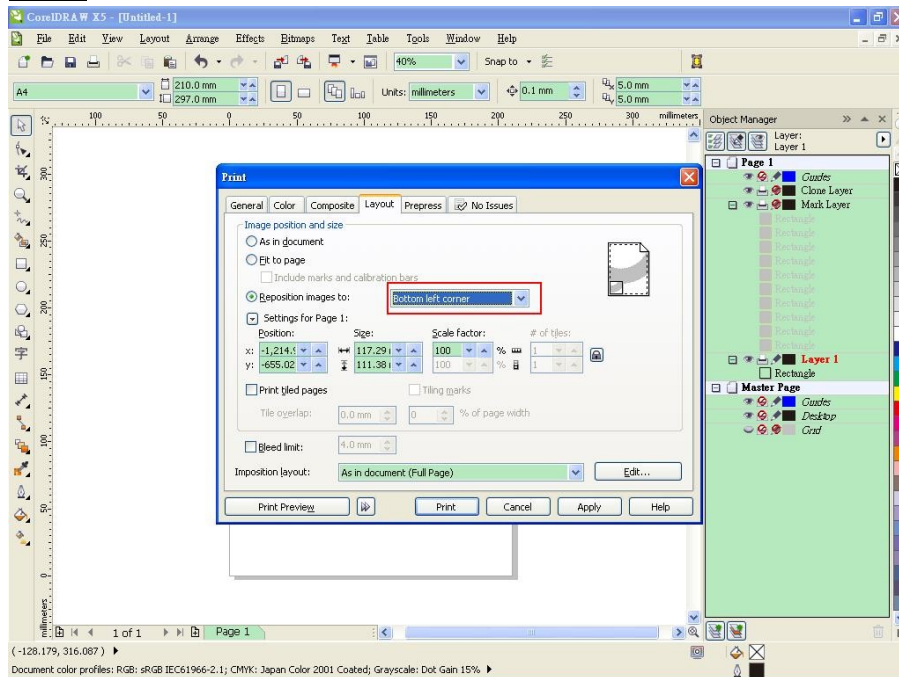


Figure A3-15

Step 3 Click “Print”.

Illustrator Plug-In Instruction

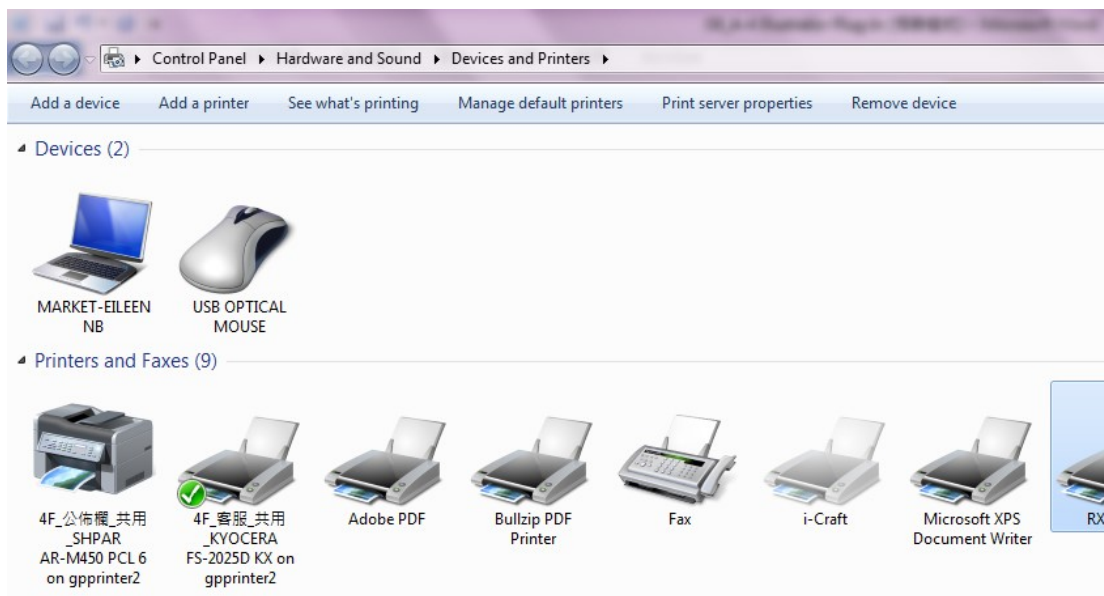
AASII VBA Installer is applicable for Adobe Illustrator Version CS4, CS5, CS6, CC.

Installation

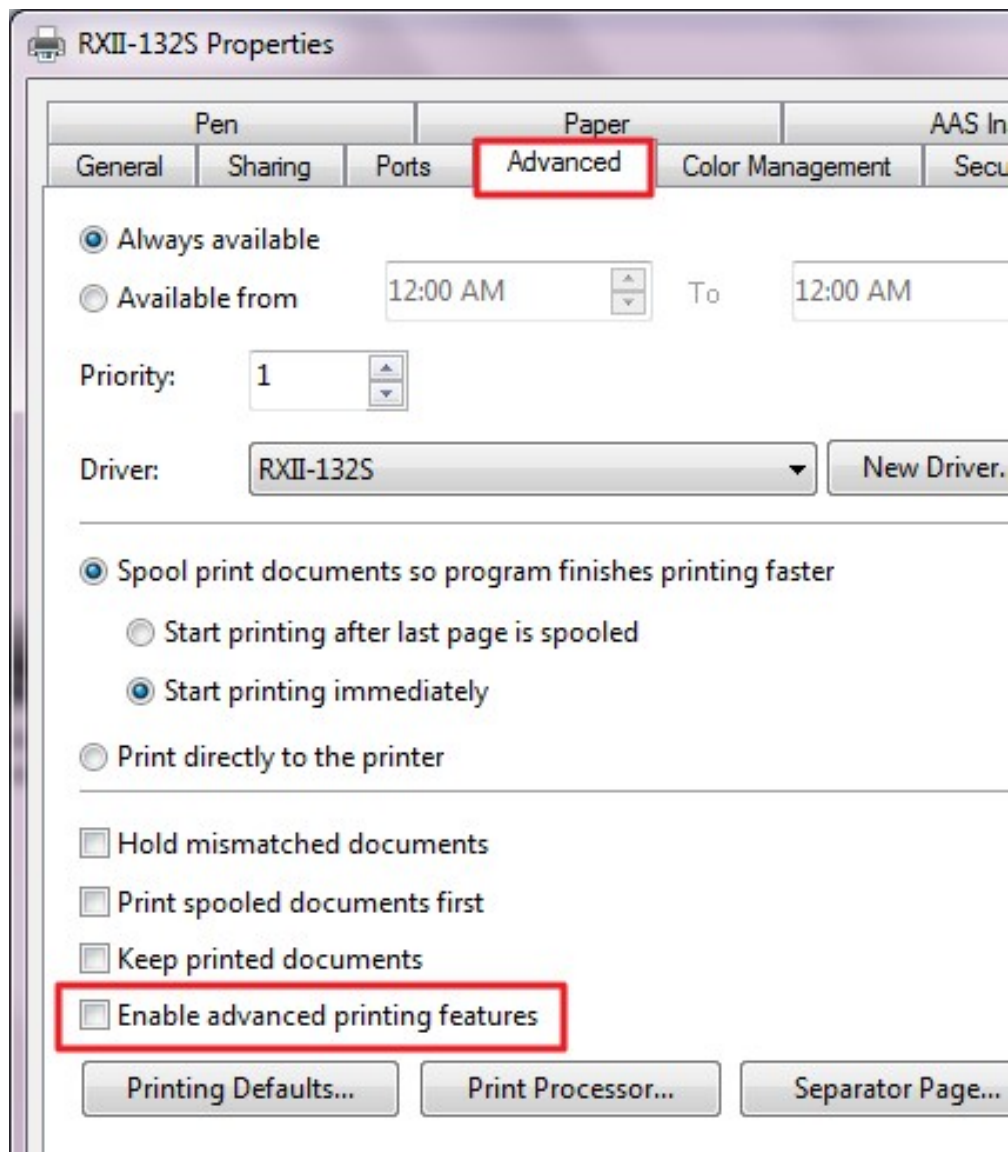
Please refer to Step 8 in Chapter 2.7.1.2 Driver Installation to install AAS plug-in for Adobe Illustrator.

Printer Setting

Step 1 Go to Control Panel, right click on the printer and select Printer Properties to open the Printer Properties page



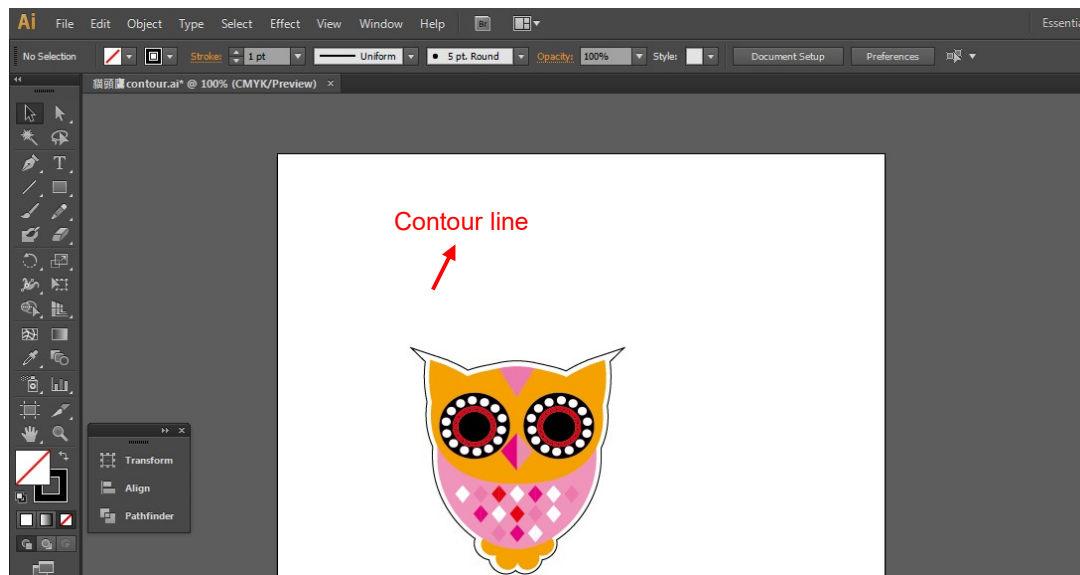
Step 2 Go to the Advanced page and make sure the “Enable advanced printing features” box is unchecked.



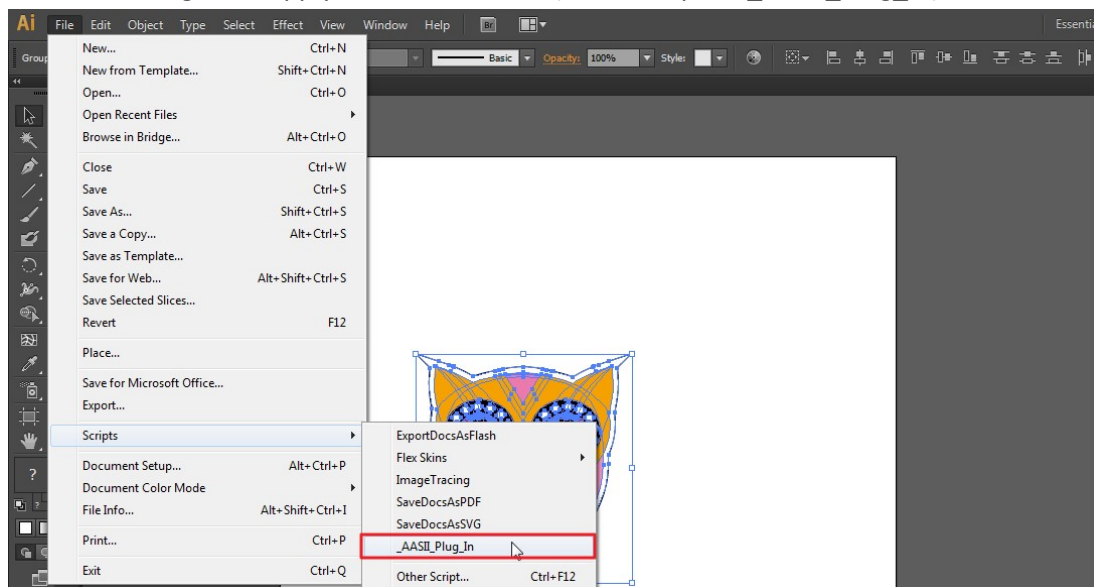
User Instructions

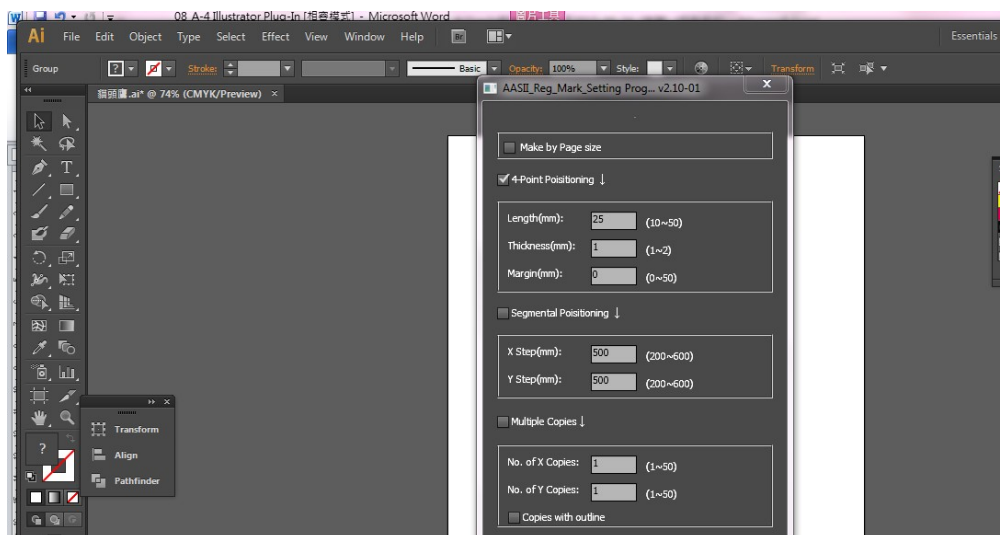
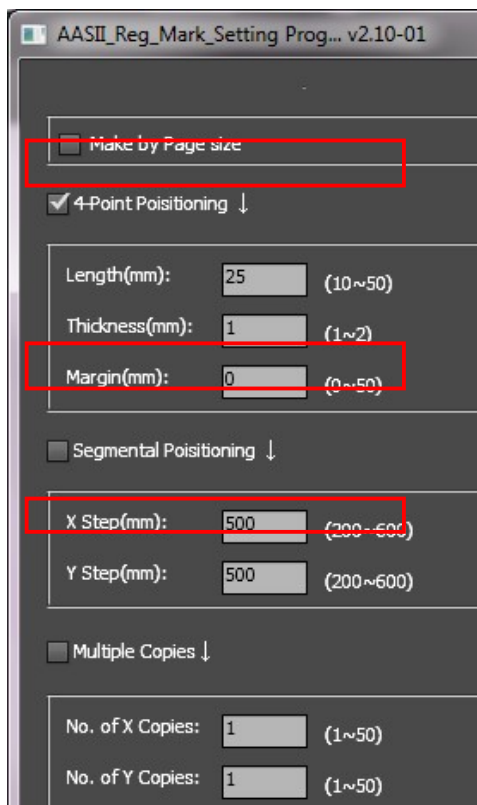
Step 1 Open Illustrator.

Step 2 Edit your image and create a contour line (**Note:** you must have the line width set as 0.001mm).



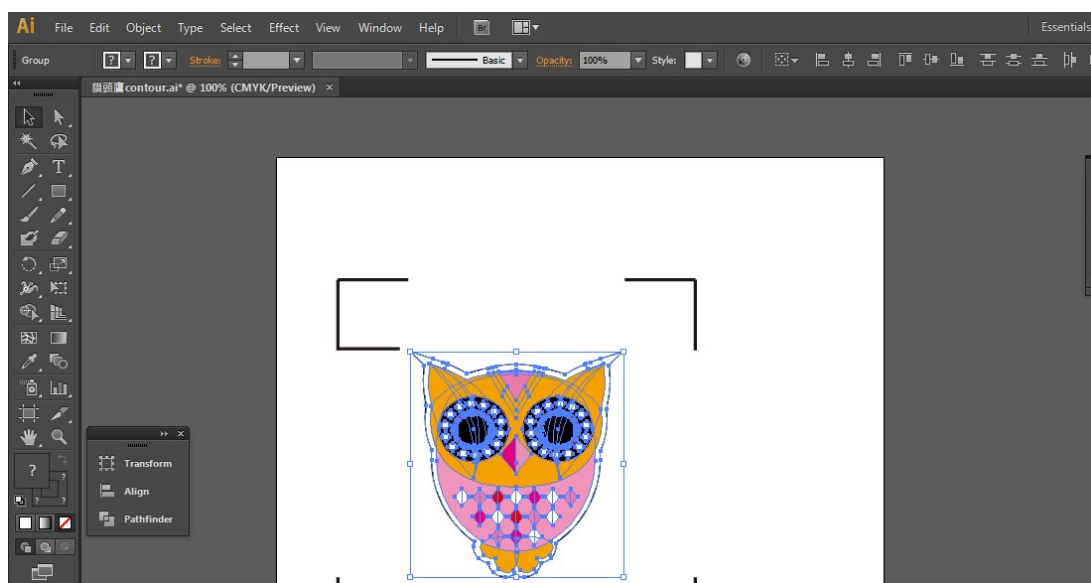
Step 3 Click on the image and apply the AAS function (File→Scripts→_AASII_Plug_In).



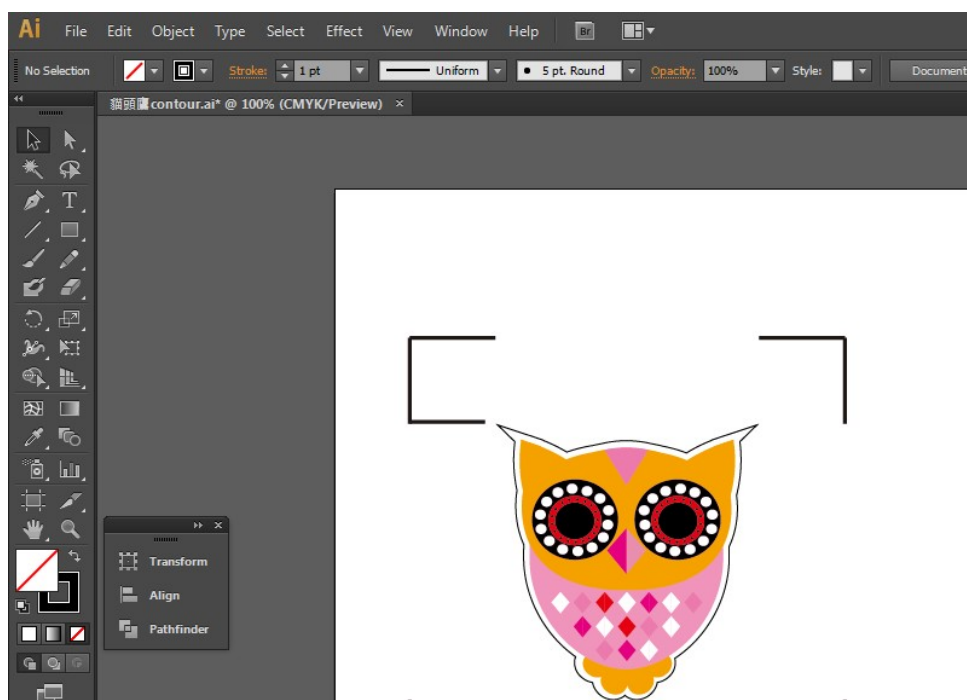
Step 4 Select the registration marks needed**Step 5** Three types of registration marks are introduced here: 4-Point Positioning, Segmental Positioning and Multiple Copies.**Note:**

The values entered in the “4-Point Positioning” section (length, thickness and margin) will still be applied when you tick “Segmental Positioning” or “Multiple Copies.”

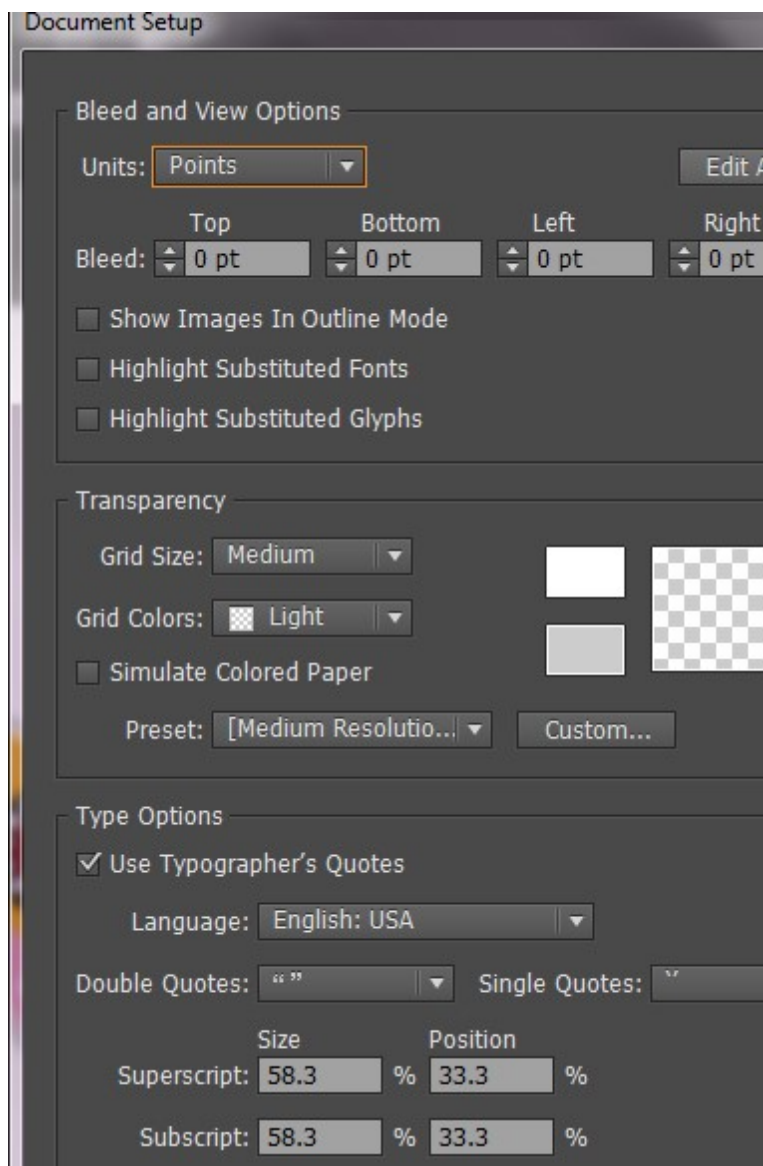
Step 6 Confirm the registration marks (the 4-Point Position mark is used as an illustration in the following steps).



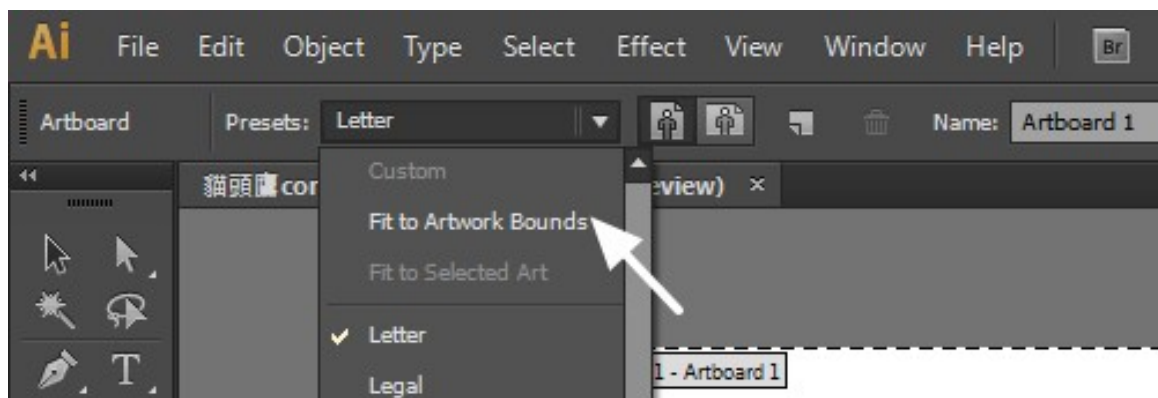
Step 7 Click on the blank area on the page and then click “Document Setup”.



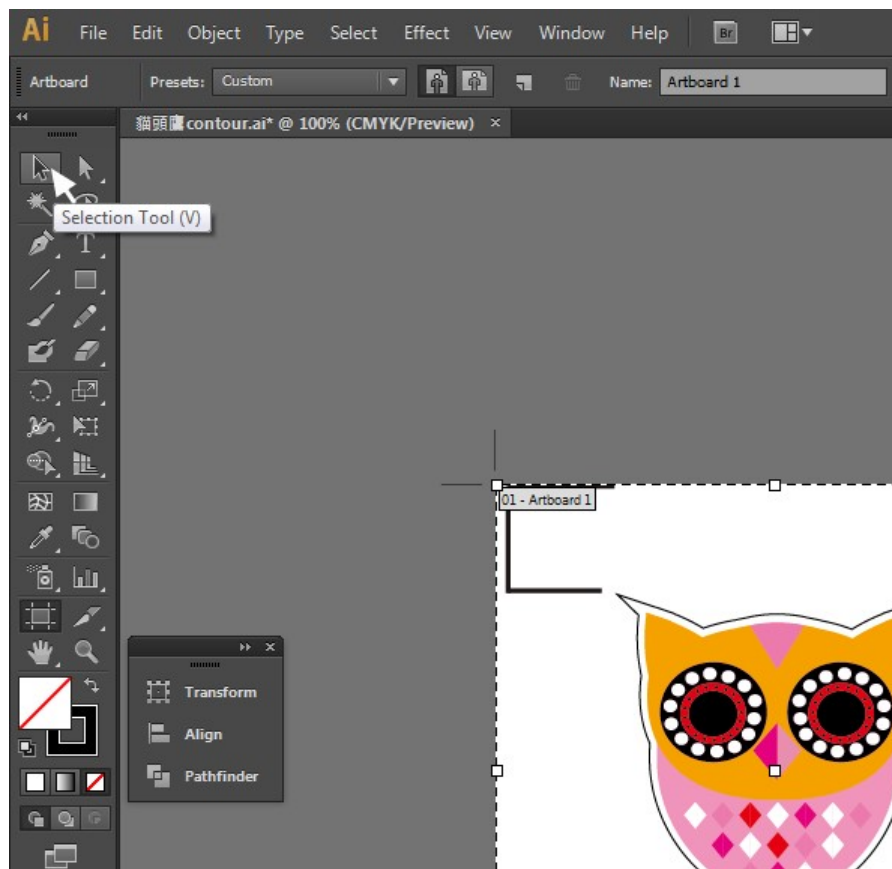
Step 8 Hit “Edit Artboards”.



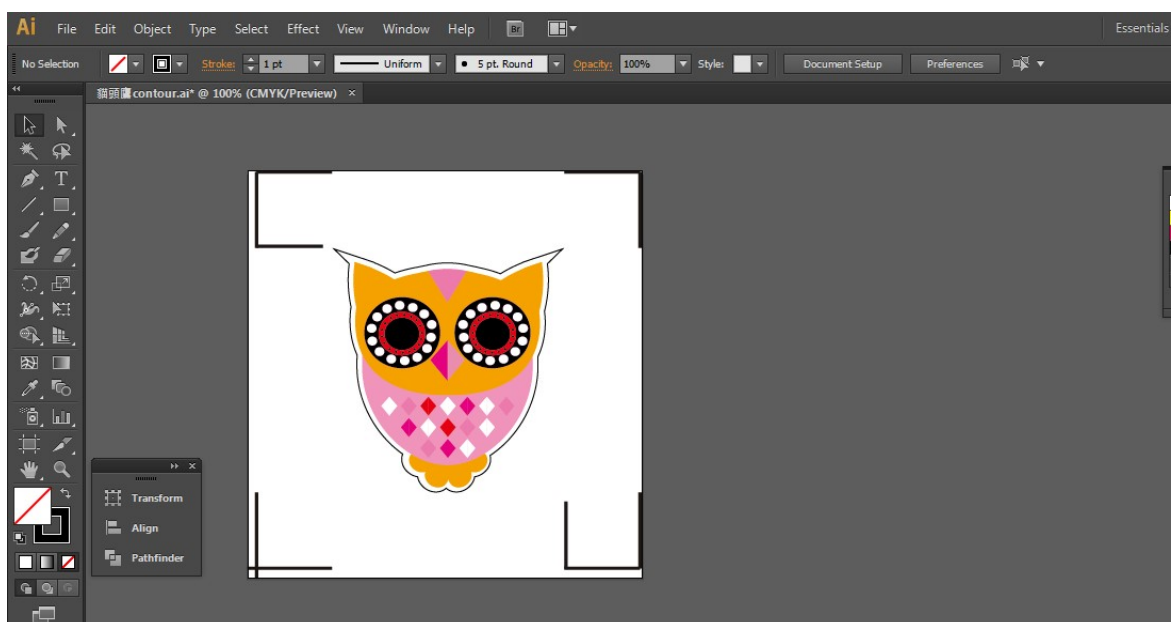
Step 9 Click on “Presets → Fit Artboard to Artwork bounds”.



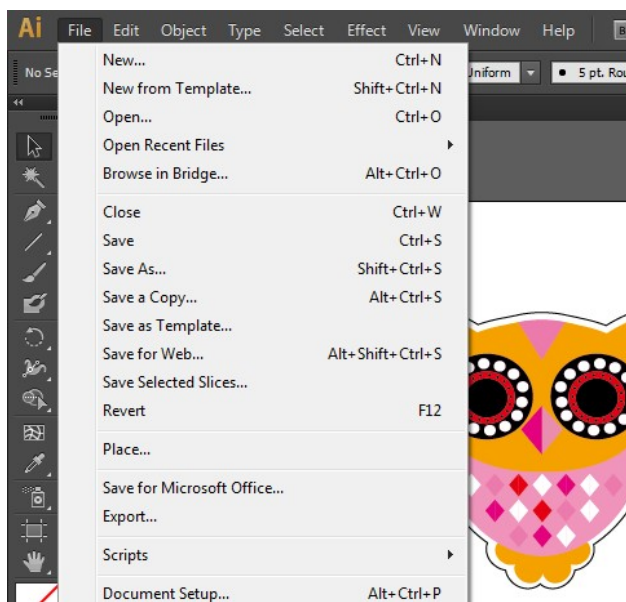
Step 10 Please move your mouse to the tool bar on the left when step 9 is finished and then click “Selection Tool”.



Step 11 This will take you back to the edit mode.

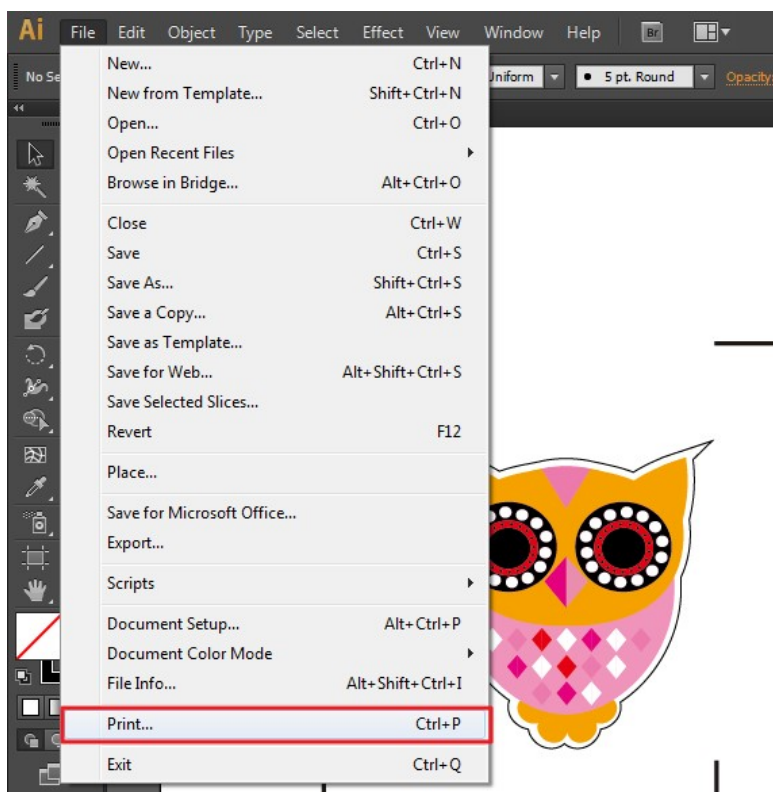


Step 12 Print out the file with the contour line and the registration marks.

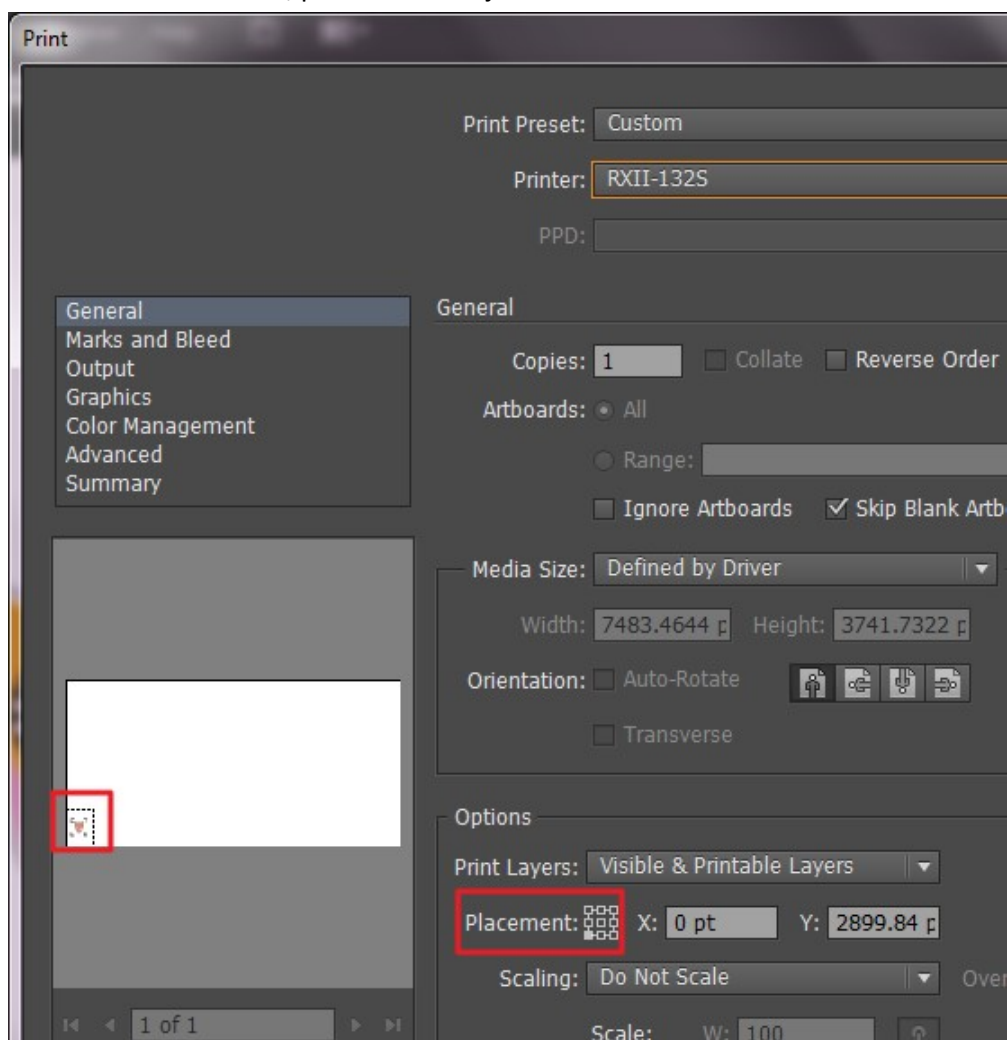


Step 13 Place the printed file on the cutter, lower the pinch rollers and then position the carriage at the origin of the registration marks.

Step 14 Send the file to the cutter.



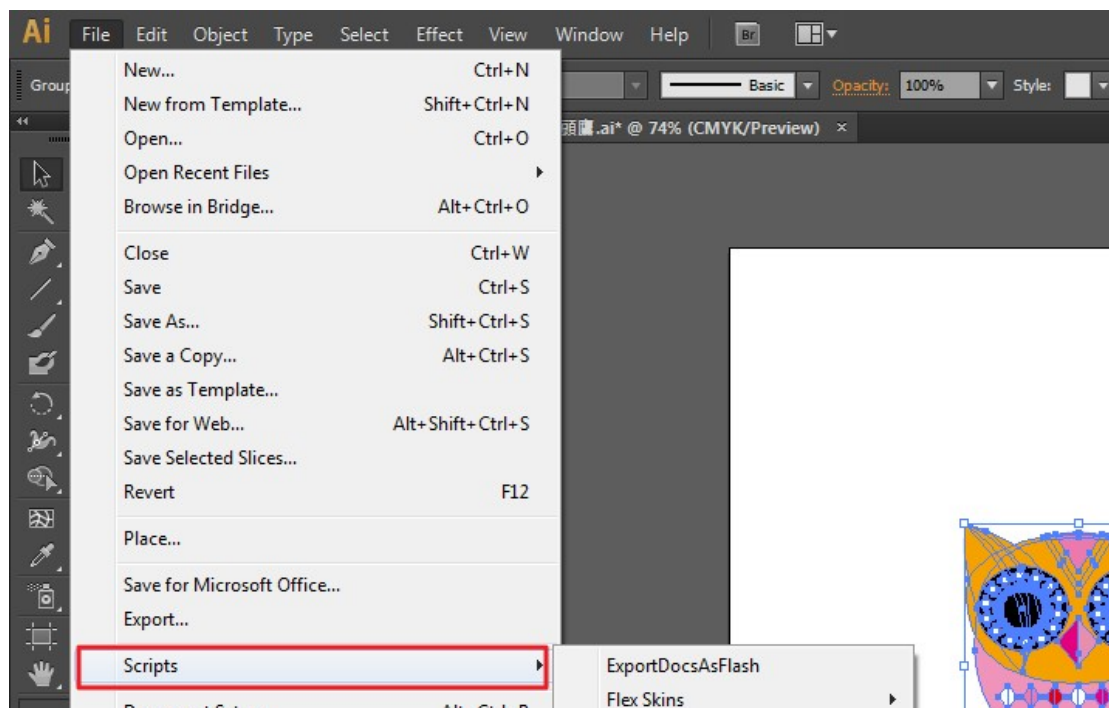
Step 15 Select the cutter model, position the object in the bottom left corner.



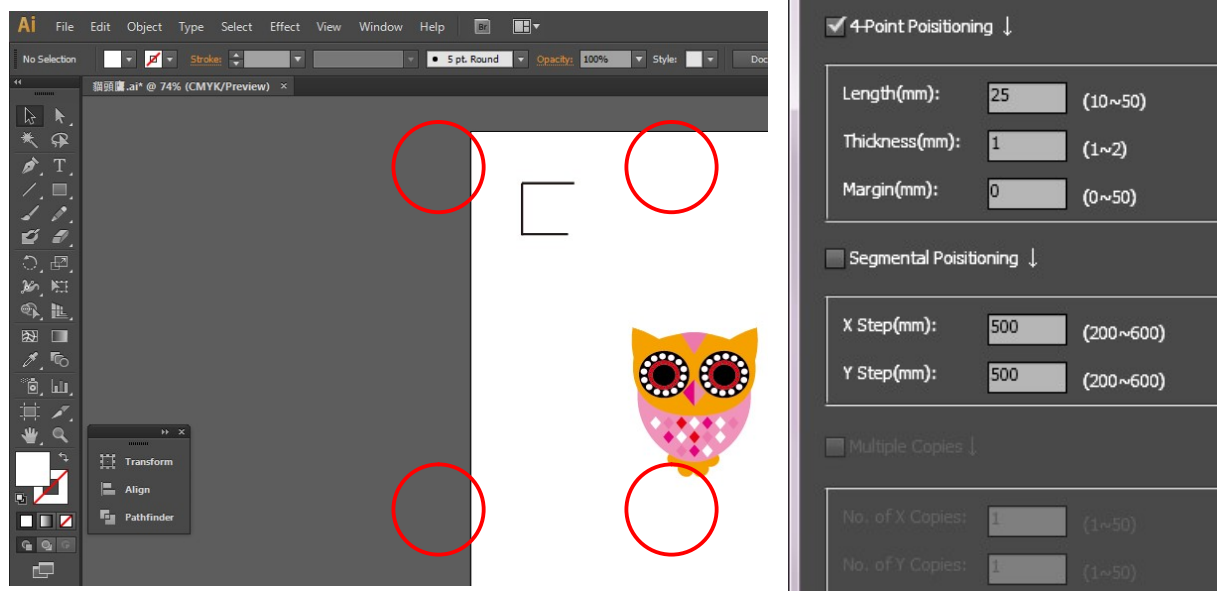
Step 16 Your job is now completed.

Add Registration Mark by page size

If you want to create registration mark by page size, select the object, go to “Scripts” under “File” and select “_AASII_Plug_In”



Tick “Make by page size” and click “Apply” and the registration mark will be created on the 4 corners of the page automatically, shown as below.



Note:

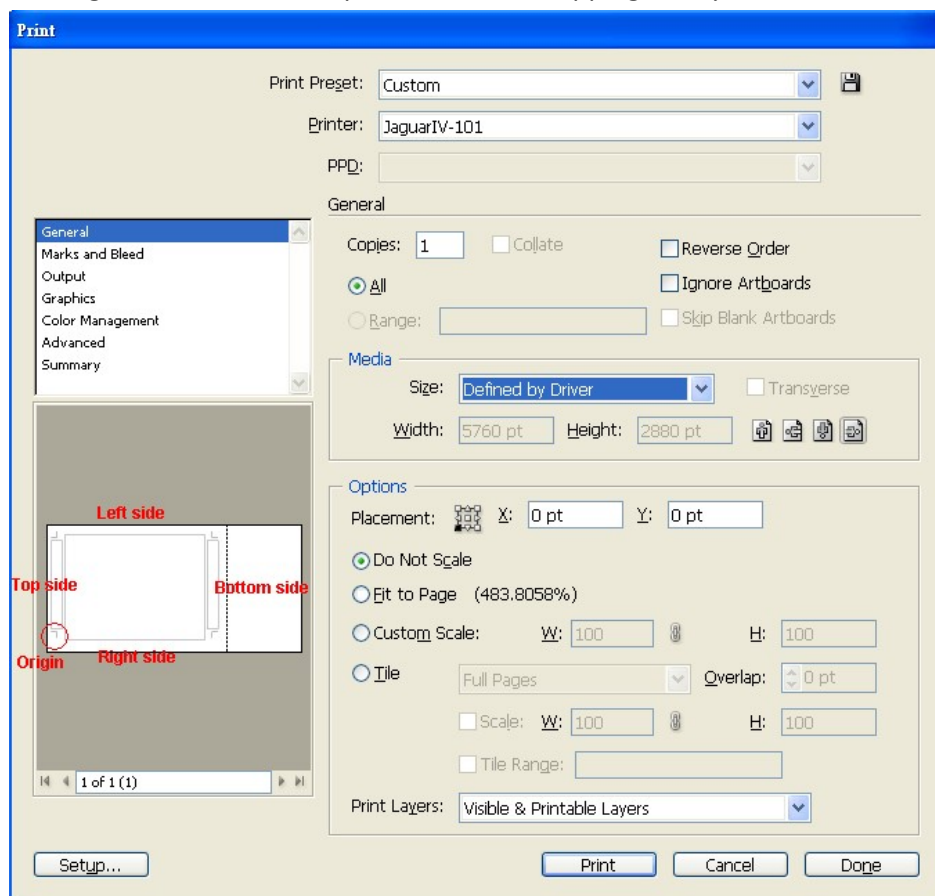
The length setting will be in the range of 10-50mm according to your page size.

Workable area

It allows users to edit and cut graphics in the area outside the registration marks when adding registration marks by page.

For A4 size media sheet, the workable area is 2.5mm extended from the registration mark on left and right sides and 4.5mm extended from the registration mark on top side. On the bottom side, it is suggested to leave at least 25mm margin from the edge of media sheet to prevent sheets dropping or any error occurred while media sizing.

For A3 size media sheet, the workable area is 10mm extended from the registration mark on the left side, 9mm extended from the registration mark on the right side and 11mm extended from the registration mark on top side. On the bottom side, it is suggested to leave at least 25mm margin from the edge of media sheet to prevent sheets dropping or any error occurred while media sizing.

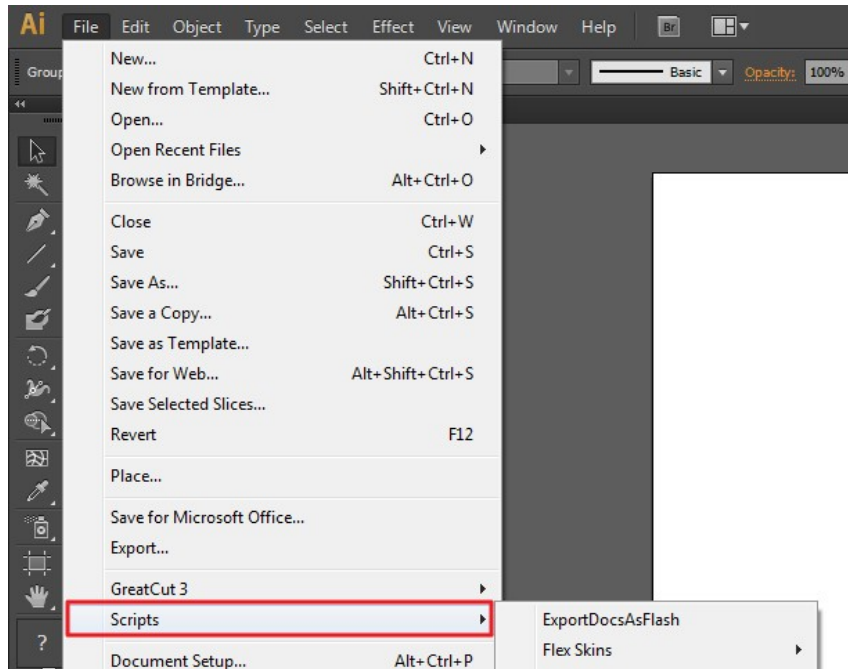


Note: Select “Edge” mode when media sizing to allow the media sheet to be unrolled. If you select “Single” mode, the media sheet will not be able to be moved back and hence fail to be detected by front paper sensor.

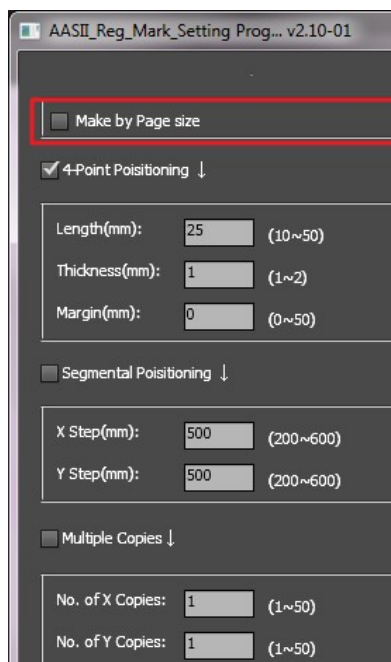
Add Registration Mark by Object

If you add registration mark by Object, you will be offered three options of registration marks.

Firstly, select the graphic which you want to add registration mark on and go to “Scripts” under “File” and select “_AASII_Plug_In”.

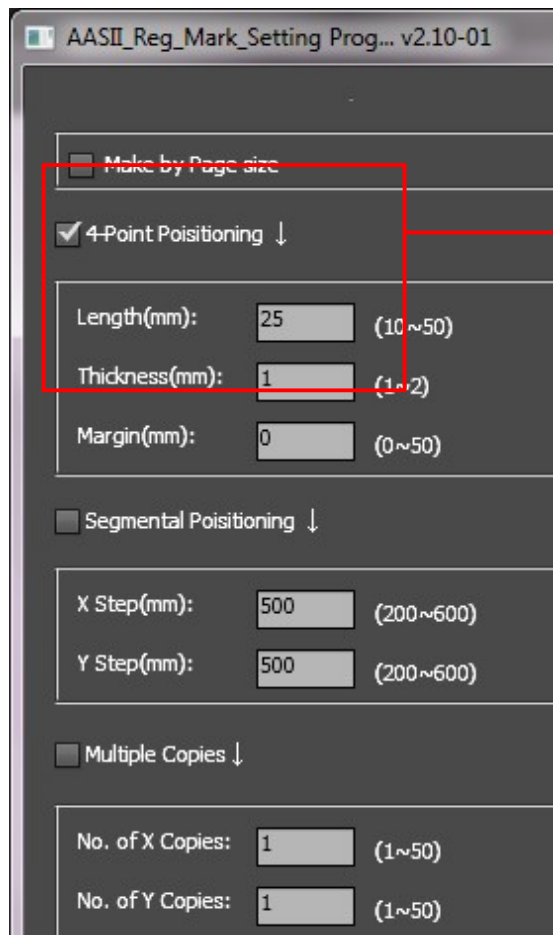


Make sure to untick “Make by page size” and choose one of the registration mark types whichever is suitable.



Three types of registration marks

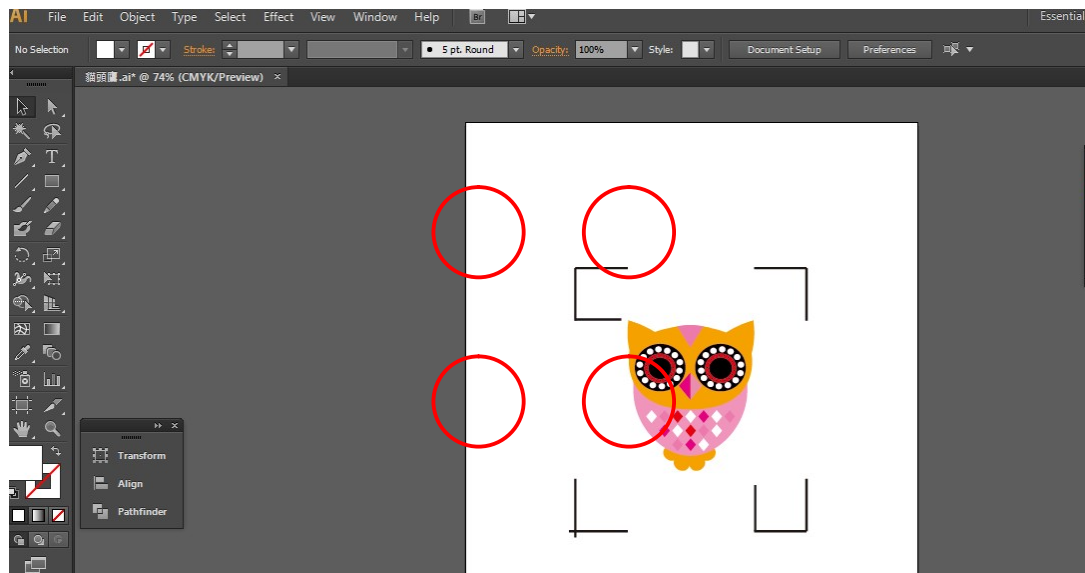
4-Point Positioning



4-Point Positioning

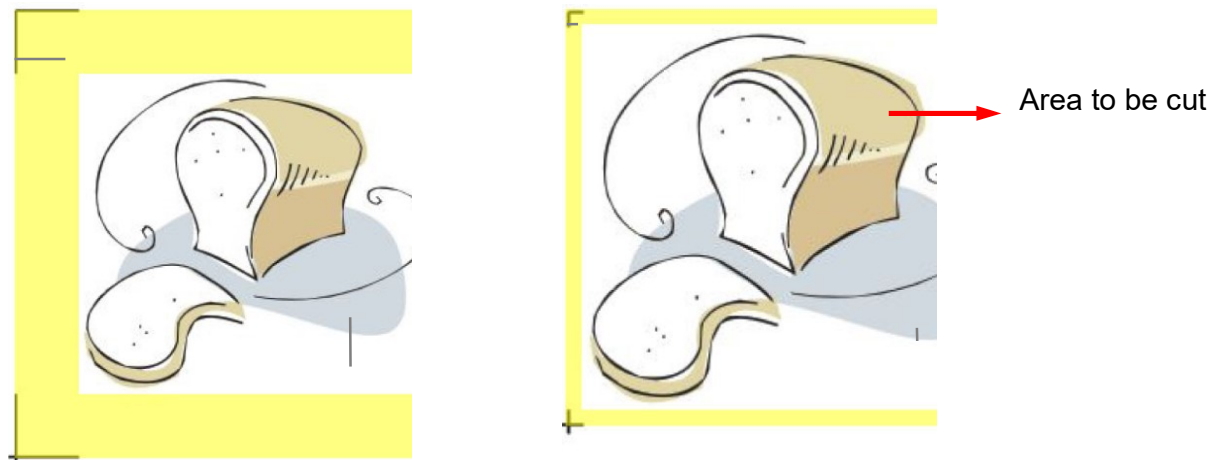
- Length: The length of marks
→ Range: 5mm~50mm
→ Optimized Setting: 25mm
- Thickness: The line thickness of marks
→ Range: 1mm~2mm
→ Optimized Setting: 1mm
- Margin: The distance between marks and images
→ Range: 0mm~50mm
→ Optimized Setting: 5mm

The system will create the 4 marks as shown in the picture below.



Note:

1. To save your materials, in addition to amending object margins, you can also adjust the length of the registration marks (5mm minimum) when you apply 4-Point Positioning (see table 1 for suggestions based on different material sizes). The smaller the size is, the smaller the distance between the object and the registration marks is (see the figures below).



Page size (unit: mm)	Suggested mark length (unit: mm)
A6 (105 × 148)	5
A5 (148 × 210)	8
A4 (210 × 297)	11
A3 (297 × 420)	16
A2 (420 × 594)	23
A1 (594 × 841) and above	25*

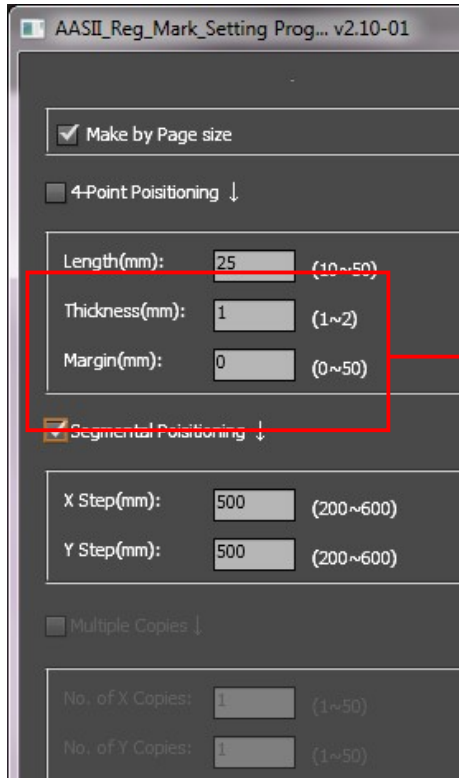
Table 1

*25mm is the suggested value for the registration mark length

2. The size of the registration marks would affect the accuracy of registration mark detection so please make sure the amount you enter is reasonable.
3. If you change the paper size, you will have to reset the registration marks otherwise the previous setting will be applied.

Segmental Positioning

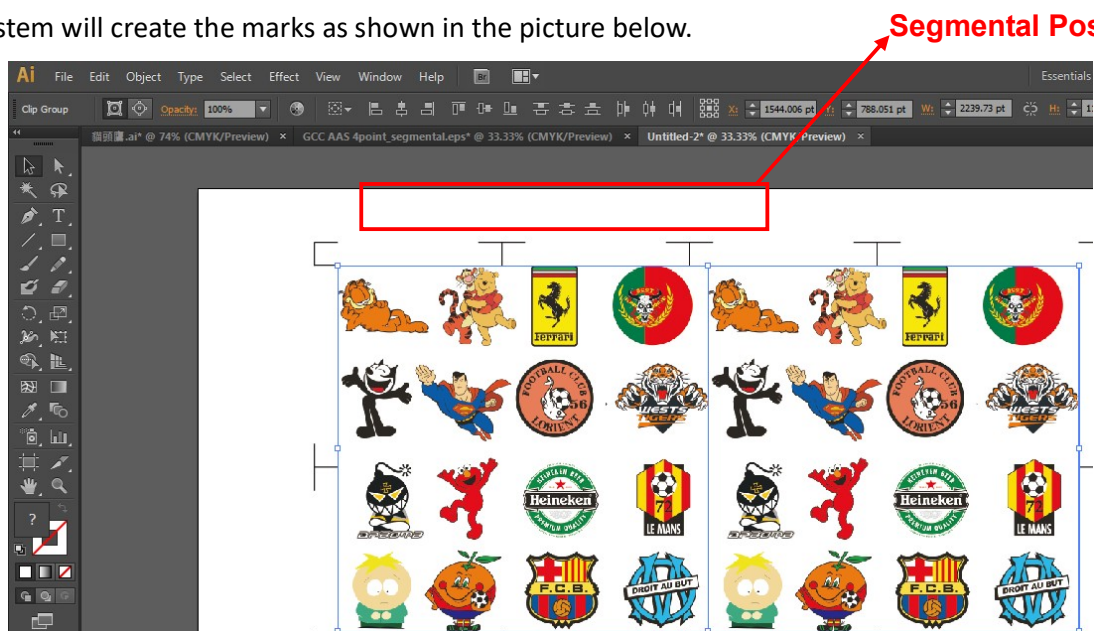
For precise cutting quality, it is suggested to select “Segmental Positioning” when you are working on an extra long or large-sized image to increase cutting accuracy.



Segmental Positioning

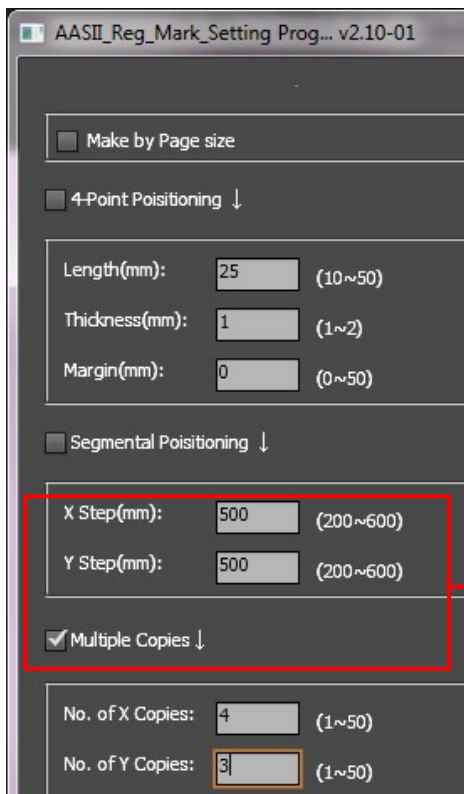
- X Step: The distance of intermediate position on the X axis
- Y Step: The distance of intermediate position on the Y axis
→ Range: 200mm~600mm
→ Optimized Setting: Less than 500mm

The system will create the marks as shown in the picture below.



Multiple Copies

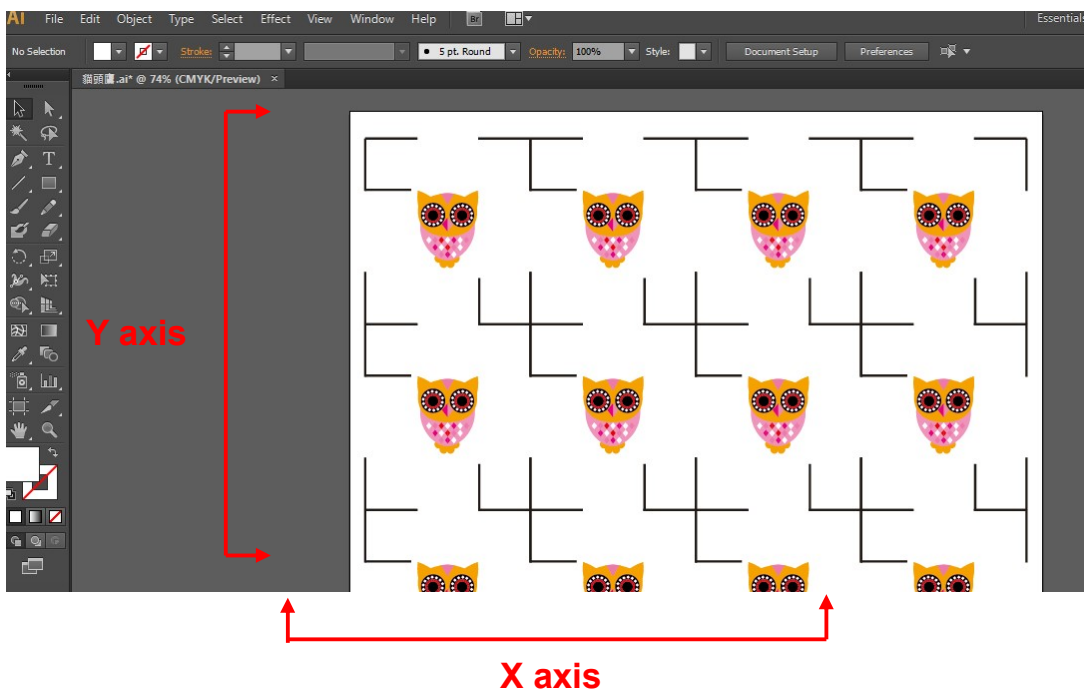
It is suggested to select “Multiple Copies” when you would like to make several copies of one image on your material to increase cutting accuracy.



Multiple Copies

- No. of X Copies: The numbers of copies on X axis
- No. of Y Copies: The numbers of copies on Y axis
→ Range: 1~50. (The more copies you make, the more time is needed for data transmission.)
→ Numbers of X Copies * Numbers of Y Copies = The total amount of image copies
- Copies with outline : To show outlines of image graphics
- Margin: Space between marks; must be 0 or ≥ 20 , no negative numbers allowed

The system will create the as shown in the picture below.

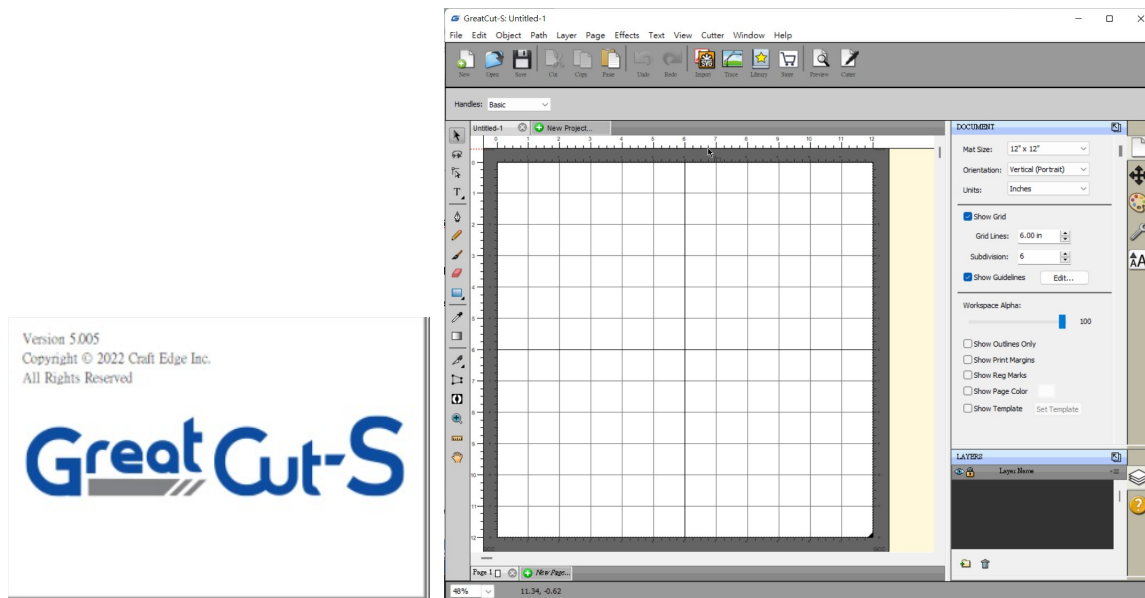


GreatCut-S Quick Manual

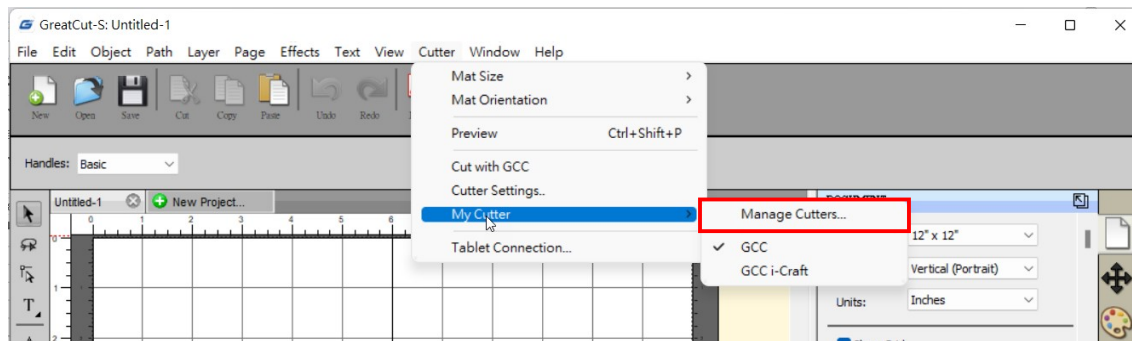
There are basic instructions of GreatCut-S below. If you need detailed instruction, please refer to GreatCut-S Help.

A. Select the cutter you want to output and change the work area.

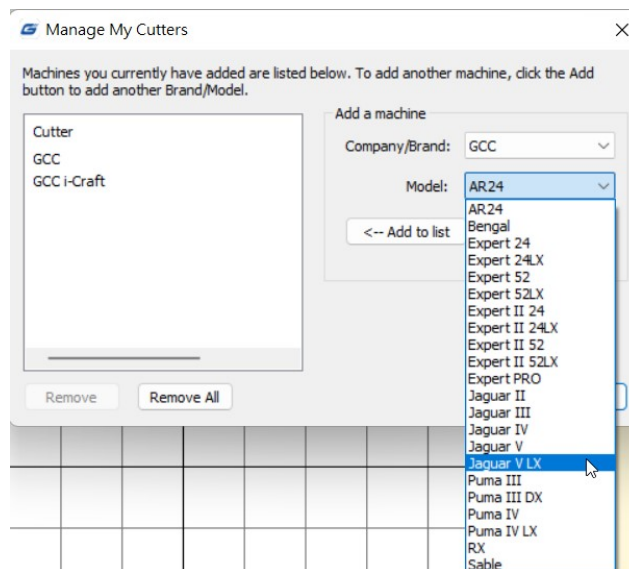
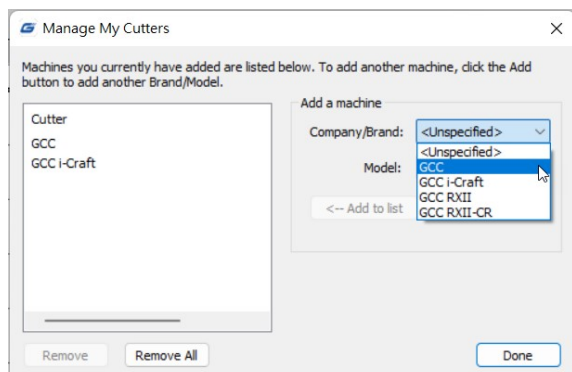
1. Run GreatCut-S software.



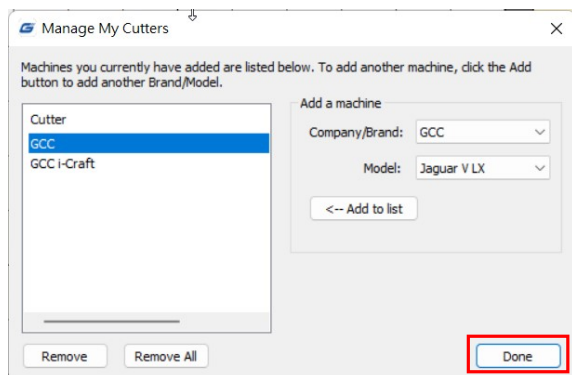
2. Select "Cutter" and select "Manage Cutters" under My Cutter to change the work area.



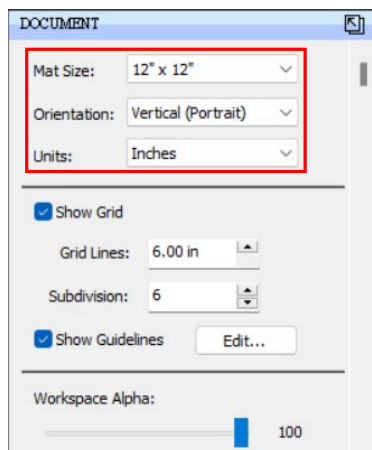
3. Select company / brand as GCC and select model you want to output and then click the “<--Add to list” button.



4. Select GCC on the left and click “Done.”

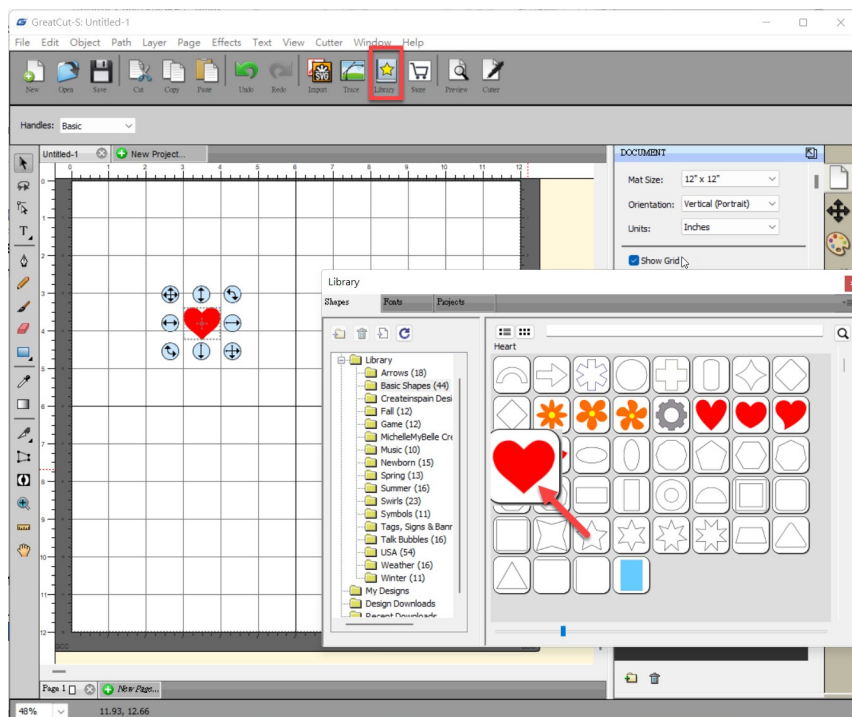


5. If you want to change the material size and orientation, you can fill a proper value in the Document window.



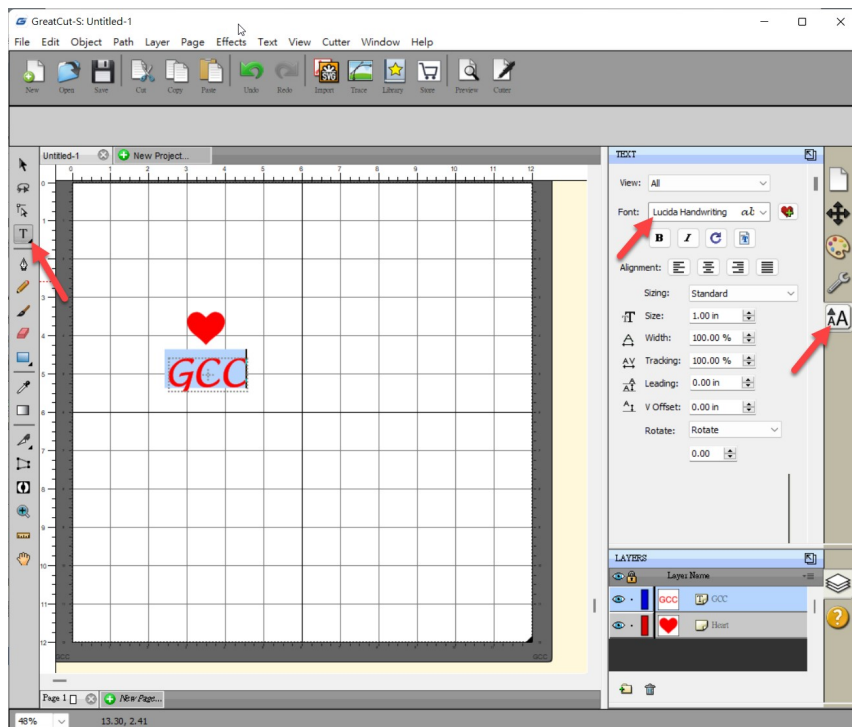
B. Insert Graphics from Library

Select graphics from library to insert a selected design.



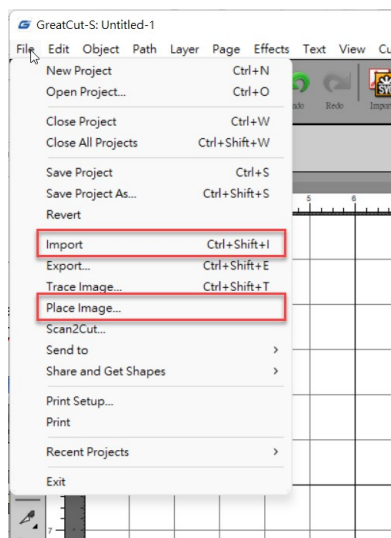
C. Draw Text

Click on the T icon at left side to create the text and select the font you like at text window.



D. Import Design

If you have created your design in other design software, go to “import” or “place image” under file to import it, GreatCut-S supports svg, scut, scal, pdf, ai, wpc eps, bmp, gif, jpg and png files.

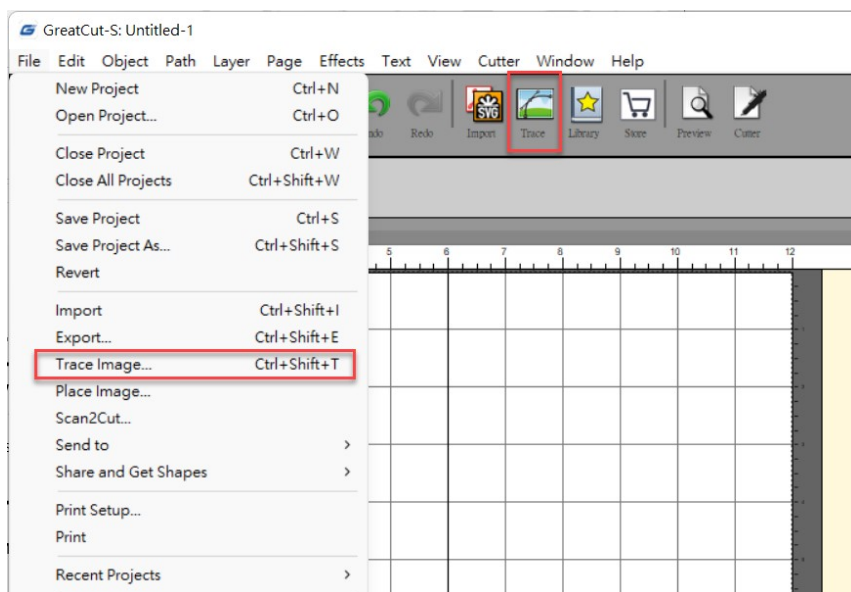


Tips Thousands of SVG files available on SVGcuts!

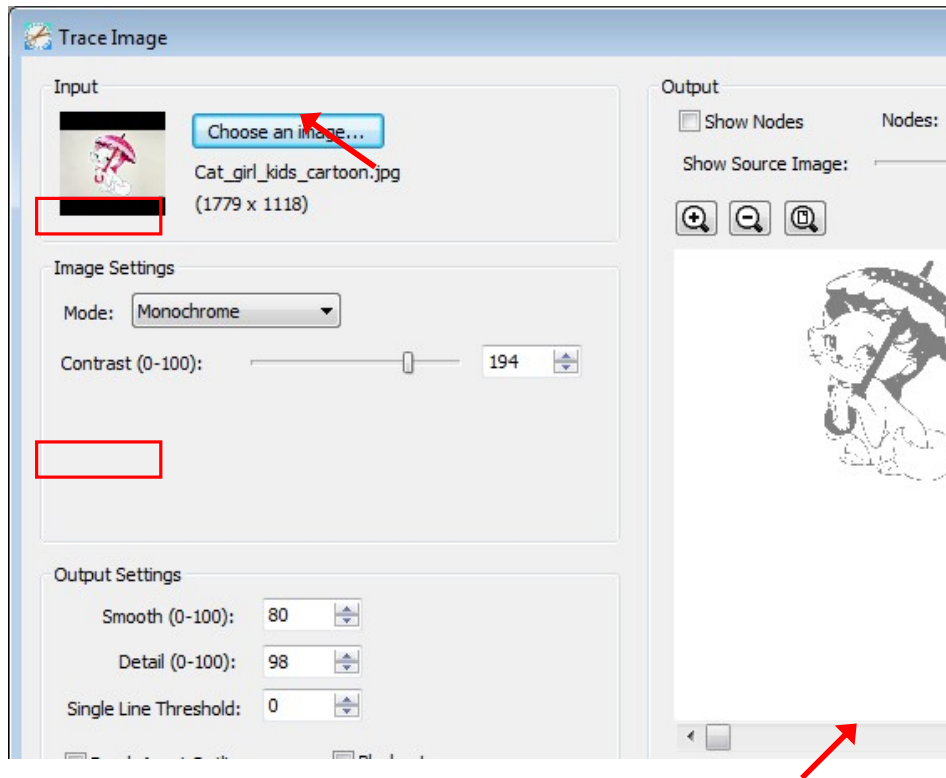
- ✓ <http://SVGCuts.com> is the top of source for designer SVG files. Thousands of high quality elements including: shapes for card-making, scrapbooking, as well as gift bags, boxes and 3D flowers.

E. Convert Image to Cutting File

1. Go to Trace Image under File, or select Trace Image icon on the toolbar to open the setting window.



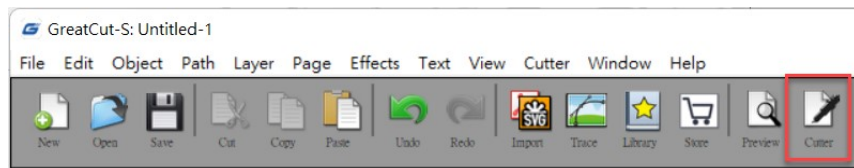
2. Click on “Choose an image” to input the image, adjust Image Settings and Output Settings, and click OK. Then the outline of the image will be outputted automatically.

**Note**

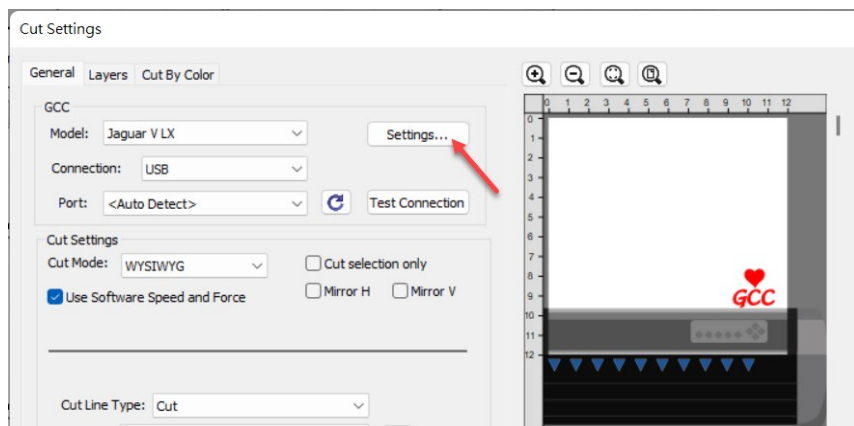
- ✓ The **contrast** and **pixels** of import images will affect the trace image result. High contract graphics are recommended.

F. Cut the Design

1. Click on the “Cutter” button on the toolbar and Cut Settings window will pop up.



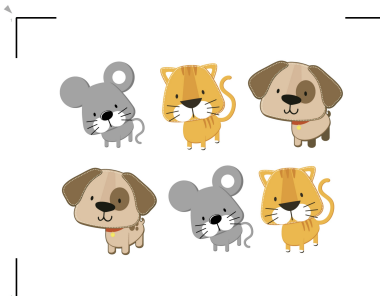
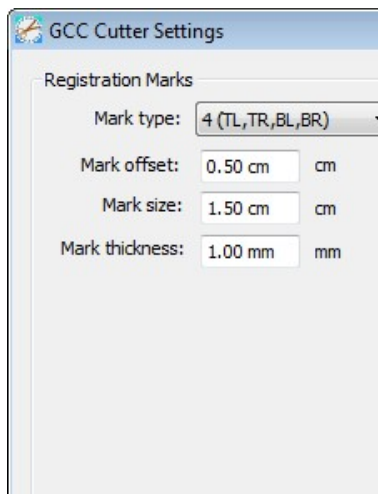
2. Click on “Settings...” to open GCC Cutter Settings window.



Note

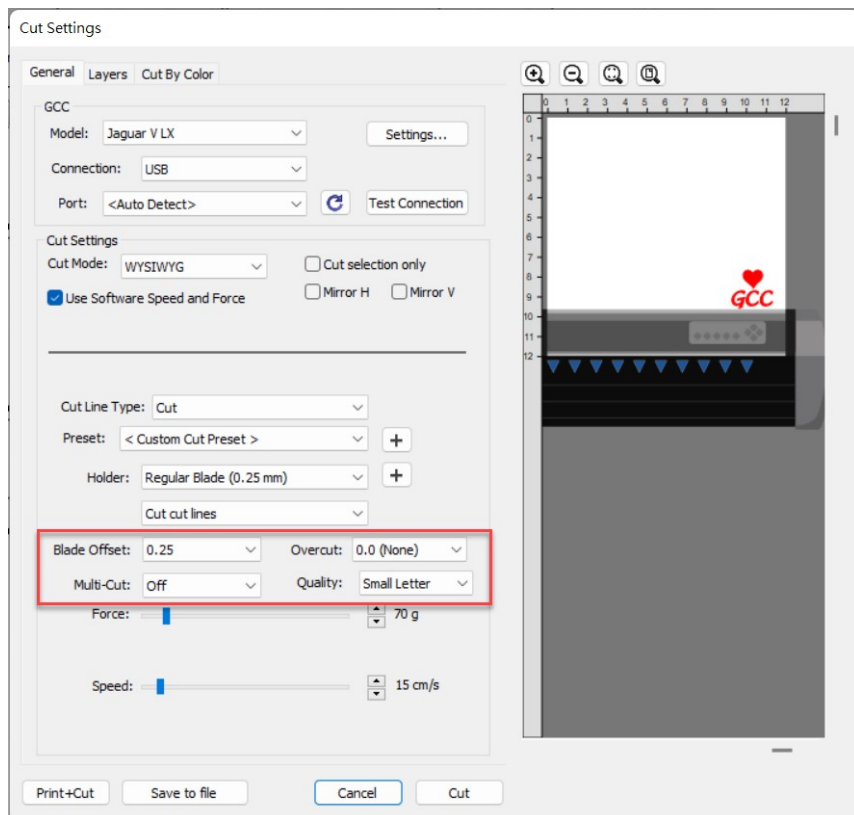
- ✓ The origin point is on the bottom right.

3. Adjust Registration Marks setting under GCC Cutter Settings window if needed.



***Registration Marks:** set the distance between the edge of the material and the registration marks in Mark Offset; set the size of marks in Mark Size; set the line thickness of marks in Mark Thickness.

4. Adjust Blade Offset, Overcut Value, Multi-Cut and Quality under Cut Settings window if needed.

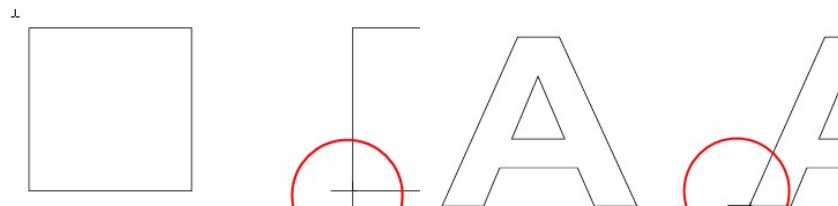


***Blade Offset:** set the offset value according to different blade, for a standard blade, set the offset value at 0.25mm, 0.5mm for an optional advanced blade and 0mm for an optional plotting pen.

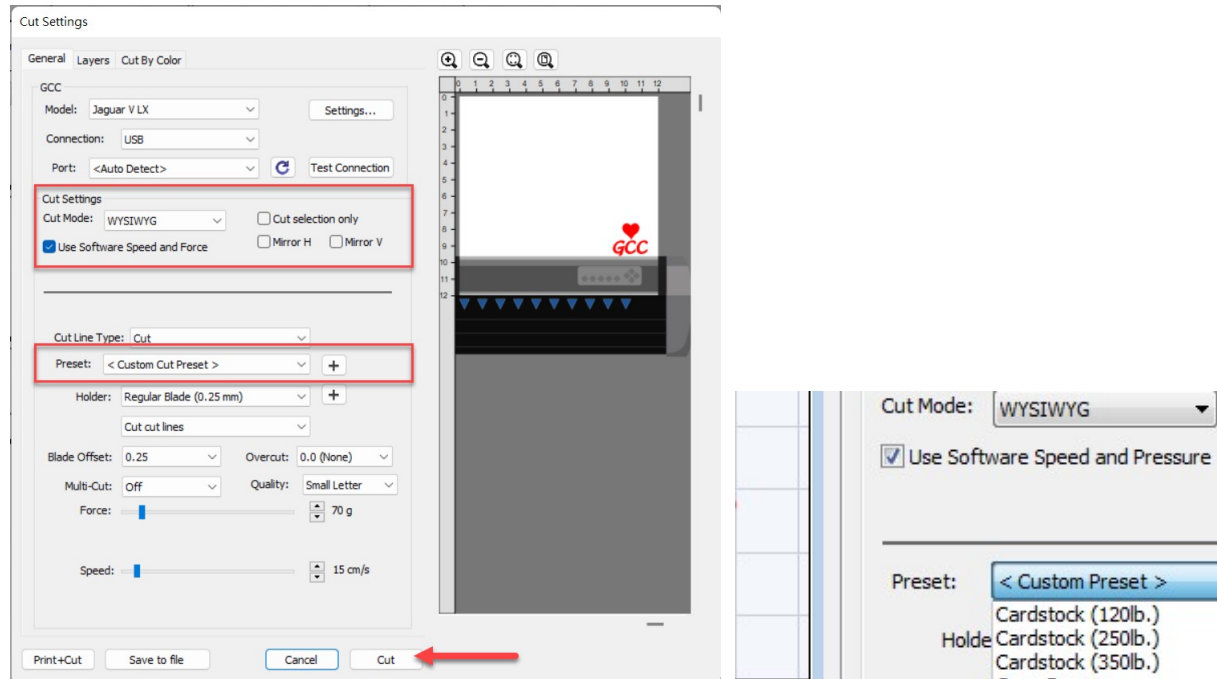
***Quality:** associated with the cutting result; please note the better cutting quality, the slower cutting speed.

***Multi-Cut:** to repeat the cutting job at same position which is suitable for cutting thick material.

***Overcut:** allows for easier weeding and makes up for incomplete cut lines.



- Under “Cut Settings” section, there are some useful functions. After setting the parameters, click on “Cut” to send the data to the GCC cutter and the GCC cutter will start the cutting job.



***Cut Mode:** there are “WSIWYG” and “Origin Point” options, WSIWYG means what you see is what you get, the cutter will output the graphic at same position in preview window. While with Origin Point mode, the cutter will cut the graphic from bottom right origin point of the material.

***Use Software Speed and Pressure:** tick this section, and you can set the values of speed and pressure manually.

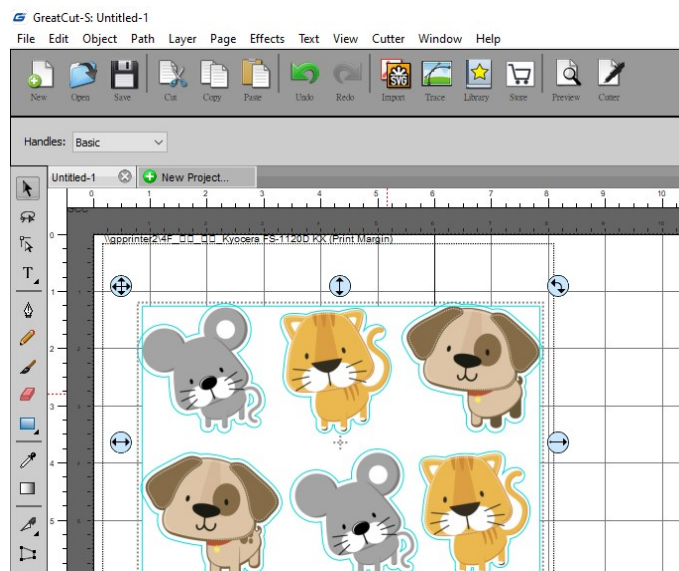
***Preset:** select a proper material to apply the preset speed and pressure parameter automatically.

***Speed & Pressure:** you may adjust values of speed and pressure manually to get quality results.

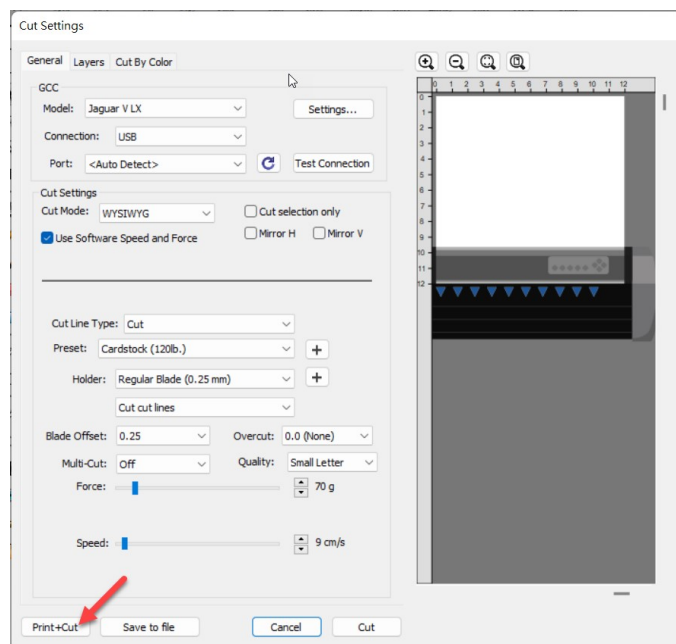
G. Print and Cut Your Design

The Print and Cut function allows you to print the graphics from GreatCut-S to printer, and then put the printed materials on the GCC cutter to cut out the contour of printed jobs from GreatCut-S.

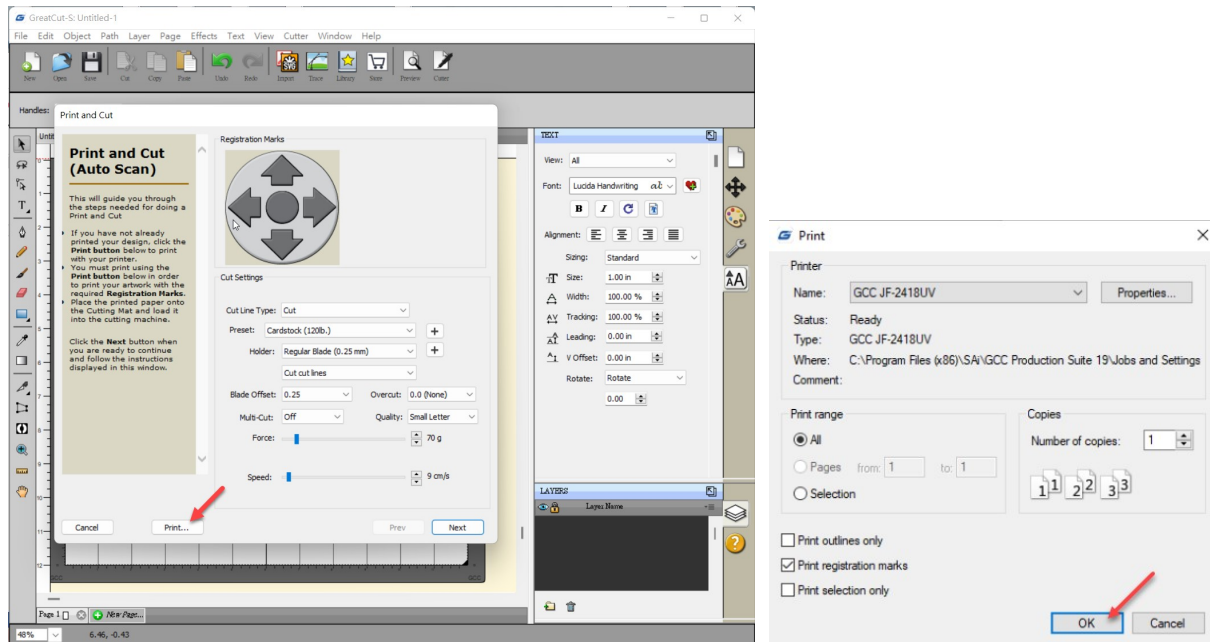
1. Open an image file in GreatCut-S.



2. Click on the Cutter icon on the toolbar, set the parameters and click on “Print+Cut” to add the registration marks and print out the image.



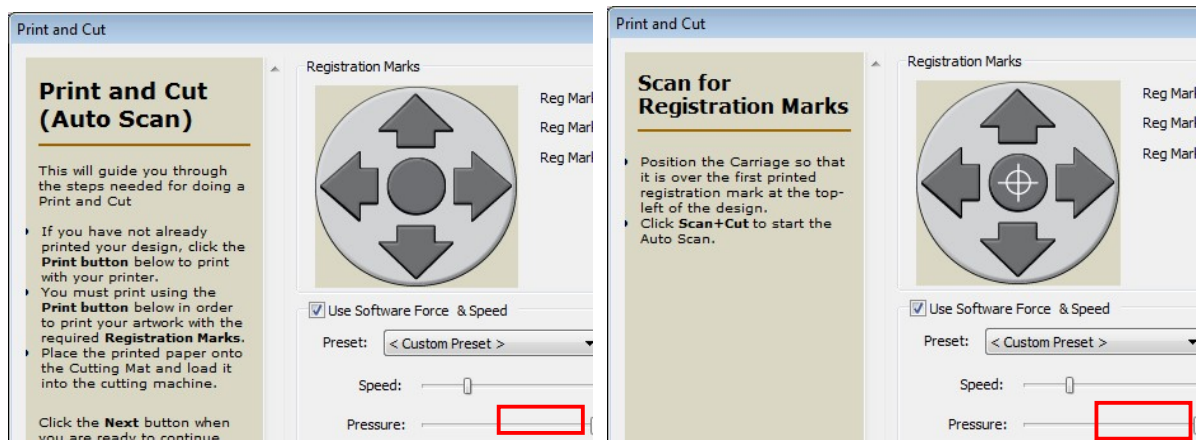
3. Click on “Print...” to open printer setting window and click OK.



4. Print your design with registration marks out.

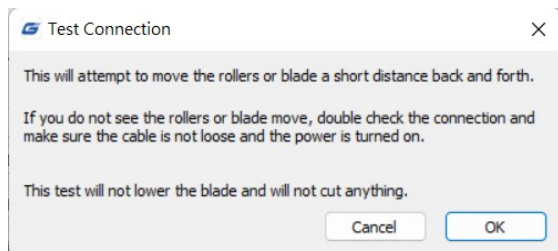
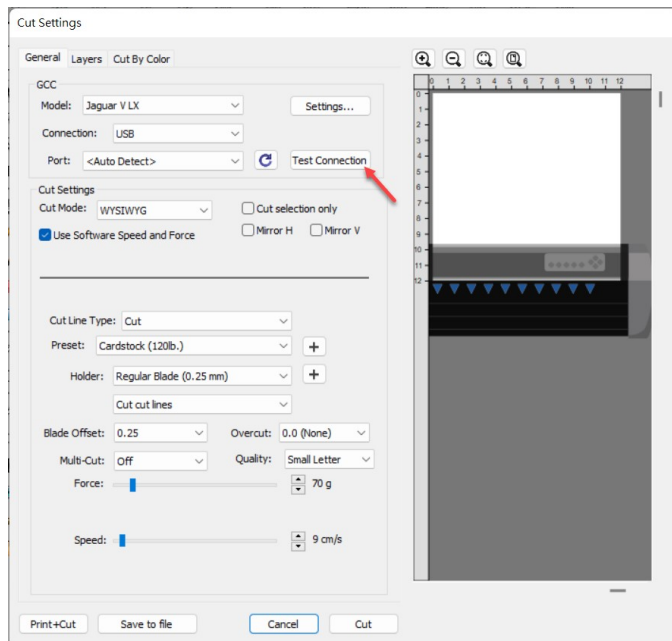


5. Load the printed media to the GCC cutter.
6. Press “Next” and then press “Scan+Cut”, and then the GCC cutter will detect the registration marks and cut the contour lines automatically.



Tips Test Connection function can save your materials.

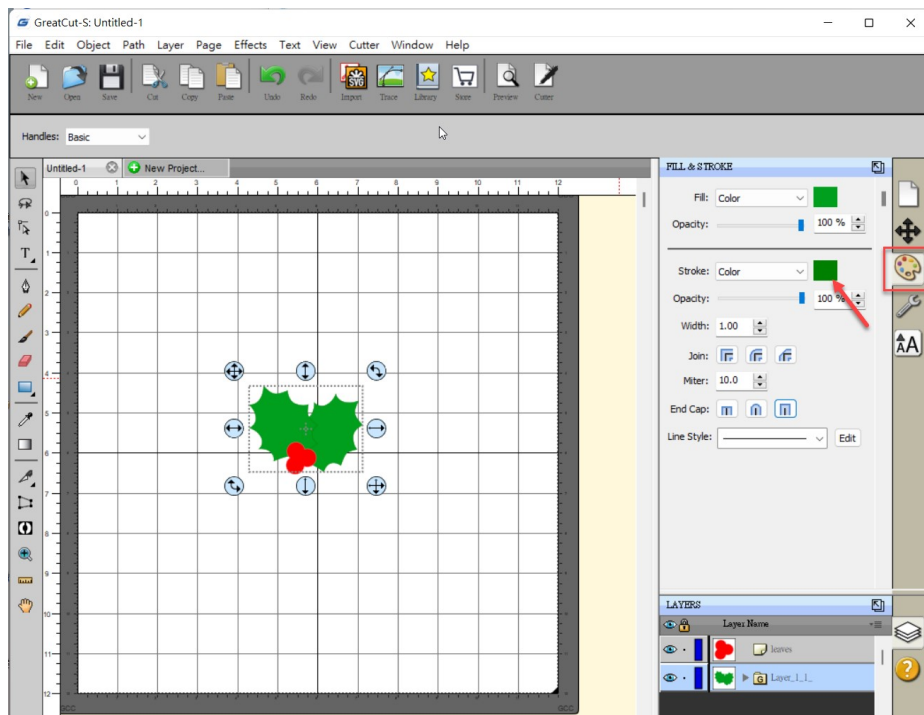
✓ Click on “Test Connection” to exam if set the connection properly.



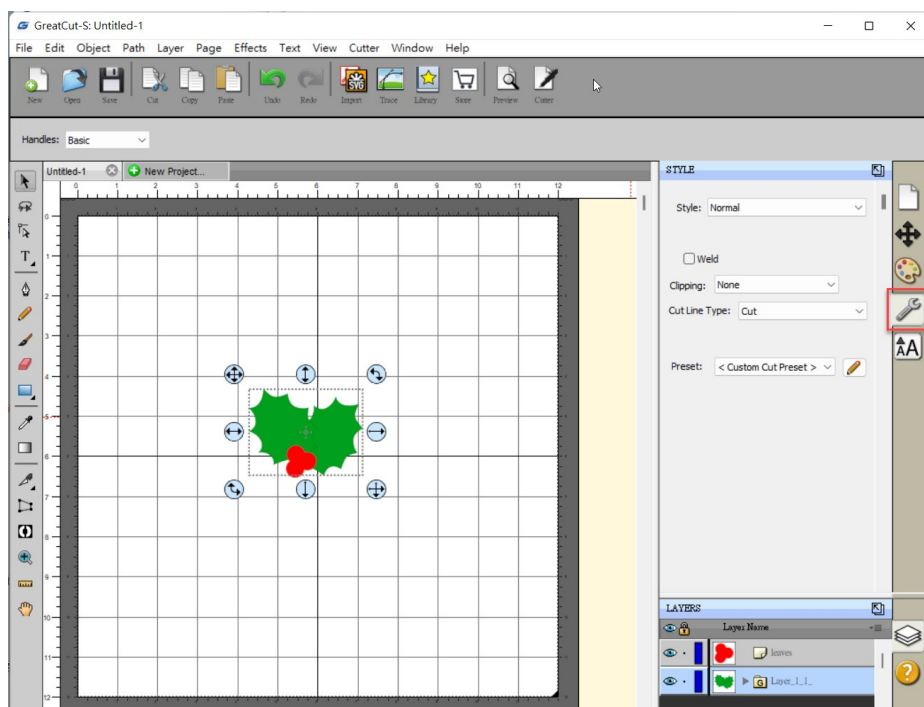
H. Cut by Color

The Cut by Color function allows you to choose which colors in your design you want to cut, and designate different parameters to each color. You can cut your designs in a single job or separate jobs for each color.

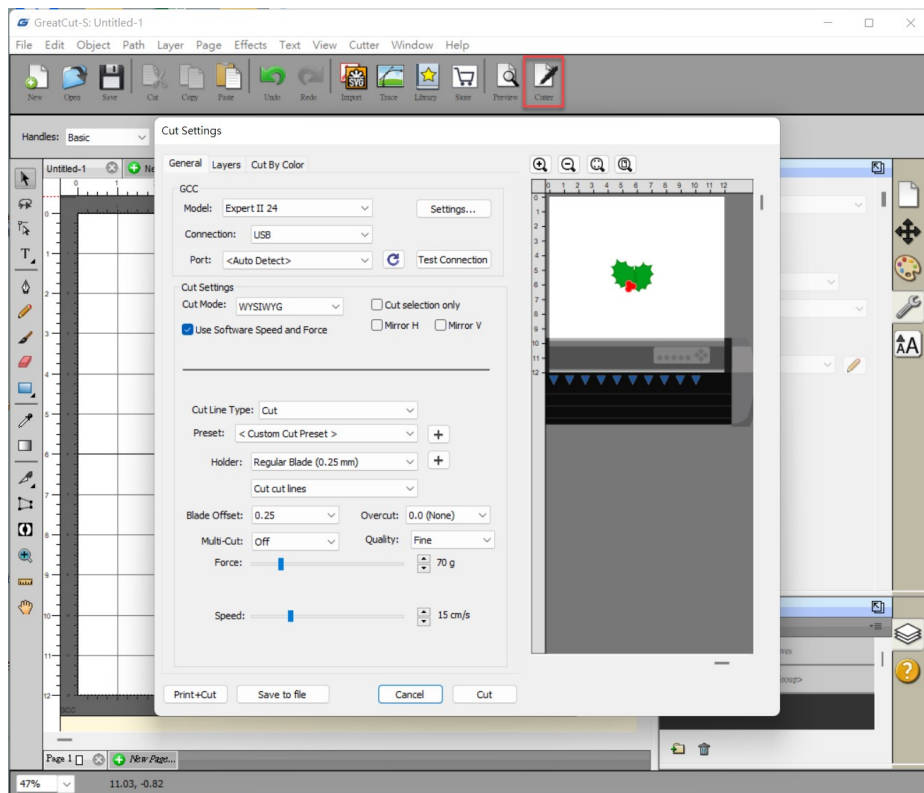
1. Select a design and specify a color for it.



Then define cut type and parameter.



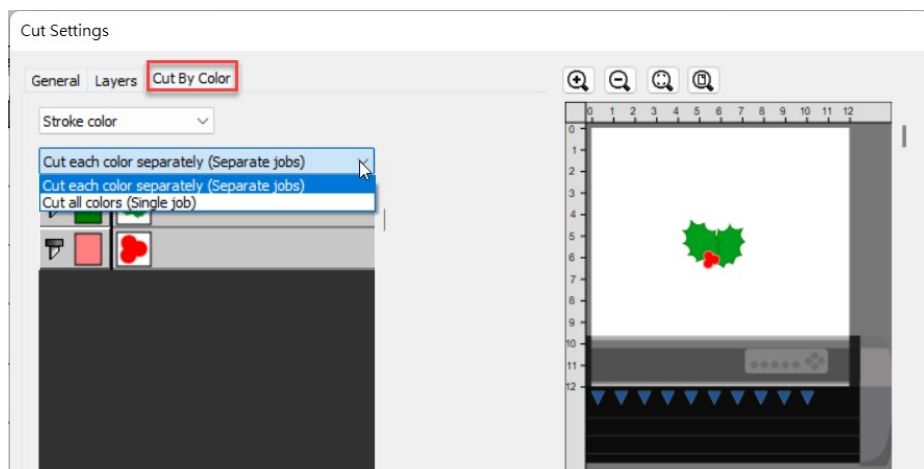
2. Click on “Cut” to open Cut Settings window.



3. Click on the Cut by Color tab and choose to either Cut all Colors in a single job or Cut each color separately as an individual job.

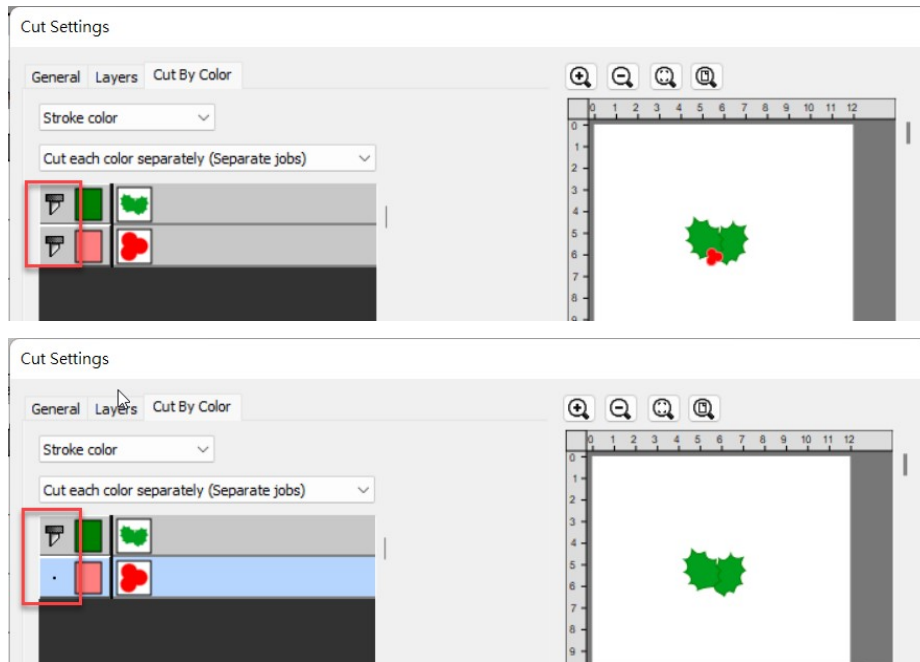
When Cut each color separately is selected, GreatCut-S will prompt you between each color before starting to cut so you can load the appropriate color or corresponding tool into your cutting machine.

Note: If the same tool is being used for all colors in a cutting job, it is suggested to use “Cut all colors (Single job)” .

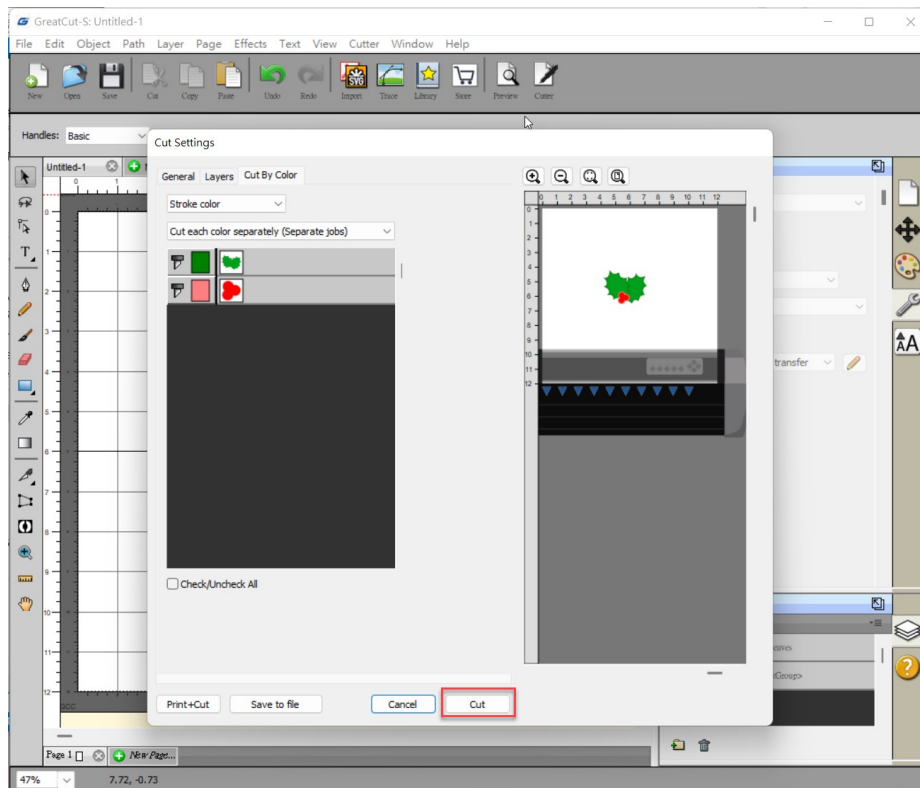


- Click on the blade icon to choose the colors you want to cut. The preview will display which colors are currently enabled for cutting.

Note: You can adjust the order of the layer arrangement by clicking and dragging the layer.

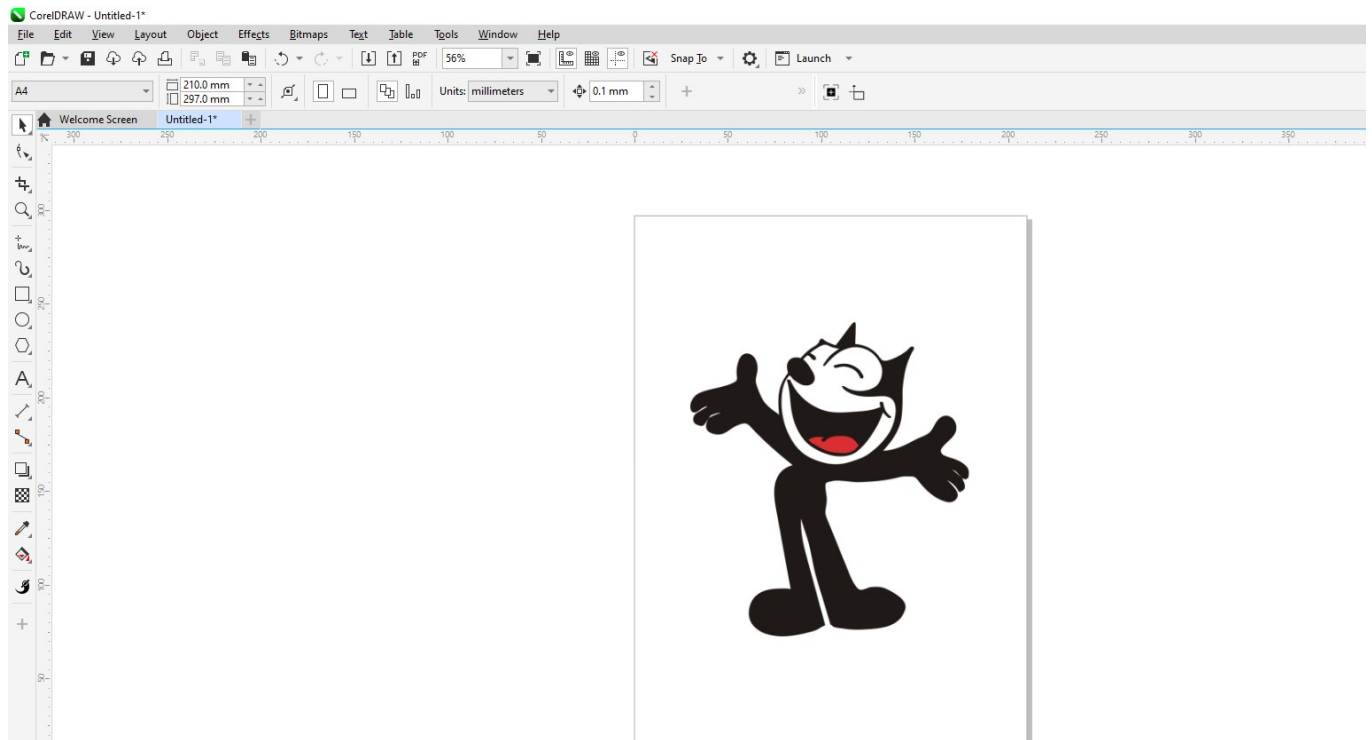


- Click on “Cut” to start cutting.

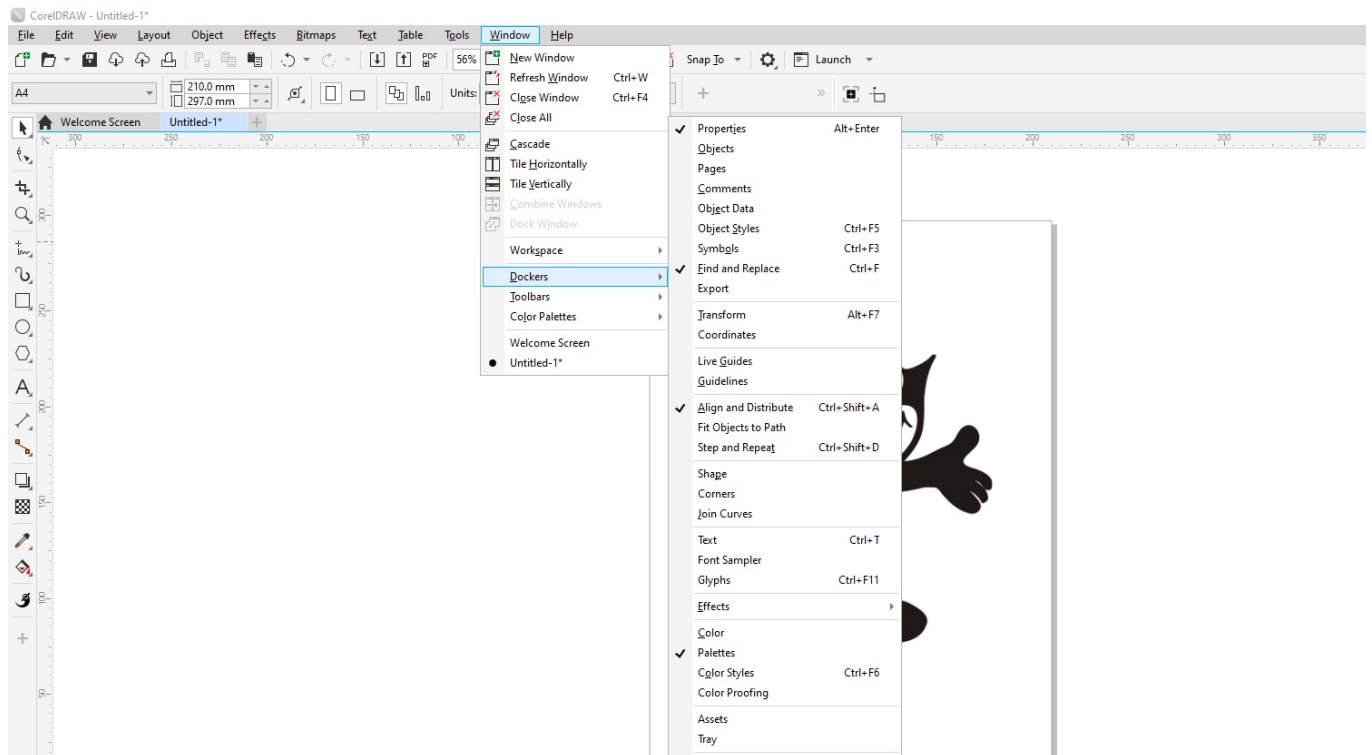


I. How to create Registration mark in Greatcut-S for contour cutting

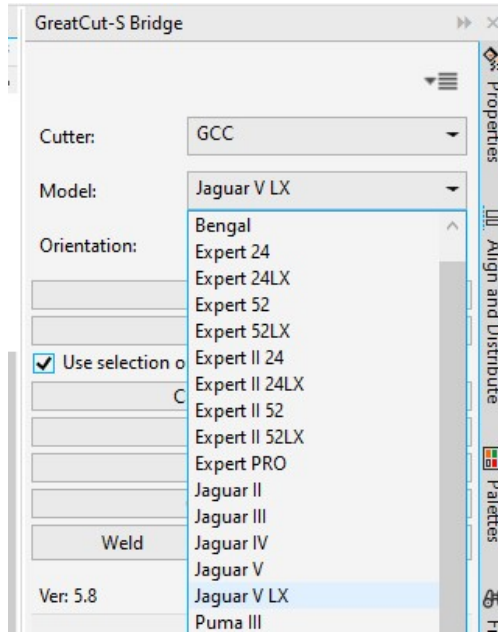
Step1 Create a file



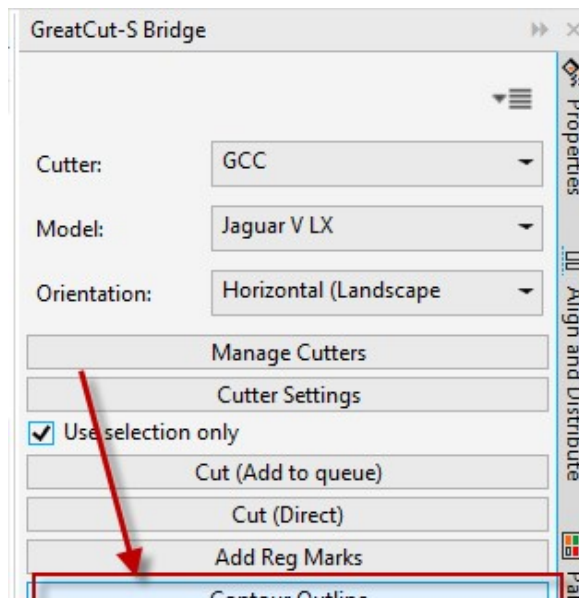
Step2 Go to Windows → Dockers → GteatCut-S Bridge



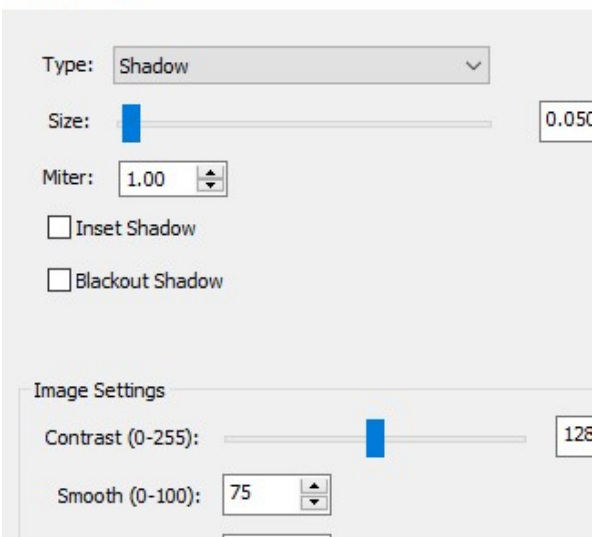
Step3 Select the model with AAS function from the model menu in GreatCut-S Bridge.



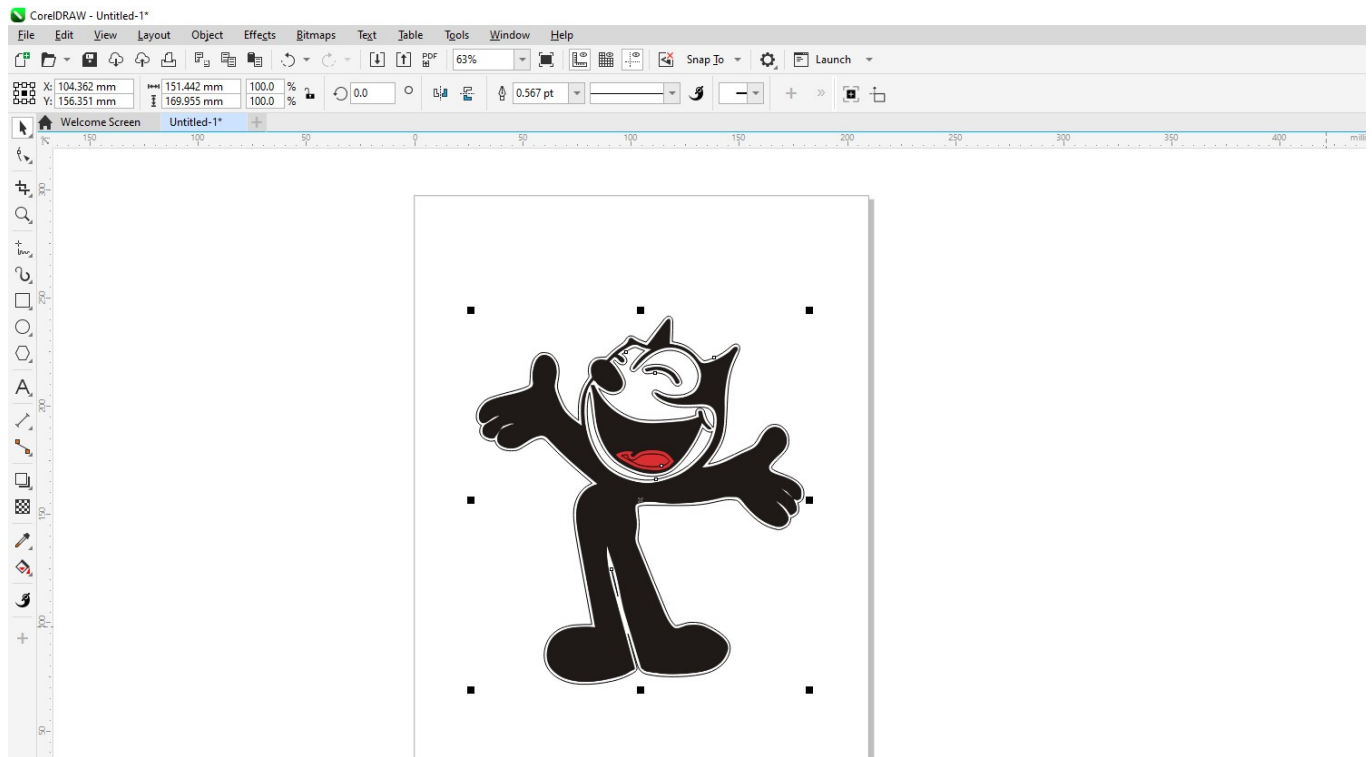
Step4 Select Contour Outline, and define the offset value of contour line from the size option in Shadow Layer menu.



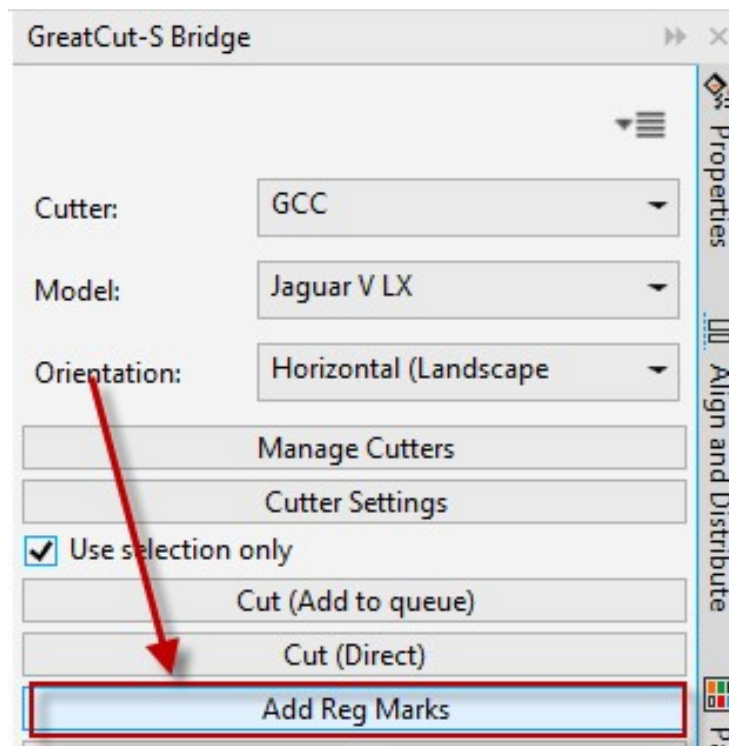
Shadow Layer



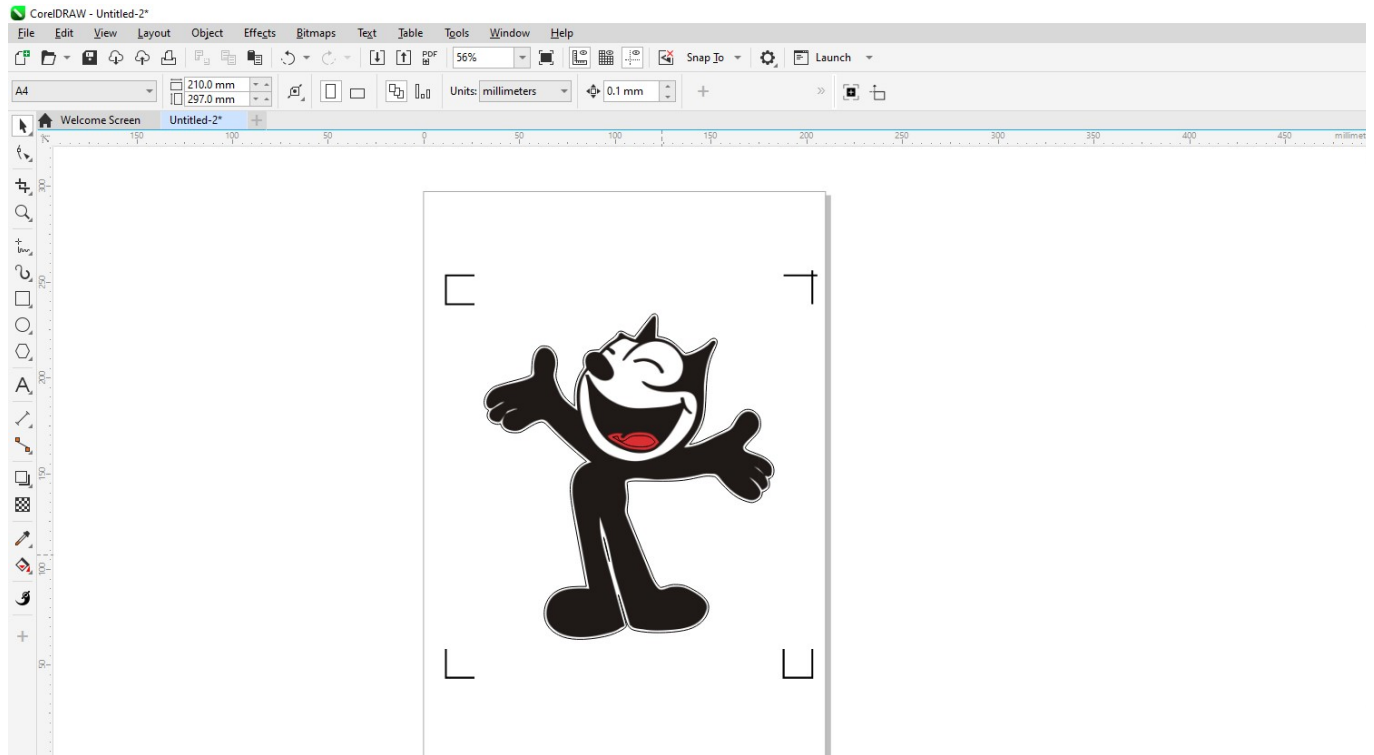
Step5 The contour line is created.



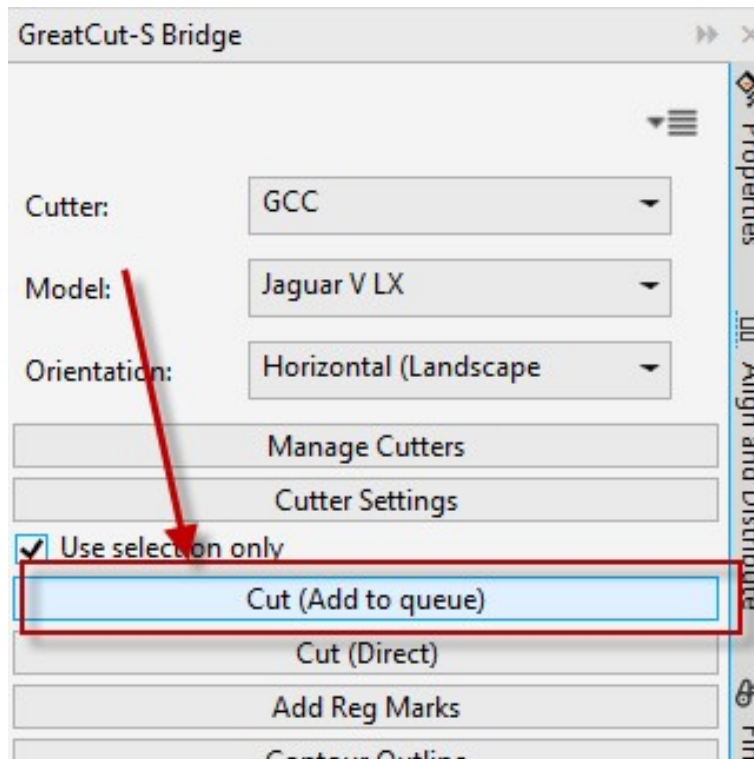
Step6 Select “Add Reg Marks” to add registration marks.



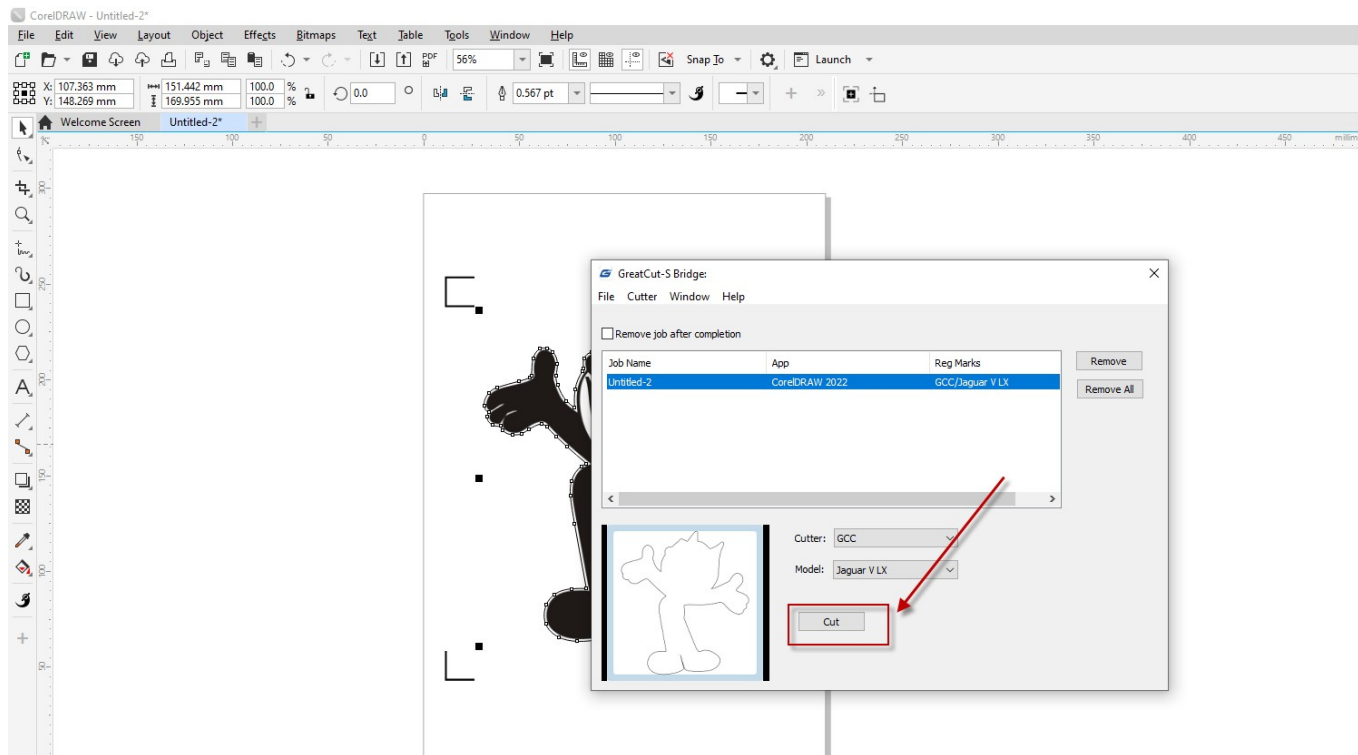
Step7 The registration marks are added.



Step8 Select “Cut (Add to queue)” to send the file.

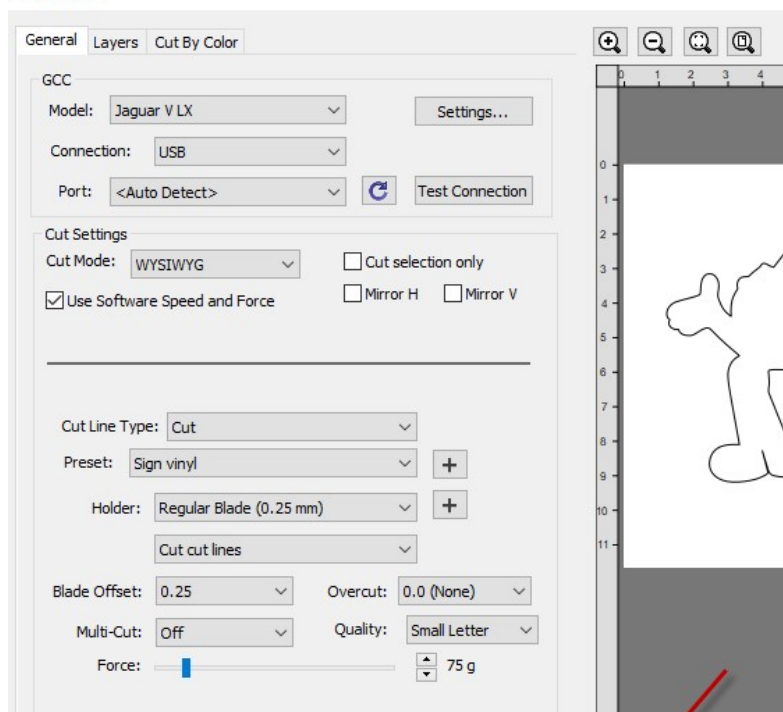


Step9 Click on “Cut” in GteatCut-S Bridge window.



Step10 Define the parameters in Cut Settings window and select “Cut”.

Cut Settings



Step11 The process is complete.