Contents

Chapter One Use Notices

- Power supply with voltage of AC220±10% shall be used for TC series of computer cutting plotter. Otherwise, a power regulator have to be used
- The carriage carries strong magnetic field, so tiny ferromagnetic objects are not allowed to be placed around it
- Foreign matters such as pins and screws should be prevented from dropping into the machine.
- Provided that the computer cutting plotter is out of use for a long period, the power plug should be disconnected
- The cables (except the USB cable) connecting to the computer are forbidden to be plugged and unplugged when the power is on
- When out of use, the pinch roller should not press against the home roll for a long time
- The shell of the cutting plotter should be connected to that of the computer with the wire and be grounded
- When scribing, there should be enough space around the cutting plotter, so as to prevent the paper from crashing into the objects around, which will lead to the deformation of the scribed graphics

The Statement on Class A Devices

This product is among Class A products. In the living environment, it may cause radio interference. Under such a circumstance, the user may be required to take practical protection measures to deal with it.

Chapter Two Basic Information and Installation

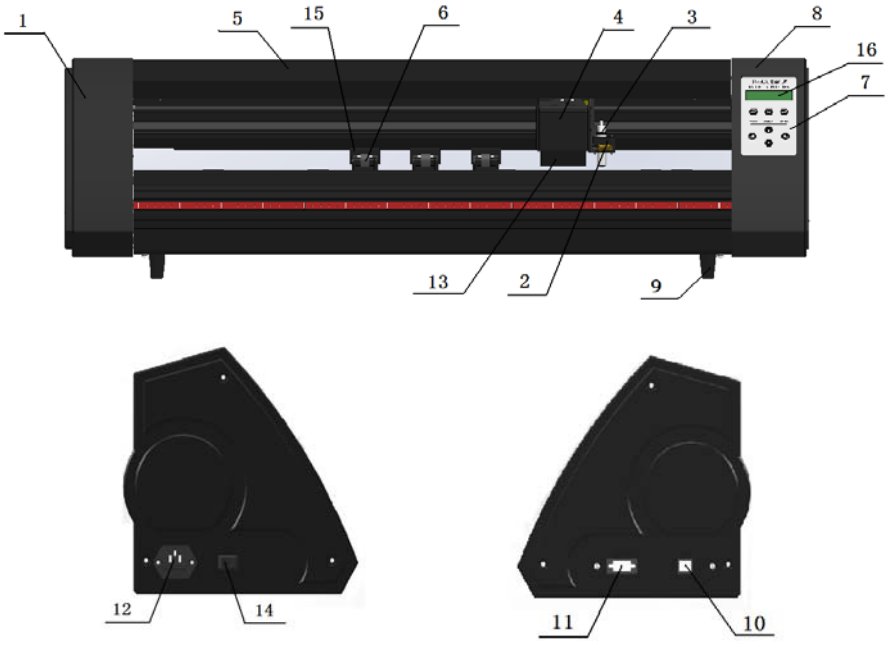
I. Accessories

No.	Name	Quantity	Unit
1	The main body of the computer aided character	1	Piece
2	Graver base	1	Piece
3	Ballpoint pen holder	1	Piece
4	The refill of the ballpoint	1	Piece
5	Graver	3	Handful
6	Serial cable	1	Piece
7	USB cable	1	Piece
8	Power cord	2	Piece
9	Hood	1	Piece
10	The user's manual	-	-
11	Warranty certificate	1	Piece
12	Compact disc	1	Piece

II. Brief Introduction to the Main body

The outline drawing of TC series of computer cutting plotter:

1. The left housing
2. Graver holder
3. Graver base
4. The carriage of the engraver rack
5. Rail shield
6. Pinch roller
7. Keypad
8. The right housing
9. Rubber machine leg
10. USB port
11. Serial port
12. Outlet
13. Sensor
14. Power switch
15. The assembly of the pinch roller base
16. Liquid crystal display



III. Rack Parts and Their Installation

1. Rack Parts

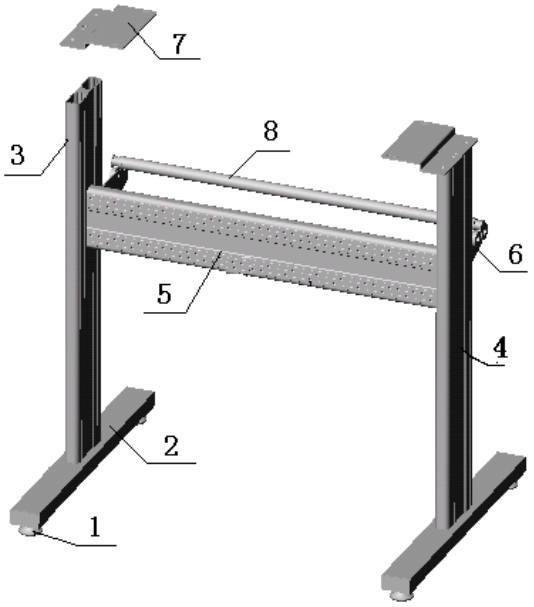
No.	Name	Quantity
1	Support arm	4 pieces
2	Support arm bridge	2 pieces
3	Left column	1 piece
4	Right column	1 piece
5	Beam	1 piece
6	Supporting paper holder	2 pieces
7	On-line plate	2 pieces
8	Winding shaft	2 piece
9	Self tapping screw M4×20	12 pieces
10	Screw M4×8	8 pieces

2. Installation of the Rack

Step 1: the support arm① is screwed into the threaded hole of the support arm bridge②, and then the support arm bridge is connected to the left and right columns③④ respectively with screws.

Step 2: the left and right columns are connected to the beam⑤ with screws.

Step 3: the supporting paper holder ⑥ is fixed to the inside of the left and right columns with screws. All the screws must be installed on the supporting paper holder; especially, a hole with screw thread on it must be fixed with the screw, which cannot be missing.



The outline drawing of the rack

Step 4: the on-line plate⑦ is connected to the top of the left and right columns with screws.

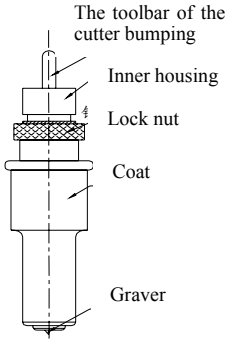
Step 5: the 4 original machine legs are disassembled from the main body, the main body is placed on the on-line plate, and then, the machine legs are connected to the main body by passing through the on-line plate.

Step 6: the winding shaft⑧ is placed on the trolley of the supporting paper holder.

IV. Graver and Paintbrush

1. The structure of the graver base and the names of its components

The standard graver is one which can rotate in the precision bearing of the graver base, clamped by a spring housing so as to prevent it from falling off; The coat of the graver base can rotate, so as to adjust the length of the graver outside the coat, ensure that the graver won't break the backing paper stuck on it instantly and that the knife can be pushed out by pressing the toolbar of the cutter bumping for the convenience of replacing the graver.



The structure chart of the graver base

2. Installation and adjustment of the graver

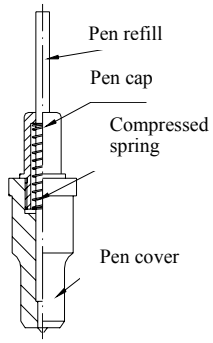
(A) Before the installation of the graver, the base of the graver, the graver and your hands should be cleaned carefully. If brought into the precision bearing, the microscopic dust will endanger the sensitivity of its rotation. The graver is inserted into the graver base carefully and then, pushed to the end with a soft piece of plastic or rubber, during which you should be careful not to touch the tip of the graver.

(B) The shell of the graver base is rotated so as to push out the knife tip. Generally, the extension length of the knife tip is around 0.25mm (which can be extended appropriately when scribing the imported reflective film). After a period of use, larger extension length (Timely replacement is preferred.) is also allowed for the graver is not sharp enough. Correct adjustment to the length of the knife tip can lead to not only more smooth characters but also longer service lives of the graver and the mound layer.

3. Drawing pen stand

By using the pen stand equipped with this machine at random, drawing can be done with cheap ballpoint pen refills.

1. The pen cap is unscrewed with the hand.
2. The compressed spring is embedded on the above of the ear of the pen refill.
3. The end of the ballpoint pen refill passes through the pen cap, and the pen cap and the pen cover are screwed tightly.



The structure chart of the pen holder

4. Installation of the graver base (or the pen holder) into the graver rack

1. Power is off.
2. The holding screw on the graver rack is loosened, and the graver base or the pen holder is placed into the V-shape gap of the graver rack, where the knife tip of the graver or the pen tip can contact the plastic mound layer. The screw is screwed tightly clockwise.

3. After the power is on, the graver base or the pen holder should be able to be lifted, and the bottom end of the graver base should be 2 to 3 mm distant from the plastic mound layer.

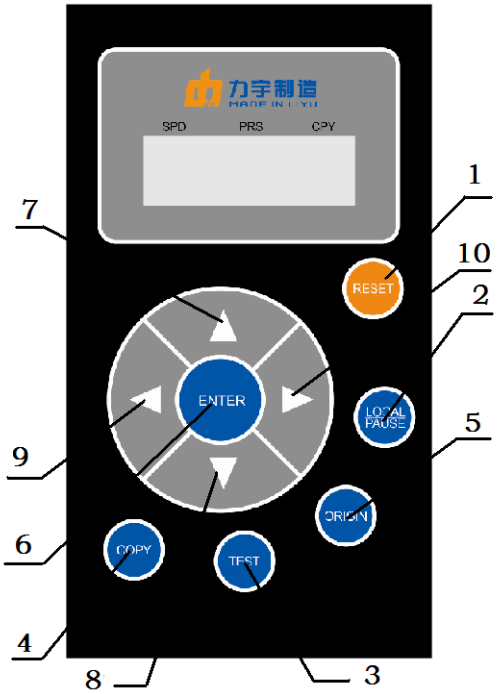
V. Technical Indicators

See Appendix one.

Chapter Three Instructions on the Operation Panel of the Cutting Plotter

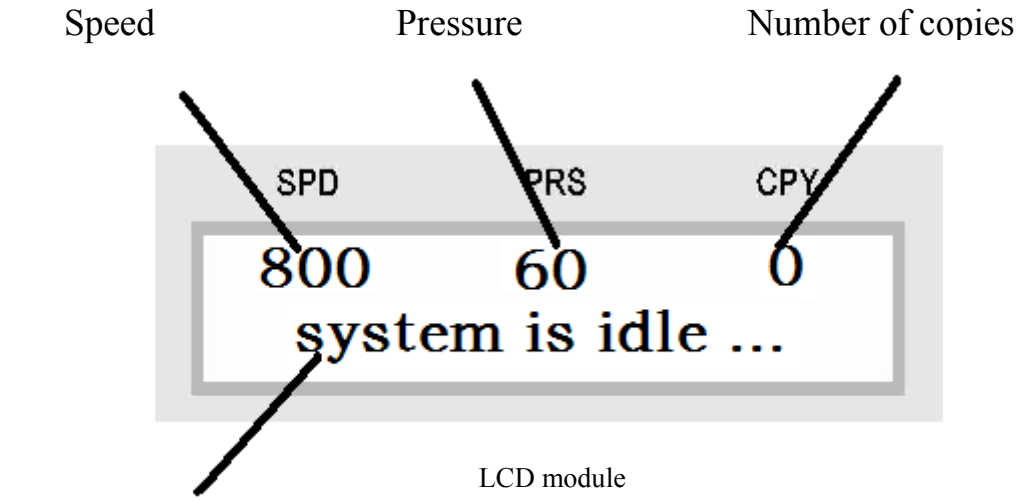
I. Introduction of the Operating Keys on the Keypad

The layout of the keypad (applicable to TC-A and TC-AA series)



1. Reset key
2. Pause key
3. Test key
4. Copy key
5. Origin key
6. Enter key
7. Up key
8. Down key
9. Left key
10. Right key

Keys on the TC-A&TC-AA series of cutting plotter



LCD module

II. Introduction to the states of the cutting plotter (applicable to TC-A and TC-AA series)

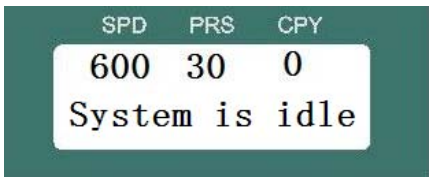
1. The resetting state:

After the power is on or the "Reset" key on the operating panel is pressed, the cutting plotter is under the resetting state. The carriage moves rightward all along and doesn't stop until touching the right limit switch. After its stopping, the spindle of the cutting plotter rotates back and forth for a while, marking the end of the reset action of the cutting plotter. The LCD is shown as the right picture.

The resetting state

2. The idle state:

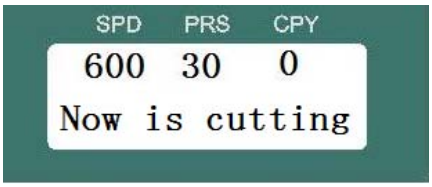
After the completion of resetting or scribing, the cutting plotter goes into the idle state, under which it waits for the input of the computer data and the customer's operation, during which the LCD is shown as the right picture. Among the figures on the LCD, 600 represents that the speed is at the sixth gear, 30 represents that the pressure on the graver is at the 30th gear, while 0 represents that there is no duplicate.



The idle state

3. The scribing state:

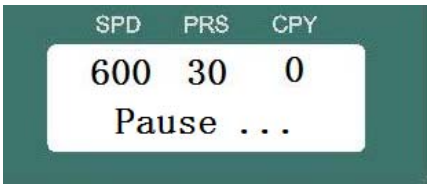
When the "Test" key is pressed or the scribing data is assigned by the computer, the cutting plotter goes into the scribing state, during which the LCD is shown as the right picture.



The scribing state

4. The off-line/ manual state:

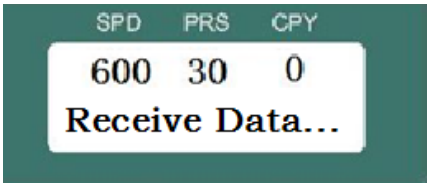
When the "Pause" key is pressed during the scribing process or under the idle state, the cutting plotter goes into the off-line/ manual state, under which the machine stops scribing, and the four direction keys will change the positions of the carriage and the home roll. The LCD is shown as the right picture.



The off-line/ manual state

5. The data receiving state:

When the "Pause" key is pressed during the scribing process or under the idle state, the computer aided character carver goes into the off-line/ manual state, under which the machine stops scribing, and



The data receiving state

the four direction keys will change the positions of the carriage and the home roll. The LCD is shown as the right picture.

6. The homing state

Under the off-line/ manual state, after the motor is moved by hand, by pressing the "Pause" key or the "Enter" key, the cutting plotter goes into the homing state. Under this state, the motors of the carriage and the spindle will, by turns, return to their original positions when entering the off-ling/ manual state.

III. Parameter Setting

1. Speed adjustment

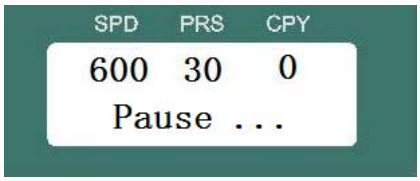
Adopting the bilateral circulation manner, the speed is adjusted through the direction keys such as "↑" key or "↓" key. Every time "↑" key is pressed and then, loosened, the speed will be lifted by one gear. By pressing "↑" key after the top gear is reached, the speed returns to the lowest gear; on the contrary, every time "↓" key is pressed, the speed will lower by one gear, and by pressing it again after the lowest gear is reached, the speed will change to the top gear. During the scribing process, the speed of the cutting plotter can also be adjusted. The machine will stop scribing during the process and continue scribing a moment after the completion of the adjustment.

2. Adjustment to the knife pressure

Adopting the bilateral circulation manner, the pressure is adjusted gear by gear through "←" key or "→" key. Every time "→" key is pressed, the pressure will be lifted by one gear, and by pressing "→" key for a long time, it will be lifted quickly. By pressing the key again after it reaches the top gear, the pressure will change to the lowest gear; on the contrary, every time "←" key is pressed, the pressure will lower by one gear, and by pressing the key for a long time, it will lower quickly. By pressing the key again after it reaches the lowest gear, the pressure will change to the top gear.

IV. Introduction to the Functions

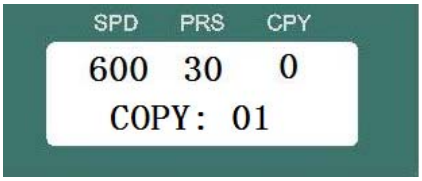
1. Off-line/ Origin resetting



Under the idle state or during thescribing process, by pressing the "Pause" key, the cutting plotter will g ointo the off-line state, under which the cutting plotte r stops scribing, and theuser can move the carriage a nd the spindle through the direction keys. Bypressing the "Origin" key, the "Pause" ke

y or the "Enter" key, themachine will exist from the off-line state and return to its orig inal state.After the movement, the point at that moment will change into the originalp oint (**the origin resetting function**),if the "Origin" key is pressed, and the cutting plot ter will enter the homingstate and return to the original position if the "Pause" key or t he "Enter" key is pressed.

2. Copy



Under **the idle state**, by pressing the "Copy" key, the cutting plotter will go into the copy interface and achieve the copy function. The number of copies (99 copies at most) can be set through "↑" key or "↓" key. Every time "↑" key is pressed and then loosened, one copy will be increased, and by pressing and loosening the key again after the number has reached 99, the number will return to 0; in the same principle, every time "↓" is pressed and then loosened, one copy will be reduced, and by pressing and loosening the key again after the number has reached 0, the number will change to 99. If data exists in the internal memory of the cutting plotter, by pressing the "Enter" key after the number of copies is set, the cutting plotter will repeat scribing the graphics left in the internal memory.

If no data exists in the caches, the will refuse to scribe again. At this moment, the screen is shown as the right picture and by pressing any key, the machine will return to the idle state.

3. Test scribing (Self-check)

Under **the idle state**, by pressing the "Test" key, the cutting plotter will scribe the self-check graphic. Through the self-check function, the user can check the intensity of the graver pressure and the speed, so as to find out the appropriate pressure and speed for scribing.

4. Contour cutting

If possessing the function of contour cutting, the cutting plotter will be able to cut the picture along its outline. For the concrete operation method, please refer to **Chapter Six Operation of the Special Function**.

Note: The function of contour cutting has a high requirement on both the user's operating skills and the cutting plotter. For the reason that we can't guarantee that every cutting plotter has the same accuracy and regarding the fact that every user masters different proficiency levels, we can't guarantee the quality of contour cutting under the performance of the user. It is recommended that the

customer set the distance between the outline and the image as 2mm when doing the contour cutting work.

The function of contour cutting is a function optional to the cutting plotter.

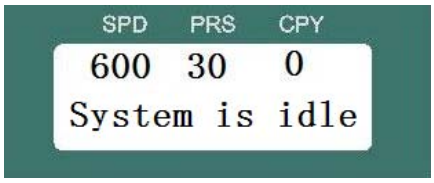
V. Connection of the Cutting Plotter

1. Connection to the computer

The cutting plotter can be connected to the computer (PC) by ways of serial port (COM) and USB port. First, ensure that the cutting plotter is power-off. Then, one way of connection is chosen, and the cutting plotter and the computer are connected together with the cables provided by the manufacturer. During the connection process, ensure that the cables are connected reliably and no bad conditions such as looseness and poor contact will appear.

2. Connection to the power and the boot

The power line provided by the manufacturer is made use of to connect the cutting plotter to the external power supply. **Please ensure that the public ground wire of the external power receptacle is reliably grounded.**



By pressing the power switch, the cutting plotter boots up and enters the resetting process. The carriage moves rightward all along and eventually, stops at the right side of the cutting plotter (In respect of the setting of skimming the resetting process by the customer, both the carriage and the spindle motor won't move and the cutting plotter will go into the idle state directly). After the end of the resetting, the machine will stay at the idle state, and the LCD is shown as the right picture.

Chapter Four Instructions on Operation from the PC

Configuration requirements of the computer:

Main body: The chipsets above the Intel 815 grade and CPU above the PIII1G grade are used in the motherboard; Intel series of CPU and chipsets are recommended to be used;

Operation system: Above Windows2000/XP system; **The installation of LiYu CorelDRAW drive requires the operation system above WINDOWS7-32;**

I. Installation of the Scribing Software

For the installation and specific usage of the scribing software, please refer to its instructions.

Besides, some supporting help files are placed in the compact disk equipped at random, and their address is: Catalogue…\ Others\…(for instance, the address of the registration method of flexistarter software is: Catalogue…\ Others\ The help file of flexi cloud version\…).

II. Installation and instructions on the drive of USB interface

(I). Drive Instructions

USB drive of LiYu plotter is divided into two kinds:

1. The USB drive applicable to common scribing software (such as ARTCUT, CutterMaster, flexistarter, signmaster, signcut, etc). Its address in the compact disk equipped at random is: **Catalogue…\ The drive of the product\ The drive of the scribing software (such as ARTCUT)\ Installation of USB drive \…**

2. The USB drive applicable to CorelDRAW software of direct output. Its address in the compact disk equipped at random is: **Catalogue…\The drive of the product\ CorelDraw drive\ Installation of LiYuPlotter \…**

Note: These two kinds of drives can't be mixed up.

Meaning: if using the scribing software for output, please install the first USB drive; if using CorelDRAW software for direct output, please install the second one! Besides, if the scribing software is used for output at the beginning but changed to CorelDRAW software later, the USB drive used at the beginning should be unloaded (deleting the device from the device manager), and then, the new USB drive can be reinstalled.

(II). Installation of and Instructions on USB Drive of the Common Scribing Software

1. Installation of the drive procedure

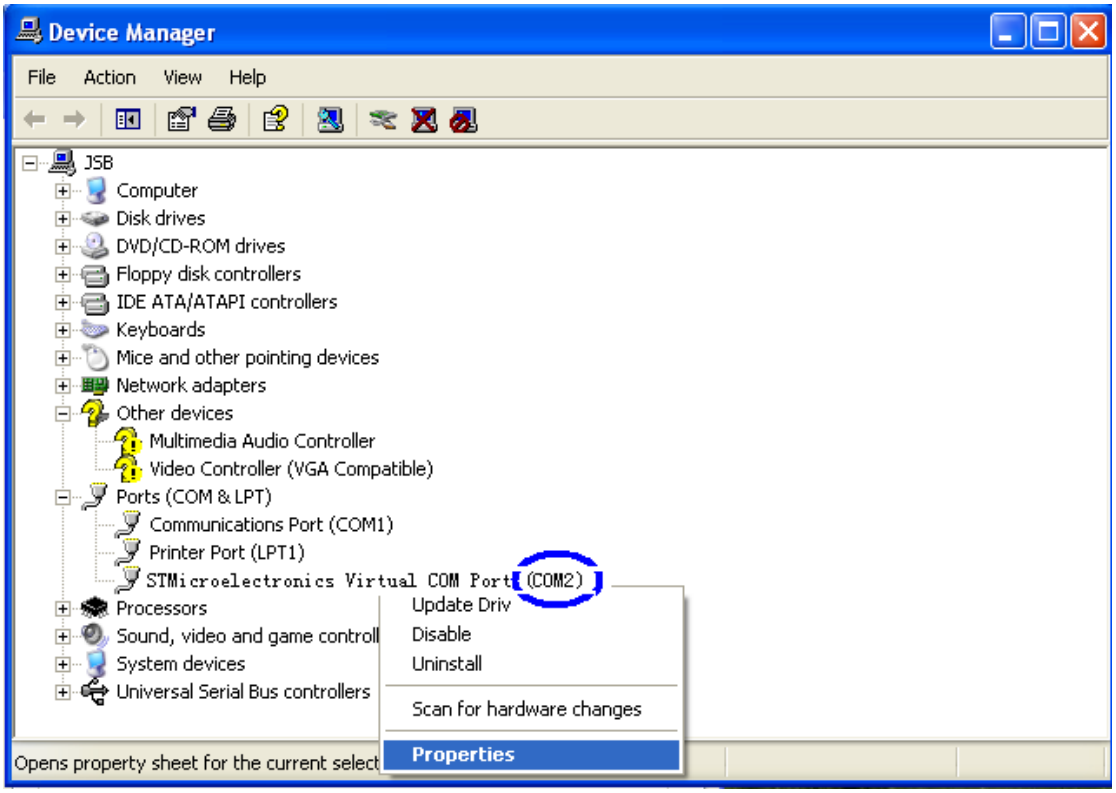
While the drive installation procedure VCP_V1.3.1_Setup.exe (for 32-digit system) or VCP_V1.3.1_Setup_x64.exe (for 64-digit system) is running, the user chooses the corresponding drive procedure in accordance with the operation system of the computer and double clicks it to carry out the pre installation of the device;

2. Installation of the hardware

After the cutting plotter is connected to the computer with USB cable, the cutting plotter is switched on, such indication as "Finding new hardware installation wizard" is popped out from the computer system, and then, the key "Next Step" is clicked to finish the installation. After the completion, a mark of USB hardware will appear on the task bar at the bottom right corner of the computer;

3. Configure port

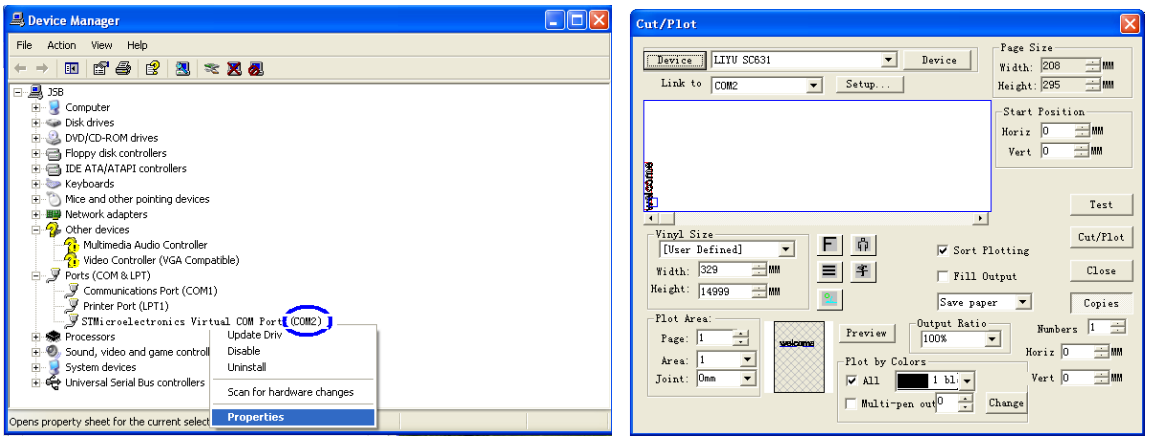
After the completion of the installation of the hardware, a new port will appear in the "Port" of the computer device manager, as shown in Picture 1 below:



Picture 1 The port

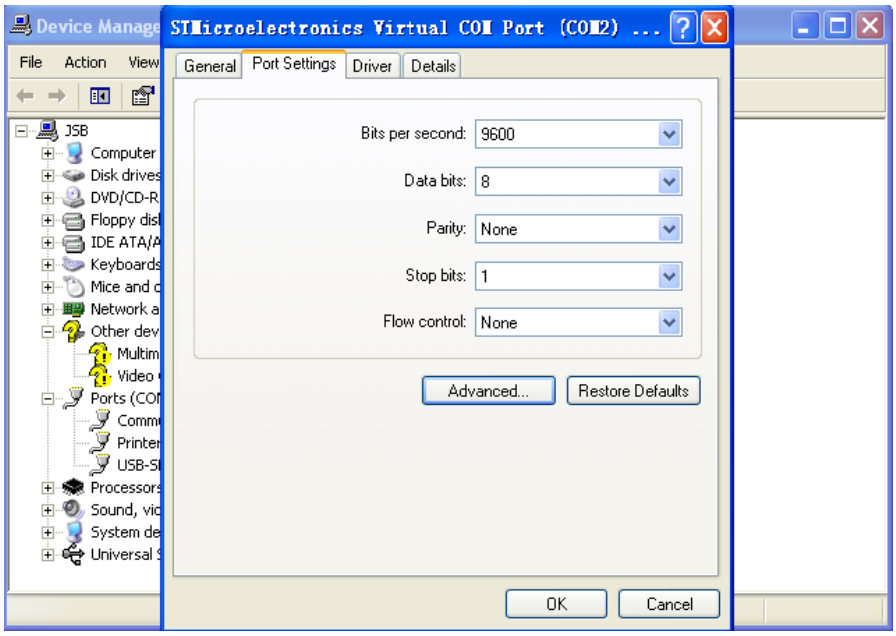
(III). Matters needing attention:

1. When using the machine of USB interface for output, please choose a port consistent with that displayed on the computer device manager (such as COM2);

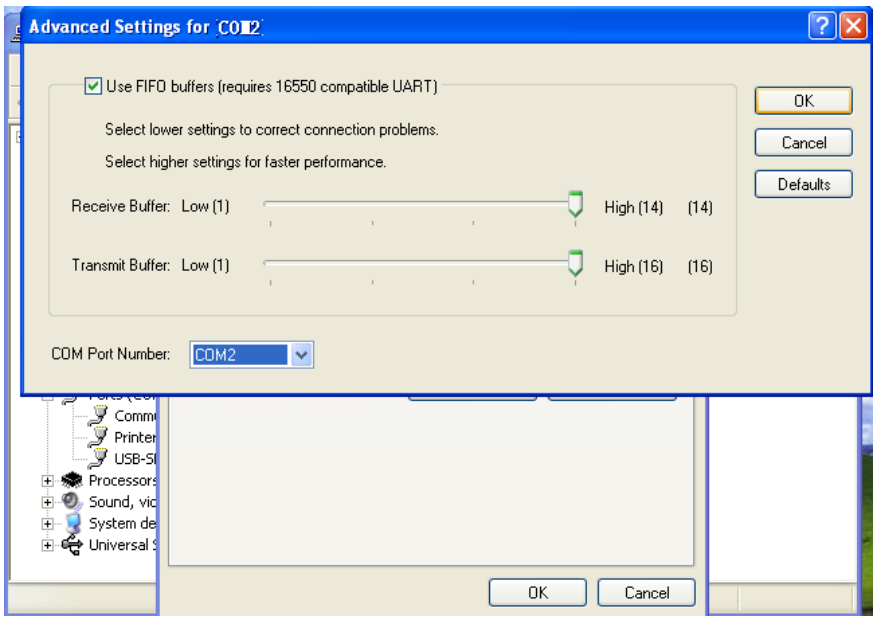


Picture 2 The port

2. When using the scribing software (such as ARTCUT, CutterMaster, flexistarter, signmaster, signcut, etc), please ensure that the output port of the software is consistent with that of the device manager, as shown in Picture 2. Please pay attention to the number of the newly added port in the device manager. If any inconsistency in the port number, please correct it as shown in Picture 3 and restart the computer; otherwise, such a phenomenon that the output of USB port can't be connected to the computer will appear; (if COM2 port is taken up by another device, please unplug the device first before using it and plug the device again after the port is used by the cutting plotter.)



The port property



Correction of the port number

3. Due to the use of different USB ports, COM ports provided by the drives are of difference as well; to avoid the inconvenience to your work, please use the same computer motherboard to make the USB interfaces rear when using the machine of USB interface;

4. When USB interface is used by the cutting plotter for the first time, the computer may runs very slowly during the installation of the hardware. This is not a fault, and please wait for the appearance of the installation interface patiently;

5. When the cutting plotter is working under the state of USB2.0, the USB interface line is 1.5m. There is no guarantee that the machine can work normally with the use of a longer interface line.

6. During transmission of data, the data cable is forbidden from being plugged and unplugged, or damages may be caused to the device interface.

(IV). Drive instructions

Most desktop computers and notebook computers in China have their operation systems installed in the way of ghost or condensed as their manufacturers aim to lift their operating efficiency, where part of the system files required by the drive are deleted, leading to disability in correct installation of USB drive. It is recommended that the customer buys the computer with full edition of operation system. Besides, in the driver CD are the system files frequently missing that we collect. For details, please refer to the instructions within the folder "Supplementary files to USB drive" in the driver CD equipped at random.

III. Installation of CorelDRAW Drive

At present, a large number of users like using CorelDRAW software when scribing. To satisfy the demand of the users, our company has developed a new drive aiming at CorelDRAW software, with which they can output the patterns designed by their own from CorelDRAW software directly without transfer of the patterns into the scribing software.

CorelDRAW drive includes: 1. the drive of the printer; 2. the drive of USB interface among CorelDRAW drive; 3. CorelDRAW plug-in.

Note: the drive procedure of USB port differs when using CorelDRAW drive and using the scribing software.

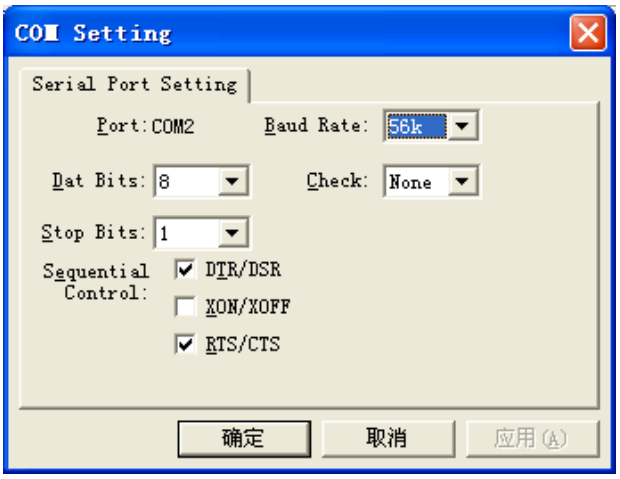
Installation of USB drive among CorelDRAW drives. For installation and user manual of the printer drive, please refer to the file "Installation procedures and user manual of LiYuPlotter.pdf" in the compact disk equipped at random (Catalogue: …\ The drive of the product\CorelDraw drive \Installation of LiYuPlotter\…).

For detailed information on installation and usage of CorelDRAW plug-in, please refer to the file "Installation procedures and user manual of CorelDRAW plug-in.pdf" in the compact disk equipped at random (Catalogue: …\The drive of the product\ CorelDraw drive\ Installation of CorelDRAW plug-in \…).

Note: There is no need to install CorelDRAW plug-in if the user doesn't need the function of outline cutting.

IV. Setting of the Scribing Software

(I). The setting of the port



The setting of the port

The baud rate of both the serial port (COM) and USB port is 57600 or 56K; the streaming controls item 1 and 3; the data bits reach 8; the check bit is none; the stop

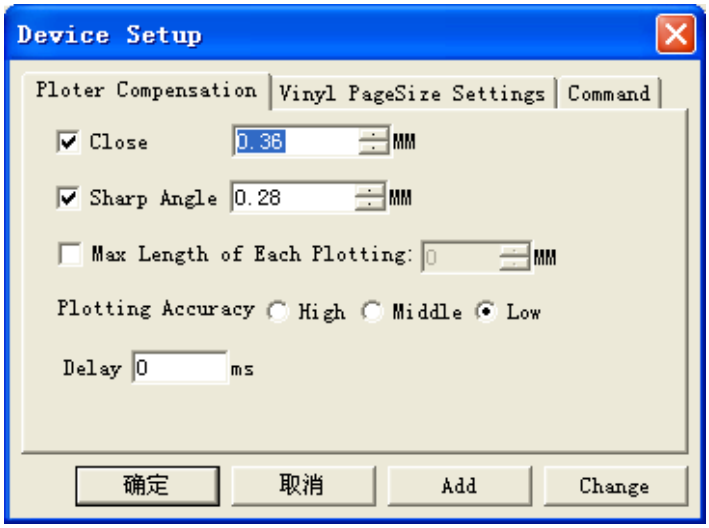
bit reaches one.

(II). The setting of sharp corner compensation

When using the graver to do the scribing work, the compensation value is related to the offset of the graver: 0.25 →0.28 mm, 0.5→0.56mm, the offset value being consistent with or a little larger than the software compensation value, and the like.

(III). The setting of closing compensation

When using the graver to do the scribing work, the value of the closing compensation is related to the size of the character: for the character of the size below 1cm, the knife offset is 0.1mm, for the character of the size below 10cm, the compensation value is 0.3mm, and the larger the character is, the large the closing compensation value is.



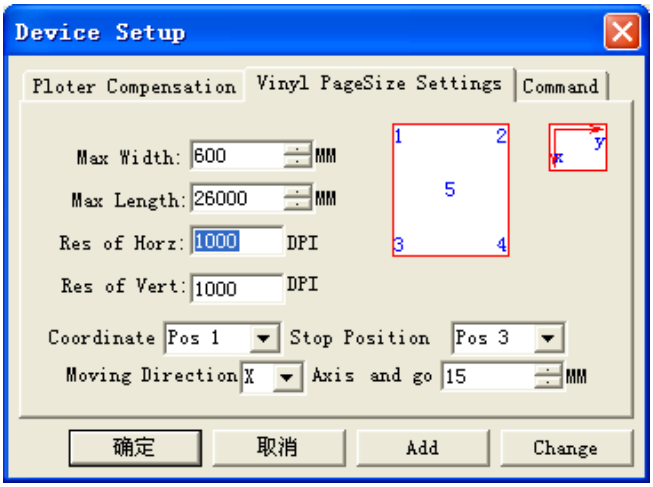
The setting of compensation

Note: Sharp corner compensation and closing compensation are not necessary

when scribing with the paintbrush.

(IV). Adjustment to the size

Due to the errors in machining accuracy of every cutting plotter, the lengths of the actual scribing are of minor differences, which can be adjusted through the resolution of the software. Here, let's take ARTCUT software for an example to introduce how to adjust the size. First, a square of 50*50cm is made in the software, and meanwhile, X resolution a1 of the software is checked and recorded (in ARTCUT software, by pressing the item "Output", the output interface will pop out and by clicking the "Setting" key, the setting interface below will pop out). Then, the square is drawn on the white sheet with the paintbrush. The straightedge is used to measure the length L (Unit: cm) in the direction of the spindle.



Adjustment to the size

The new resolution in X direction=L×a1÷50. The resolution in the other direction is adjusted in the same way. Such adjustment can be made several times according to the method. The adjustment to other kinds of software is made in similar ways, and the detailed information is shown in the software instructions.

Note: In respect of the setting of the above scribing software's parameters, only ARTCUT scribing software is listed as an example. For the detailed setting of other kinds of scribing software, please refer to the catalogue of the compact disk equipped at random: The file "Parameter setting.pdf" in the address: ...\Product Documents \Parameter Setting\...

Chapter Five Operating Skills

1. Loading the paper

1. The handle of the pinch roller shall be lifted to make the pinch roller separate from the home roll.
2. Pass the paper through the pinch roller and the home roll of the cutting plotter from back to front.
3. The front of the paper is made to be roughly aligned with the slab joint in the front of the cutting plotter, and the pinch roller on the right side is put down. After that, the left side of the paper is made to be aligned with or equidistant from one of the marking lines on the front panel and then, the pinch roller on the left side is put down.

Description: The cutting plotters of different specifications are equipped with pinch roller seats in different numbers, and every pinch roller seat can move on the rail. During the movement, the handle of the pinch roller must be lifted. The back of the pinch roller seat is grasped and it is pushed leftward and rightward. The lever of the pinch roller can't be pulled by hand from the front, or the accuracy of the machine will be damaged.

Note: The right pinch roller seat can move, but every pinch roller should be guaranteed to press against the spindle. In respect of the position of the right pinch roller seat, ensure that the pinch roller is located outside the size of the scribed picture and have a distance of (10- 50) mm from the left edge of the paper. Their usage amount should be confirmed according to the size of the scribed picture.

2. Adjustment to the graver pressure

The graver pressure being too small, the knife tip can't cut into the plastic film, leading to the phenomenon of disability in penetration. On the contrary, the pattern scribed will deform and even the backing paper will be cut through.

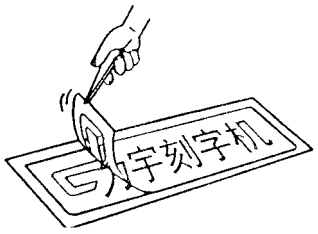
Through test scribing of the self-check pattern, suitable graver pressure and appropriate length of the knife tip will be adjusted, not only making the self-check pattern easy to lift and have no adhesion but also ensuring the backing paper won't be scratched and broken.

3. Uncovering words/ sticking words

After the pattern is scribed…

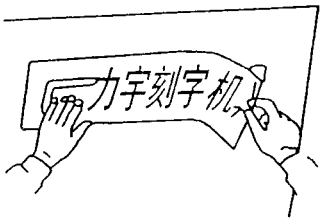
A. The part already scribed shall be cut with the scissors or the box cutter.

B. Then, it shall be laid flat on the table, and the unnecessary part shall be removed with the tweezers (for the convenience of removing the unnecessary part, a toss rack should be added to the outside of the text graphic when scribing).



C. The text graphic shall be covered with professional "sticking film", which shall be smoothed out with great strength (the scraper is preferred).

D. The "sticking film" is uncovered from the backing paper and pasted up anywhere you want to. Then, it is to be torn off.



4. After the completion of the work…

A. The handle of the pinch roller shall be lifted.
B. The paper shall be unloaded.
C. The graver base or the pen holder shall be disassembled, cleaned with soft cloth and kept properly.
D. The power supply shall be cut. In case that it would not be used for a long time, the power cable should be unplugged.
E. The machine shall be covered with the hood.

Chapter Six Introduction to and Operation of the Special Function

I. Brief Introduction to the Functions

The special functions of TC cutting plotter is Automark contour cutting. Contour cutting means that the cutting plotter, by cooperating with related software, scribes the patterns printed on such materials as sticky note, car sticker and reflective film along the edge of the pattern.

Automark contour cutting refers to the machine Automatic look for the mark points on the pattern during the cutting plotter's contour cutting process, so as to achieve the contour cutting of patterns.

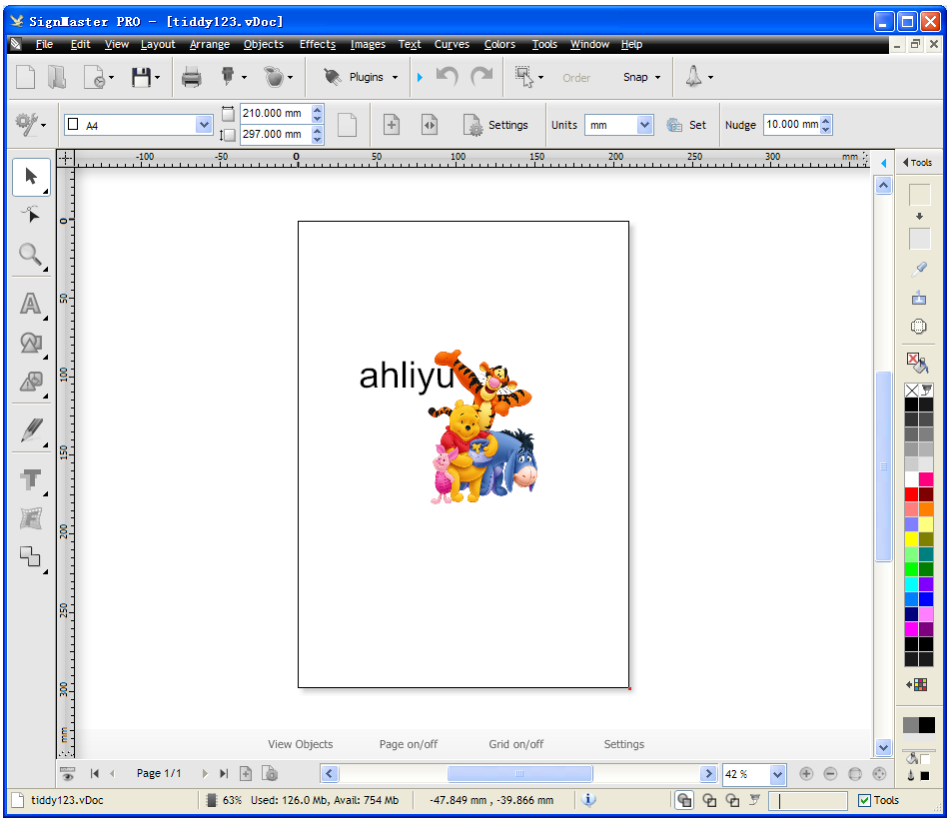
II. Frequently Used Software

The frequently used softwares for the cutting plotter to achieve the function of contour cutting are: flexistarter, signmaster, surecut, CorelDRAW, etc.

III. Operation Methods

The operation methods for different kinds of software differ a little, whose operating procedures are as follows:

1. The software is opened and the picture is imported. Part of the softwares can only add the outline to the pictures with the path, so the picture should be added with the path and be saved as the format with a path and then, be imported (such as EPS).

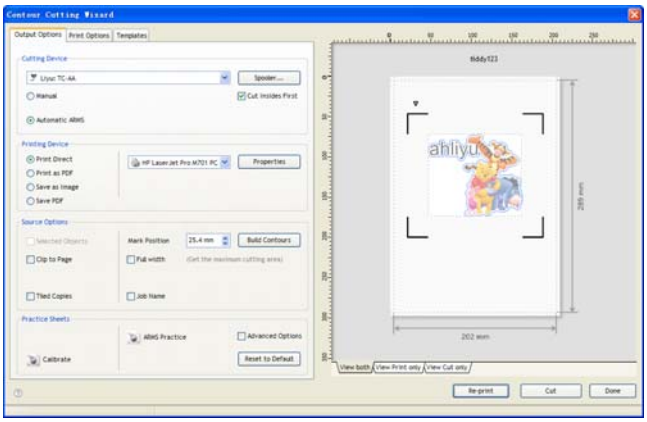


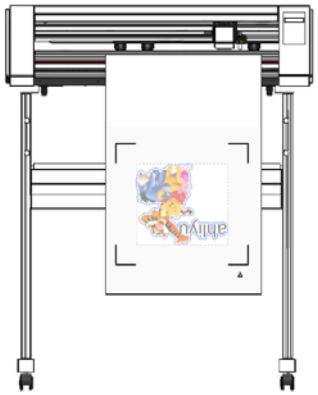
2. The outline and the marking point are added to the picture.

3. Printing the pictures. All common softwares support direct printing, but when the picture is too large to print with the printer, it can be made not to show the outline layer and be saved as another format (such as EPS), and then be printed with another

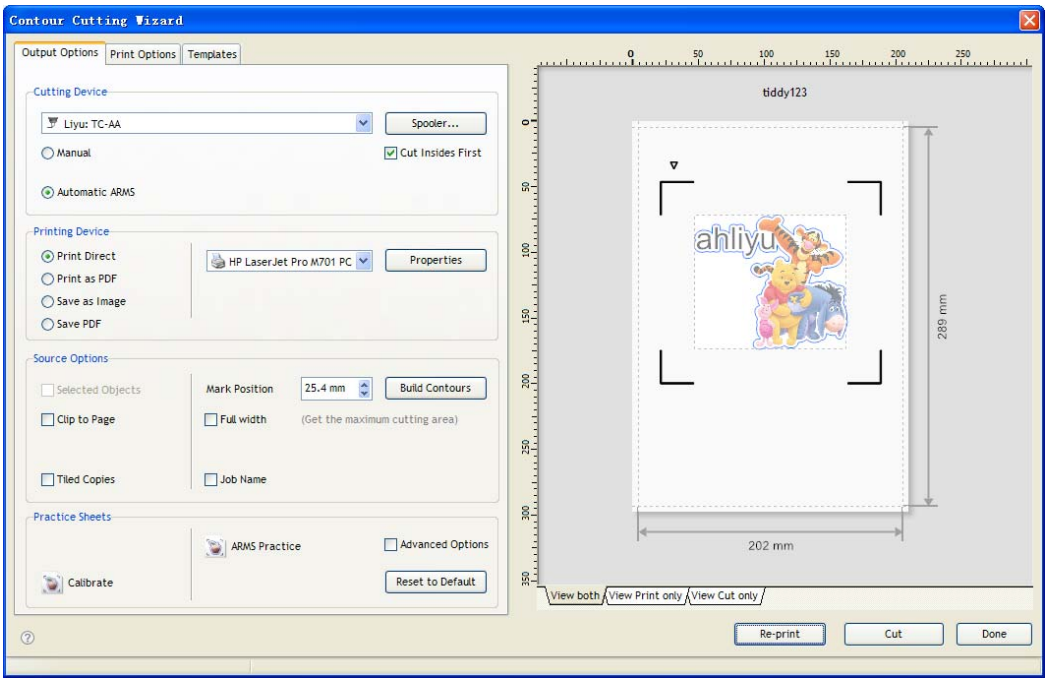
device (such as photo machine).

4. The picture is imported to the cutting plotter and then, the origin of contour cutting is re_set.





5. The operation of contour cutting. Different kinds of software differ greatly in the operation method. The detailed instructions should be found from the compact disk equipped at random in accordance with the software and be read carefully. Then, contour cutting is carried out according to the instructions.



6. Contour cutting is performed by the cutting plotter.

Different kinds of software differ a little in contour cutting. Their detailed operation methods are shown in the compact disk equipped at random (Catalogue: The documents "The method for Automark contour cutting with Signmaster software",

"The method for Automark contour cutting with Flexi-starter software" and "The method for Automark contour cutting with CorelDRAW software" in the address: …\The documents of the products\ Instructions on contour cutting\…).

Chapter Seven Answers to Frequently Asked Questions

I. What if the machine fails to enter the scribing mode?

1. The system files are destroyed, so the scribing system should be reinstalled with the system disk.
2. Check whether the scribing software is running by pressing Alt+Tab keys to switch the interface.

II. What if the item "scribing output" fails to work after entering the scribing system?

1. Check whether the encryption card or the dongle is installed correctly (refer to the software instructions).
2. If the installation is confirmed to be correct but the item "scribing output" in the scribing system still fails to work, please contact with your retailer or your software provider directly.

III. What if the cutting plotter has no response during scribing and output?

1. Check whether the cutting plotter is connected to the computer well.
2. Check whether the port setting of the scribing output is correct; requirement: the port setting in the output menu of the scribing software is consistent with the port where the computer is connected to the cutting plotter.
3. Check whether the model of the cutting plotter is correct during scribing and output.
4. Check whether the cutting plotter is under the on-line state.
5. The problem may lie in the scribing software, so please reinstall the software.
6. The output port of the computer is damaged.
7. In respect of the serial output with V6.2.0 version of CutterMaster, if such phenomenon appears, the problem can be solved by pressing Ctr+Alt+Del keys and closing the item with "no responding". For details, please refer to the instructions of CutterMaster.

IV. What should be paid attention to when scribing small characters?

1. When scribing small characters under 2cm, the speed of the cutting plotter should be adjusted to the lowest, because the gap between every stroke of the small character is comparatively small and the blade will raise the strokes and thus, cause substandard products if its speed is too high.
2. When scribing small characters with the cutting plotter, our recommendation is: the compensation function of scribing and output is used, and the sharp corner compensation value should be set in accordance with the actual situation, which is generally set between 0.3mm and 0.5mm. Like this, the effect of scribing and output will be better.
3. The extension length of the graver tip should be a little shorter than the normal position, which will make the small characters scribing much smoother.

V. What should be paid attention to when scribing large characters?

1. When scribing a word larger than the width of the cutting plotter, the system software will tear the word apart automatically. Splitting the pages by hand is also allowed, so that you can stitch every page together and form a large word. But the matter needing attention is that the setting of the output width should be consistent with the width of the sticky note in use.
2. When scribing large characters, the speed of the cutting plotter can be a little higher. Besides, during scribing and output, sharp corner compensation should be removed and meanwhile, seamless connection should be chosen.

VI. What if the sticky note can't be uncovered after scribing words?

1. The extension length of the graver tip is to be adjusted.
2. Before the output, appropriate adjustment is made to the length of the graver tip and the intensity of the graver pressure first, test carving is carried out until it is satisfying, and then, official carving is conducted.
3. If the dotted line appears when scribing words, the graver has been worn out for a long time of use. The graver is pushed out by pressing the bar of the cutter bumping and replaced with a new knife for a try. Being an emergency method, a small piece of leather can be used to polish the knife tip just like polishing the razor.
4. If such a phenomenon that one side can be uncovered while the other side can't after scribing, maybe the extension length of the knife tip is not suitable, or the mound layer is uneven or damaged.

VII. What should be paid attention to when scribing words of a super-length printing size?

When scribing words of a super-length printing size, the paper should go through pre running first under the "off-line" state. Our recommendation is that scribing by segmentation is preferred when segmentation is allowed by the printing size.

1. The two edges of the paper is aligned with the same positions of the rulers pasted up on the front and back of the cutting plotter, and the pinch roller seat is pressed down.
2. Under the "off-line" state, by pressing "↓" key, the cutting plotter will push the paper to walk the same distance as the length of the printing size.
3. By pressing the "off-line" key, the paper will return to the original position. At this moment, actual scribing can be implemented.

VIII. Why drifting happens?

1. The pinch roller is used incorrectly.
2. The pinch roller is worn severely.
3. The paper fails to be placed straightly.

4. The paper didn't go through pre running when scribing words of a super-length printing size.

IX. Non-fault phenomenon

1. The cutting plotter can reset immediately after the power is on. By pressing "Reset" key, it will return to normal.

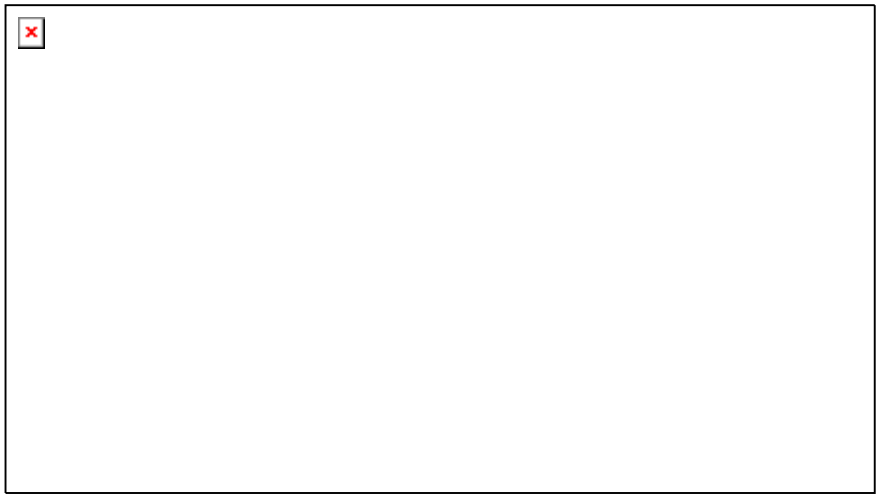
Appendix

Appendix One: The Performance Parameter Table of the Cutting Plotter

Variety	Model	TC series		
	Specification	631	801	1261
The maximum width of carving		615mm	785mm	1245mm
The widest paper for entering		710mm	880mm	1340mm
Speed		TC: 500mm/s		
Knife pressure		50-500g		
Mechanical resolution		0.025mm/step		
Buffer memory		1Gb		
Repeated accuracy		0.125mm		
Motor		Stepper motor subdivision cross-flow drive		
Interface type		1. Compatible RS-232 2. Compatible USB		
Language format		DM/PL, HP/GL		
Power Supply		AC220V,50Hz		
Working environment temperature		0 ～ 35℃		
Working environment humidity		5% ～ 95%（free of condensed water）		

Note: The above technical specifications may change without further notice.

Appendix Two: The Machine Size Chart of the Cutting Plotter



Model	TC631	TC801	TC1261
L	904	1074	1534
L'	800	970	1430