

PP2512/KM512

Installation Manual

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Catalogue

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Flora Digital Printing System

Flora Digital Printing System, reserves the right to make changes without prior notice to the specifications and materials contained herein and shall not be responsible for any damages (including consequential) caused by reliance on the materials presented, including but not limited to typographical, arithmetic, or listing errors.

This equipment has been tested and found to comply with the limits for a class A digital device. Pursuant to part 15 of the FCC Rules, these limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment.

This equipment generates, uses, and can radiate radio frequency energy and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference, in which the user will be required to correct the interference at his own expense.

This printer is a color inkjet printer that uses a UV-curable ink, supports up to 2500mm of media width, and has one built-in USB interfaces.

The following items should be read before proceeding to Section 1;

- Contents of the package
- Safety precautions
- Handling precautions
- Notion

Notice: Read these items to use the printer safely and properly. Keep this manual in a place where you can quickly access it any time.

Disclaimer

This is an alpha release of the User's Guide for Flora PP2512UV/KM512 printer. We have made every effort to guarantee the accuracy and integrity of the information in this manual. If you find some errors or omissions, please bring them to our attention so we can check and correct them accordingly.

This manual can be used as a reference for operation and routine maintenance of the Flora PP2512UV/KM512 printers. It can't be a replacement for the formal training provided by Shenzhen Runtianzhi Digital Equipment Co., Ltd, regarding on how to operate the printers properly. Shenzhen Runtianzhi Digital Equipment Co., Ltd will not take any responsibility for the consequences of misusing this manual and appendix.

About The Manual

The manual provides the end user all the information related to the machine basic functions, software installation, and print head installation of Flora PP2512UV/KM512.

Chapter 1 Safety Operating Instructions

1.1 Brief Introduction

This chapter introduces the important safety information. Please read and understand the safety information carefully before operating the printer.

1.2 Safety Information

Flora printer uses the following chemical substances

- ✓ UV curable Ink
- ✓ Cleaning liquid (Flush)

Solvent and Ink Properties

- Solvent and Ink are flammable.
- Eye contact with the ink and solvent will break the cornea and weaken the eyesight.
- Wear gloves while flushing print heads, ink tube or moving the ink bottles or containers.
- Solvent and ink can be irritating to eyes, throat and skin. Inhaling the ink fumes would result in swoon or other symptoms.
- Solvent vapors are heavier than air and may flow and gather in low spot.



This caution symbol represents danger. If this sign is ignored it may lead to serious injury or damage to the printer.

Danger of Fire and Explosion

- Open flames, heat energy or spark around the printer can trigger fire and explosion.
- No smoking, pilot lights, open flames, stoves, heaters or halogen lights should be turned on within 5m distance from any edge of the printer.
- No portable spark-producing equipment (static, electrical or Mechanical) within 5m distance from any edge of the printer.

Proper Ventilation and Exhaust System

- The vacuum exhaust system must be functioning before the printer operates.
- Do not ignore this safety warning sign to avoid accumulation of flammable fumes in the area.

Ink and solvent spillage, a potential risk of Fire and explosion

- Store ink and solvent in proper cabinet for flammable liquid storage.
- Keep ink and solvent containers tightly closed at all times. If a container has sign of damage/leakage, fix or replace it immediately.
- Clean ink or solvent spillages as soon as possible.
- Only use dry powder, or carbon dioxide type of fire extinguishers.

High voltage may shock people or trigger a fire

- If there's no emergency power switch which can shut down all the power, do not connect the printer to main-power supply.
- When the machine's power is on, do not open the back cover of machine, or avoid touching electrical parts.
- The printer or other equipments should be grounded, according to the local safety electrical connection regulation. The ground voltage should be less than 3 V.
- Set the machine on smooth ceramic tile or cement ground

- Use specified anti-static floor mat to minimize harmful static build-up.

Printing media rolls are bulky and very heavy

- Wear hand and foot safety protection gear when loading, unloading and handling media to avoid serious body injuries.
- Use proper heavy duty handling equipment if available.

1.3 Fireproofing

Ink and solvent should be clearly labeled and stored in a specific area for flammable liquid and should be in accordance with local regulations of fireproof and safety standard. Ensure that the specified fire extinguisher is always available near the storage area and should be cleared from any obstacle in case of emergency.

1.4 Exhaust System

The printing area should be equipped with sufficient exhaust system. The exhaust should be installed in such a way build up of fumes is minimized. Best location for the exhaust should be at lowest level, this way the fumes build-up is minimized. Solvent fumes are heavier than air, so fumes build-up concentrates on the lower level of the room.

1.5 Handling Precautions**Power Supply**

- Install the printer near an easily accessible electrical outlet.
- Do not provide power to the printer through the same power line as for other noise generating devices such as motors.
- Use a power supply matched with the printer specification.
- Connect the power cable directly to an electrical outlet. Do not plug several devices into one electrical outlet.

Printer Placement

- Do not place anything on top of the printer.
- Do not rest you elbows on the printer.
- Open and close the top cover gently from the front of the printer with both hands.
- Before connecting or disconnecting the interface connector, turn the printer OFF.
- Do not clean the surface of the cover with benzene or paint thinner. The coating may come off or deteriorate. Wipe the cover with a soft cloth, if the cover is very dirty, use a cloth moistened with a neutral detergent.
- Do not touch the ink jet head surface.

1.6 Regular Inspection and Maintenance

The following regular inspection and maintenance must be performed in terms of characteristics of the solvent ink:

- Clean the carriage unit and the printing platform surface every day.
- Make sure that the carriage covers are always replaced.
- Perform ink supply circuit and print head cleaning when leaving the printer for a long time (1 week or more with no power).
- Perform head cleaning after leaving the printer idle for a long time.

1.7 Consumables

- Always use the recommended consumables (printing media, ink, ink filters). Failure to follow this instruction may cause poor printing quality and breakdown.
- Do not use ink past the expiration date as this may cause a print head breakdown and poor printing quality.
- Put a used ink bottle into a plastic bag and dispose of it as an industrial waste. Observe local regulations for

disposal of waste ink bottles.

- Avoid spilling ink into your skin or clothes. Wash any ink off immediately with soapy water.
- Check the waste ink container everyday so as not to permit waste ink to leak from you printer.
- If the waste ink container is being installed or removed, spread a stain preventing sheet so as not to stain the floor with spilled ink.

Chapter 2 Preinstall

This is a pre-install guide for Flora PP2512UV/KM512. Customers are recommended to prepare the room and other necessary devices before the machine arrived and installation. We have made every effort to guarantee the accuracy and integrity of the information in this guide. Should you find some errors or omissions, please bring them to our attention so we can check and correct them accordingly.

2.1 Getting Started

This section provides the necessary information to preinstall the printer. Familiarize yourself with the basic of the printer before reading Section 2.

2.2 Operating Conditions

This section describes the operating conditions for the printer.

Unload Space and mechanical requirements

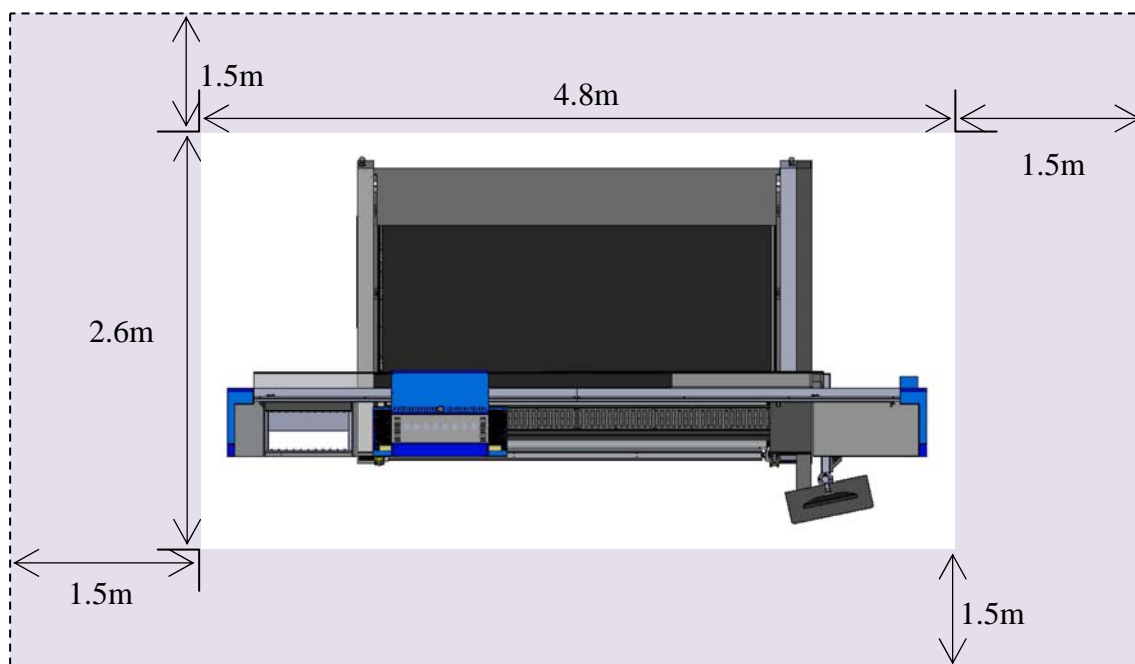
Unload space: The space must be two times of the box's size, for the convenient of unload and unpack.

Unload equipment: Fork truck (Bearing capacity referring to the weight of the machine. The length of fork must be 15 cm longer than the width of the box)

Installation Space

There must be sufficient space around the printer for the replacement of frequently used parts, for the output of the printed media and for ventilation. In addition, maintenance space, shown below, is required to repair the printer or replace components.

There should be at least 1.5 meter space on X axis, Y axis and Z axis.



Notice: On Z-axis, the height is 2.15m.

Environment Conditions

The printer should be used within the temperature and humidity ranges as shown below

- ◆ Temperature: 20 °C to 30 °C
- ◆ Humidity: 40% to 70%

Note: When the operating temperature is lower than 20 °C or higher than 40° C, printing speed should be reduced to two-thirds of normal print speed to maintain good print quality.

Places where the printer must not be installed

Do not install the printer in the following places:

- A location near a fire
- Places exposed to direct sunlight
- Places subject to vibration
- Places with excessive dust
- Places subject to extreme changes in temperature or humidity
- Places near an air conditioner or a heater
- Places where the printer may get wet
- Places near a diazo copier that may generate ammonia gas
- Places with poor ventilation
- Unstable place

2.3 Electrical connection requirements

System power specification	
Rated voltage	220VAC (±5%)
Rated current	32A
Input power frequency	50/60HZ
Phase	Single-phase
UPS	10KW

Electrical Safety:



- The machine should be grounded, according to the local safety electrical regulation.
- The grounding should be less than 3V.
- Use specified anti-static floor matting to minimize the harmful static buildup.



- Use ESD Ground Strap when handling Print heads and any Electronic Boards to avoid any electric static discharge that may damage these parts.
- Do not open the cover where electrical spare parts are located to avoid possible electrical shock.

Notice: UPS is recommended to keep supplying stable power to the machine!

2.4 Air requirements

If your machine is configured with Roll to Roll System, a compressor is necessary to supply air for the model

Technical specifications:

Power	5.5KW
Air flow	0.6m ³ /min
Pressure	>8bar
Capacity of gas tank	100L ~ 150L

Notice: Above specifications all passed testing in factory.

2.5 Computer Configuration Request

Before you begin installing the software, read the hardware requirements below. For optimal performance we suggest that your system meet the recommended requirements. As with all computer software, systems with faster processors, more RAM, and greater amounts of storage space allow you to work with larger files and keep your processing time to minimum.

Ripping Software	PhotoPRINT Server Flora Edition 10.5.1
OS requirements	Windows XP; Windows 7® 32bit & 64bit
Hardware requirements	<ul style="list-style-type: none"> ● Intel(R) Core™ i3-2120CPU @3.30GHz 3.29GHz ● 4G RAM ● 500G Hard disk ● DVD-ROM ● USB 2.0 port(at least 2)
Recommend Brand	Lenovo, Dell

Notice: The computer must meet the minimum PC specification requirement to be used, above is used to test in our factory! Recommend to use Brand Computer.






Chapter 3 Pre-installation Instruction

This chapter introduces the important pre-installation procedure. Please read and understand carefully before operating the printer.

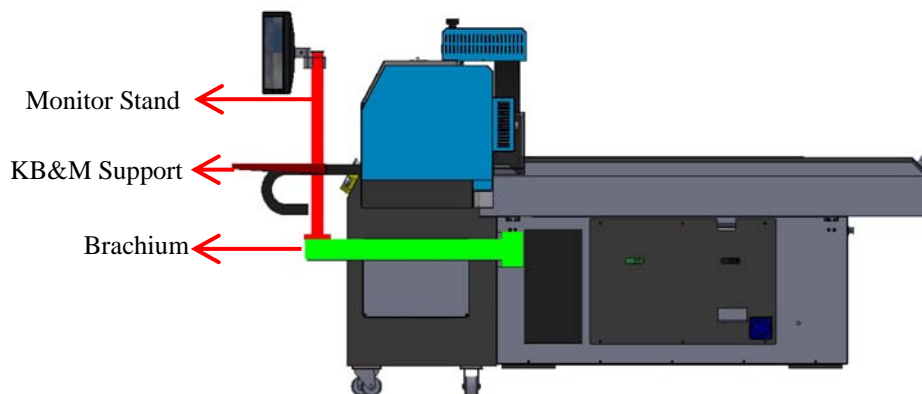
3.1 Part Installation

Because of the limitation of the box, some parts can't be assembled on the machine. The first thing need to do after unpacked the machine is to install these parts.

Part List:

Part Name	Description	Photo	Quantity
KeyBoard & Mouse Support	The platform is used to carry the keyboard and mouse		1 pcs
Brachium	The part is used to fix the monitor stand		1 pcs
Monitor Stand	The part is used to hold the monitor		1 pcs
Body Cover	Cover and protect the inside part		2 pcs
Foot Cup	This is fixed at the bottom of roller support to keep the balance		2 pcs

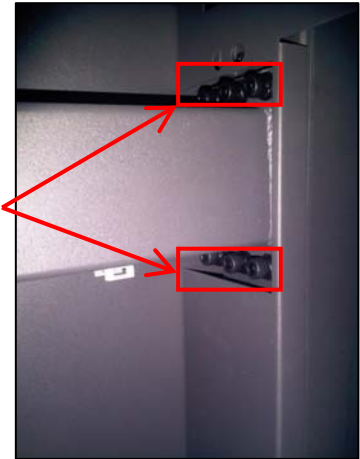
3.1.1How to install the mouse & Key board Platform



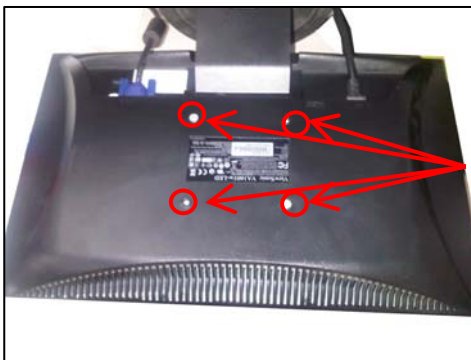
1. Fix the Brachium with six Inner hexagon screws
2. Fix the monitor stand on the brachium with 4 sunk screws



Inner Hexagon
Screws
Sunk Screws



3. Fix the Key board support on the monitor stand
4. Fix the monitor on the stand



Screw Hole

Monitor Back View

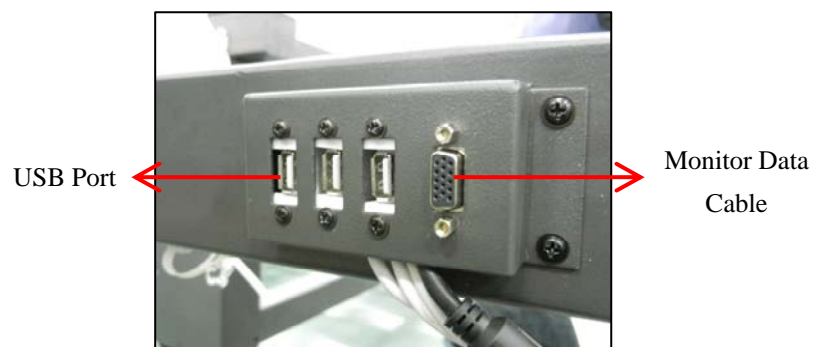


Set Screw



Completed View

5. Connect the mouse, key board USB cable and image data cable of monitor with transfer port which is fixed on the brachium.



6. Set the computer into the left compartment, and connect the power cable of PC and monitor with built-in socket.



PC Compartment



Socket

3.1.2 How to fix the foot cup

The foot cup is applied to **roll to roll system only**. When move off the printer, before set down the machine, the two foot cups must be installed



Roll to Roll Front View



Foot cup and Trundle Enlarge View

3.1.3 Fix the Rubber Protector

During the transport, the right rubber protector has been removed to fix in the middle to fasten the carriage. When unpacked the machine, this protector should be move to the right side.



Rubber Protector



Right End Position

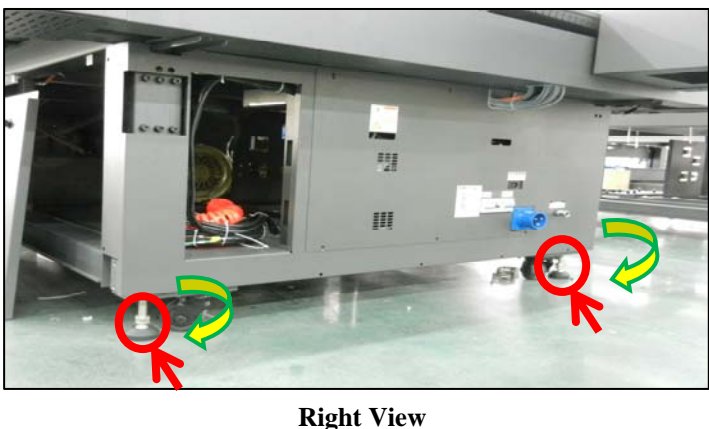
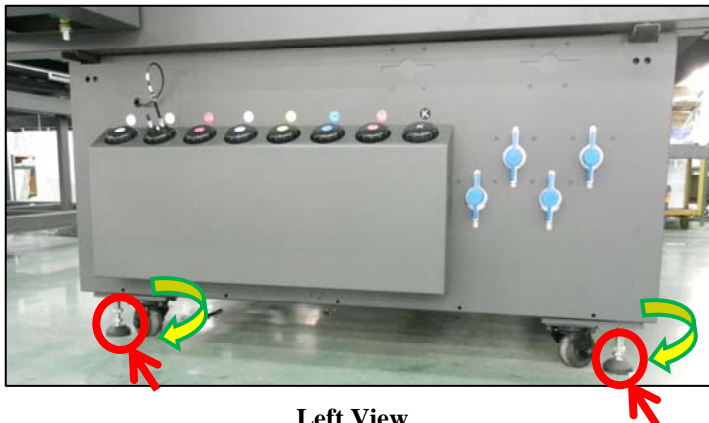


Middle Position

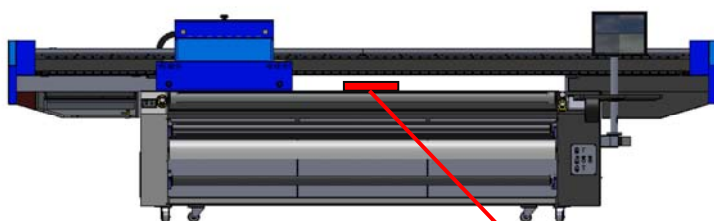
3.2 How to level the machine

Machine balance is the most important thing to do before debug the machine. It is the guarantee to get best quality and perfect media feeding. And if it is unlevelled, it may cause media wrinkle.

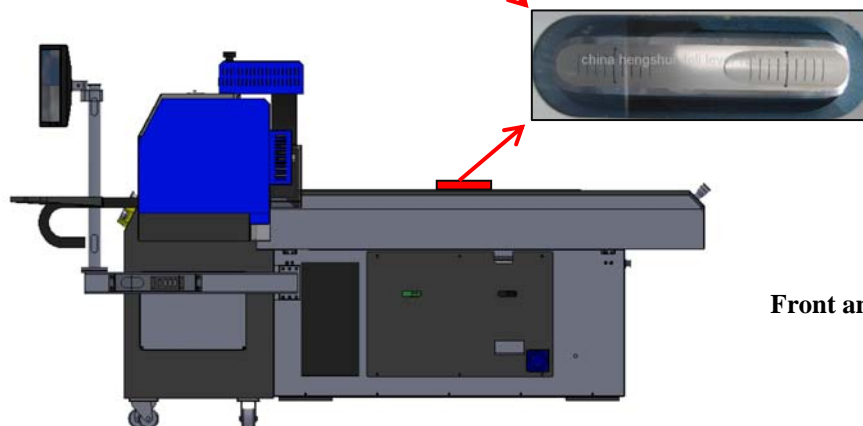
There are totally 4 foot cups for each machine. Each side has two cups as below.



The balance should be adjusted in two directions as below. The checked points refer to attached photo.



Left and Right Balance



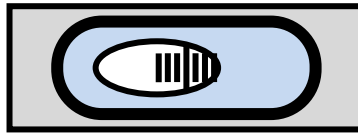
Front and Back Balance

1. Set all foot cups down to the ground, refer to above photo;
2. Put one external air bubble (The longer of the air bubble level, the higher precision of the balance) in the middle of printing platform. Check the air bubble level if it is in the middle. If not, you should put down the side which air bubble going;

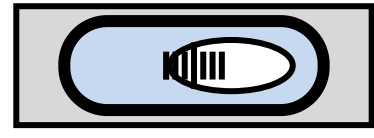
E.g.: If the air bubble is on the left side, the right side should lift up. Or you may set the left side down



Good Balance



Right Side Need Up



Right Side Need Down

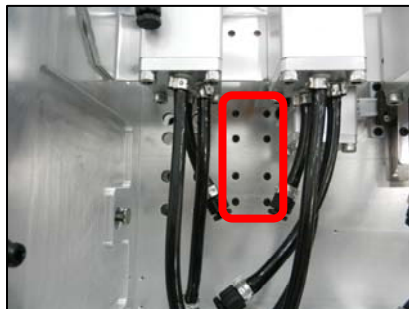
3.3 How to level the carriage

Carriage balance is the key point to get perfect quality. Bad level will cause the different print head located different height.

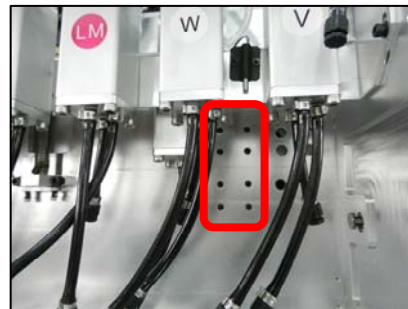
The carriage checking should be performed in three points: left side, in the middle, right side.

The standard gap is 2mm. Recommend range is **1.5mm < Gap < 5mm**. It depends on the media.

1. Move the carriage manually to check point on top of flatbed;
2. Loose the 16 screws for fixing the bearing, each side has 8 screws;



Carriage Inside Left View



Carriage Inside Right View

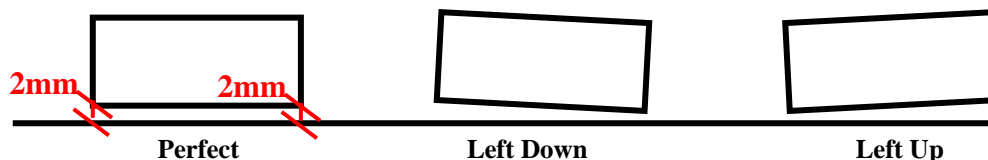
3. Rotate Height adjust Knob to move the carriage down till it can't move. Then the carriage print head mounting plate will be parallel to the flat bed.



Carriage Front View

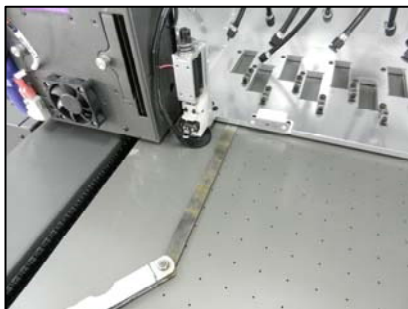
4. Lock all the screws, finish roughly adjustment.

In theory, the carriage gap with flat bed should be the same. But in fact, it is not. The Max tolerance is **0.5mm**; If it is over than 0.5 mm, the output quality will be lower.



If one side gap is much bigger than the other side, you should follow below procedure to adjust it:

- a) Lift the carriage up a little, insert the filler gauge into the gap. Check the gap on both sides as below.



Left Side with Filler Gauge inserted



Right Side with Filler Gauge inserted

- b) If the right gap is different from the left one, loose all the screws gently, then lift the low side up a little manually till it is perfect.

3.4 How to connect power

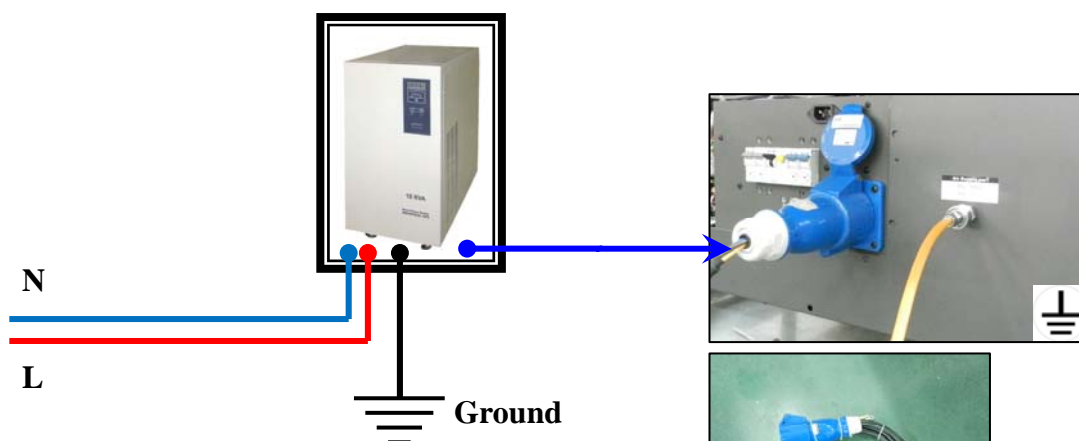
There are two power inlets: one is for system power, the other one is for UV lamp power supply.

For system power, between the power supply and machine, one **10KW** UPS should be linked to supply stable power. It helps to protect the printing system when power outage, especially the print head.

Notice: The machine must be well grounded.

Check the resistance between Null Line and Earth Line . It should be $< 4 \Omega$ when well grounded.

Or the voltage between Null line and Earth line should be less than 3V





The machine enclosure should be grounded also.

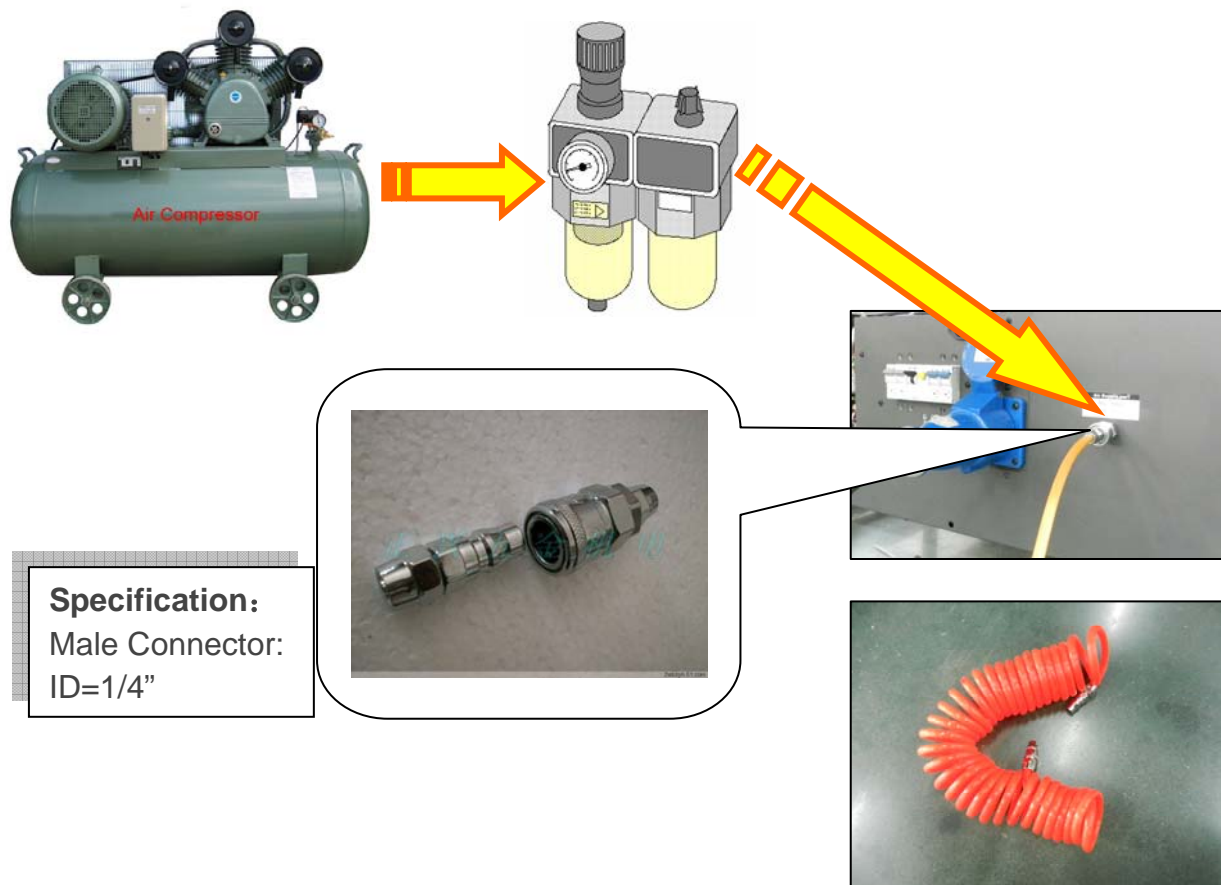
3.5 How to connect air

For Flora PP2512UV series, roll to roll system is pneumatic device. So one **>8bar** air compressor is in need.

The pressure and capacity of gas tank must be sufficient to support the machine.(Please refer to Chapter 2 for

more details)

-  It is better not to share the air compressor with the other machine;
-  Air filter is necessary to filter the water. Too much water in air line will affect negative pressure.



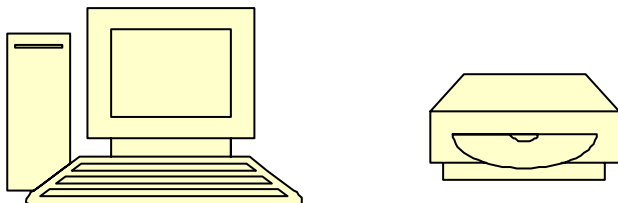
Chapter 4 Software Installation Procedure

This chapter introduces the PhotoPRINT and Flora Driver installation procedure. Please read and understand carefully before operating the printer.

4.1 PhotoPRINT 10.5.1 Installation

Flora machine takes PhotoPRINT 10.5.1 as the ripping software.

1. Turn-on the Main Power to give power to the PC and Monitor.

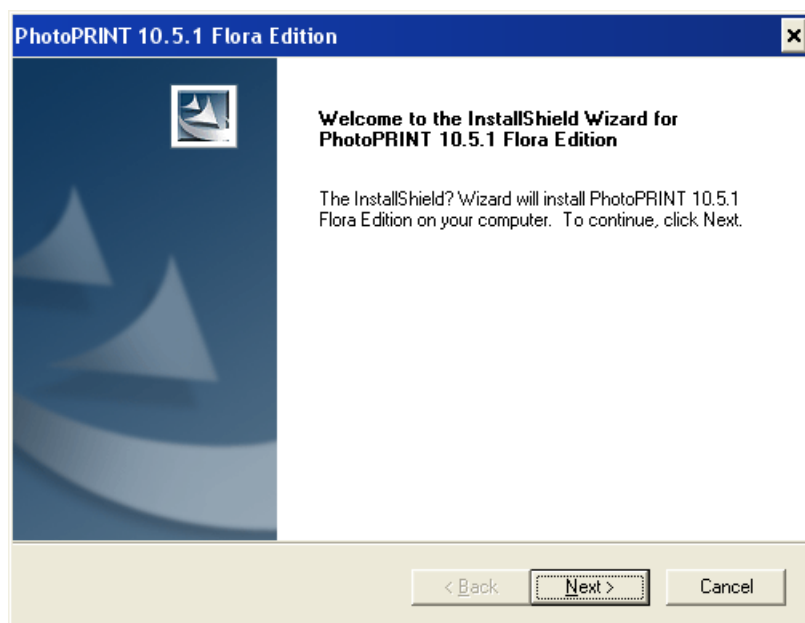


2. Insert the CD supplied with the machine with label PhotoPrint 10.5.1 for the necessary installation.

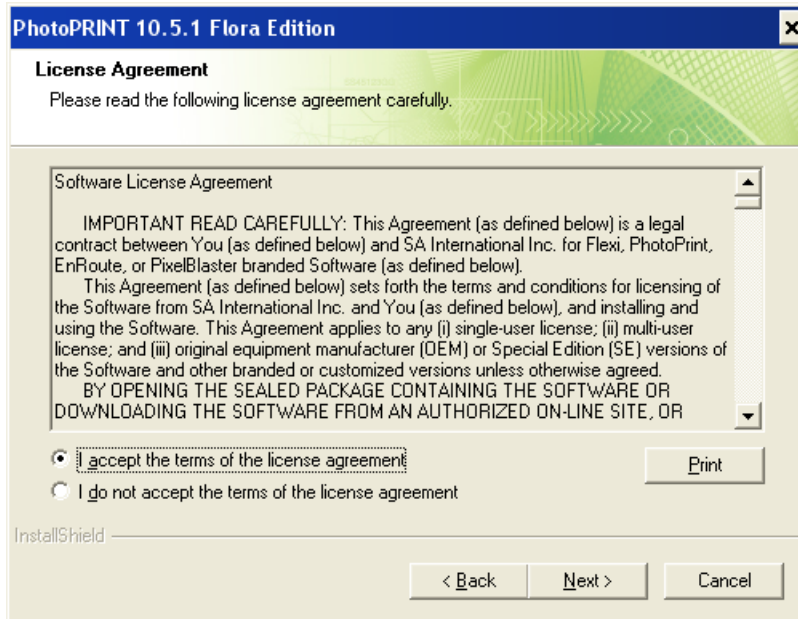
Notice: If the CD is broken, or you need update the new version. Please contact with Flora sales for the user name and the password to download from FTP.

Website: <ftp.floradigital.com.cn>

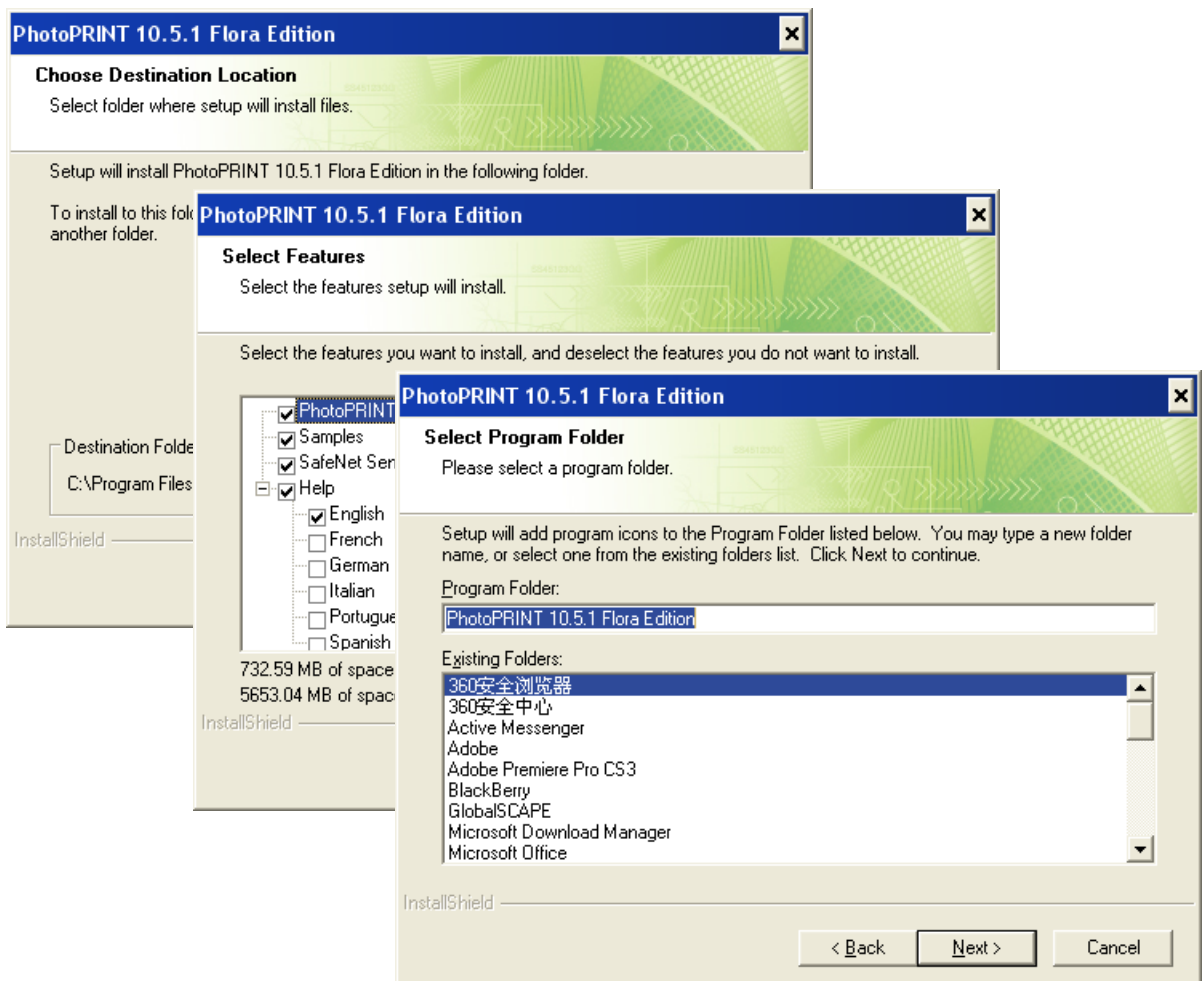
3. The screen will prompt you with **【Choose Setup Language】** window; Select which language you will use. Then click **“OK”**. Then with Starting **【InstallShield Wizard....】**



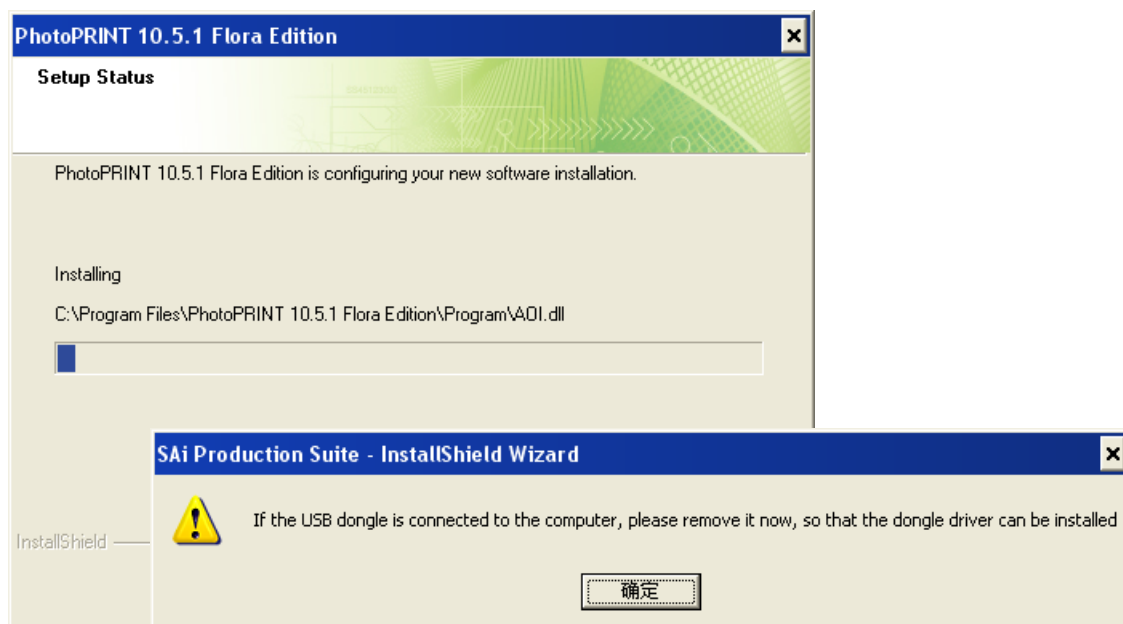
4. The Application Installer Setup will now prepare the Install Shield for the setup process, then click **“Next”**. You will get a window for **【License Agreement】**, please choose **“I accept the terms of the license agreement”**, then click **“Next”**;



5. Then **【Choose Destination Location】**, **【Select Features】** and **【Select Program Folder】** screen window will show up as below. Keep default setting, click **“Next”**;



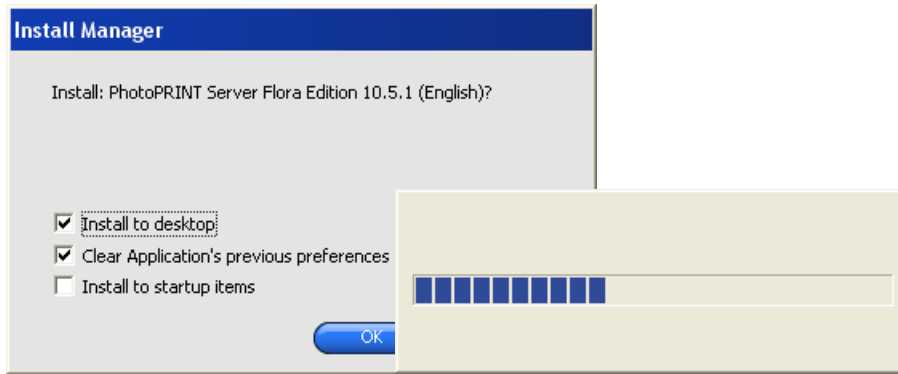
6. Then you will get a window for **【Setup Status】**, the PhotoPRINT is configuring new software installation till it pop out dialog as below:



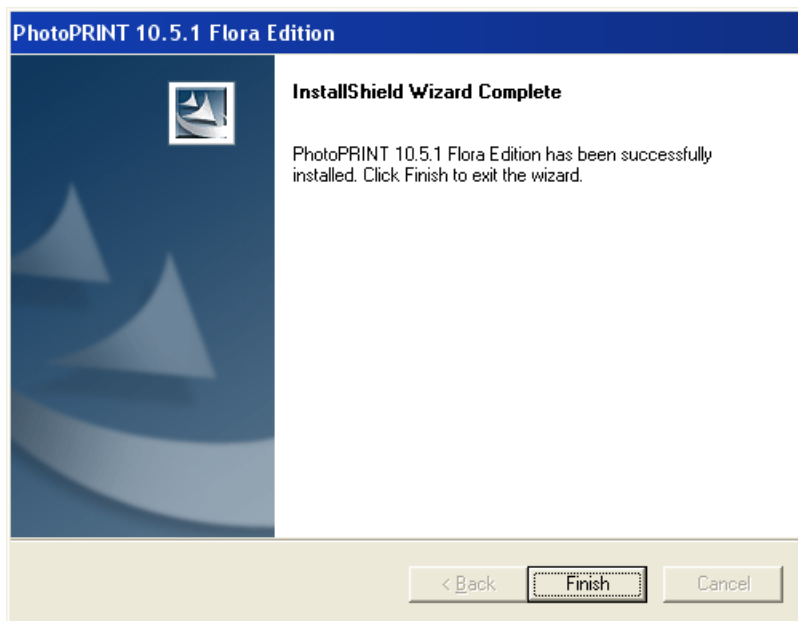
7. Check if the USB dongle is inserted. If yes, remove it. Then click **“Yes”**;
8. The **【Product Selection】** window will come in after that. Please enter password which you can find from the dongle bag. And then choose **“PhotoPRINT server Flora Edition 10.5.1”** from Product, click **“Done”**;



9. Tick the **“Install to desktop”** selection on **【Install Manager】** window. Then click **“OK”**, software files will now start to install;



10. Click **“Finish”** after completing the successful installation.



4.2 Flora Driver Installation

1. Insert the Flora Driver. From the list of Folder under Print Driver, select corresponding machine model (Eg: Flora_PPKMUV_Newusb_v2.0.0.0(20121210)_32bit.exe). Then double-click the setup file;

Notice:

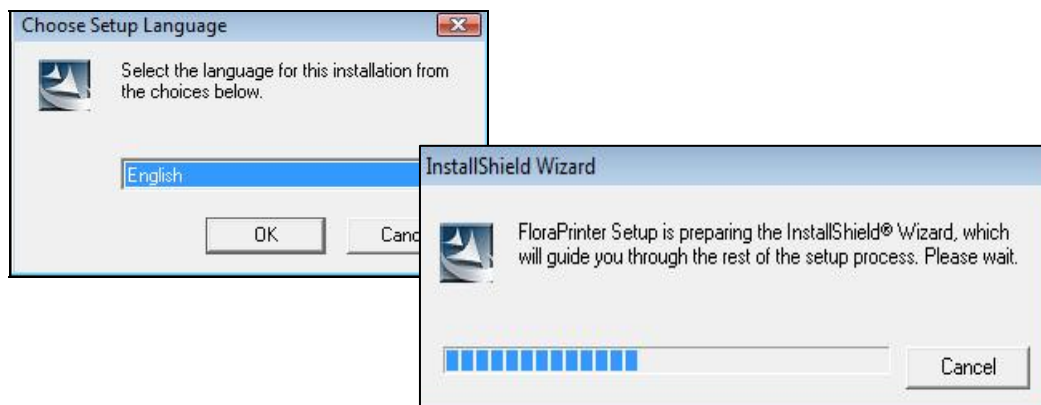
If the OS system is 32bits, please install the driver which has 32 in the driver name
(E.G. Flora_PPKMUV_Newusb_v2.0.0.0(20121210)_32bit.exe)

If the OS system is 64bits, please install the driver which has 64 in the driver name
(E.G. Flora_PPKMUV_Newusb_v2.0.0.0(20121210)_64bit.exe)

2. Files will be extracted and later on **【Welcome】** window will appear. Click **“Next”**, coming with **【choose setup language】** window, select you language then click **“Next”**;

Notice: If the CD is broken, or you need update to new version. Please contact with Flora sales for the user name and the password to download from FTP.

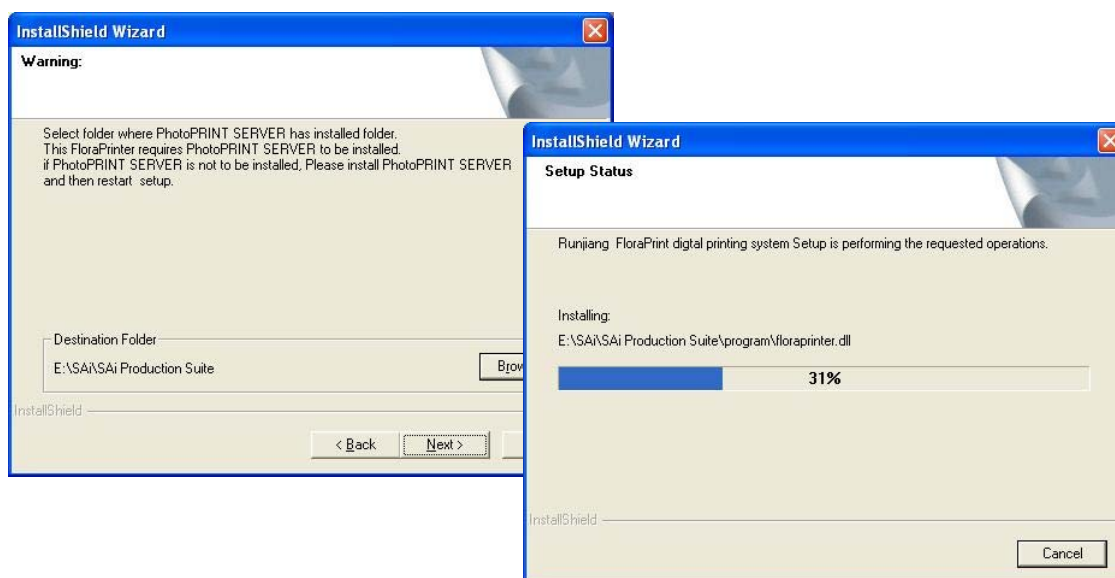
Website: ftp.floradigital.com.cn



3. Click “Next” when 【InstallShield Wizard】 window. Then 【Select Model】 window will appear. Choose the particular model of the machine you are about to install, then click “Next”;



4. The software will now start to detect the specified destination folder, if it is not auto detected, you need to Browse **C:\Program Files\PhotoPRINT 10.5.1 Flora Edition**. Click “Next” to initiate the installation process;



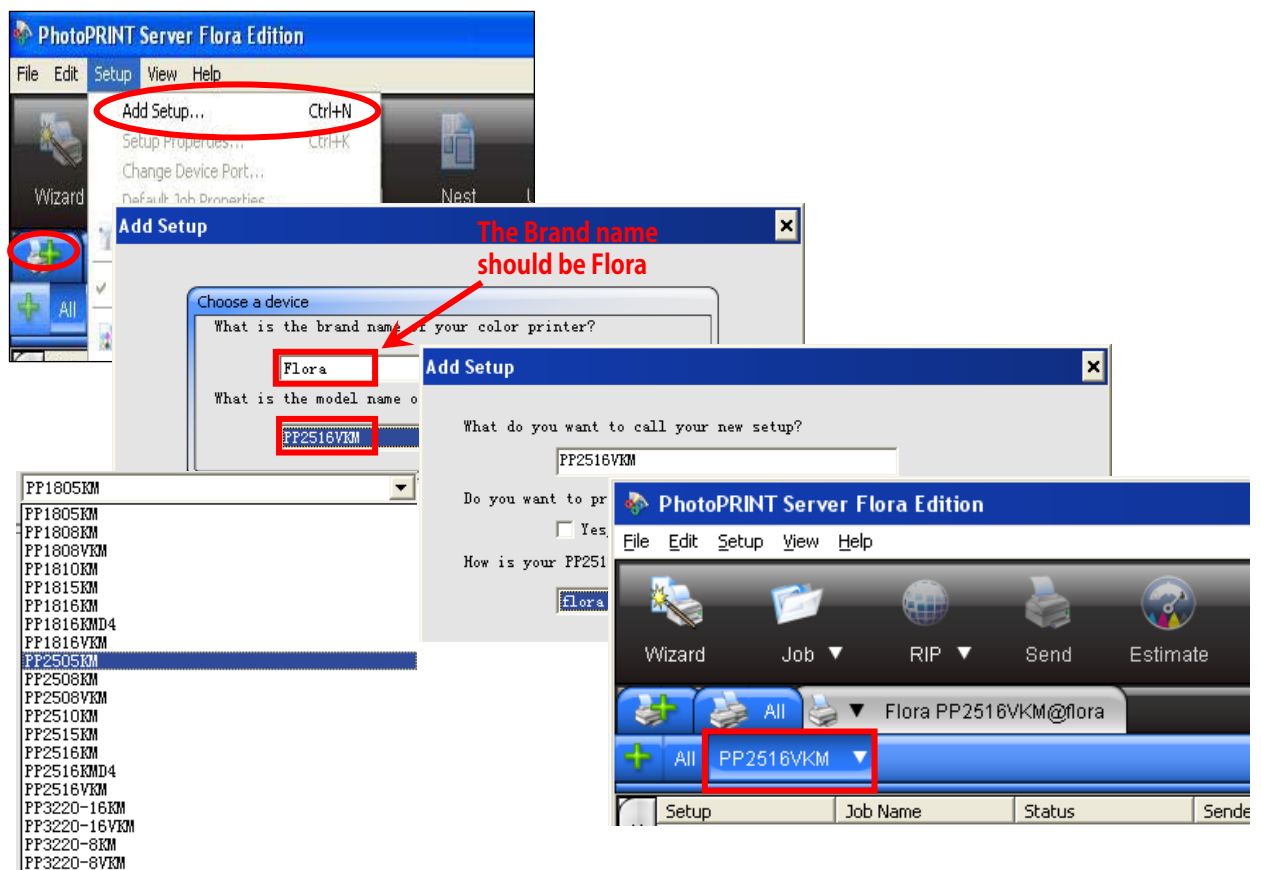
- Click **"Finish"** after the successful installation and restart your computer;



4.3 Add Setup

- Find the PhotoPrint 10.5.1 on the desktop and double click to open;
- If it is the first time your install, it will prompt you to add your setup,

If not, you can click **"Add Setup..."** from **"Setup"** menu, or you can click add setup icon directly



- Then select the brand name of the printer (**Flora**) and the model name (**E.g. PP2516VKM**). Then click **"Next"**;

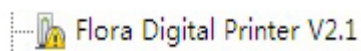
Print Head No.	Model Name	Printing Control Board Channel Connection															
KCMY	PP2505KM	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16

KCMYW		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLm		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLmW	PP2508KM	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLmWW		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYWV		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLmWV	PP2508VKM	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYx2		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYWx2	PP2510KM	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYx3		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYWx3	PP2515KM	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLmx2		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLmWx2	PP2516KM	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLmWWx2		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYWVx2		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
KCMYLcLmWVx2	PP2516VKM	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16

- Click **"Finish"** after the final process. Then you can find the device. If the setup is successful the installed device or printer will be shown on the PhotoPRINT GUI.

4.4 USB Driver Manually Installation

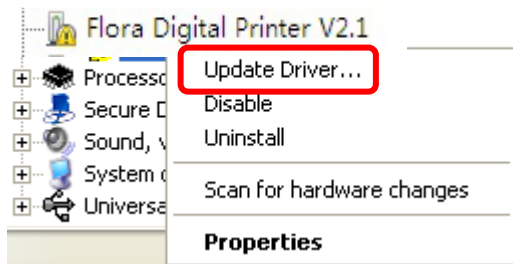
If the computer OS is Win 7, the USB driver will be installed automatically when installing Flora driver. If the computer can't connect with printer, please follow below procedure to check it.



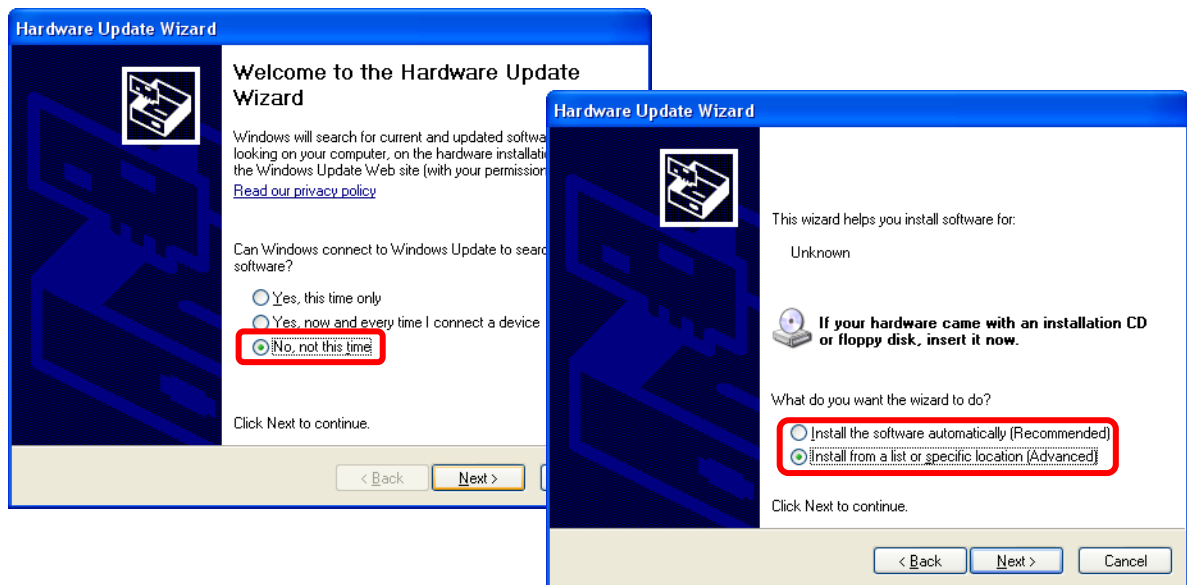
If the computer OS is Windows xp, then you need to manually install the USB driver as below.

Notice: Whatever Win XP or Win 7 OS, you should use only **Administrator Account**. You can't use any other account even with administrator authority.

- For PP2512UV/KM512, there are two configurations: 16 heads and 8 heads.
16 heads machine has two USB Boards, and 8 heads machine has only one USB Board
- Go to **【Device Manager,】** you can find that the hardware name Flora Digital Printer V2.1;



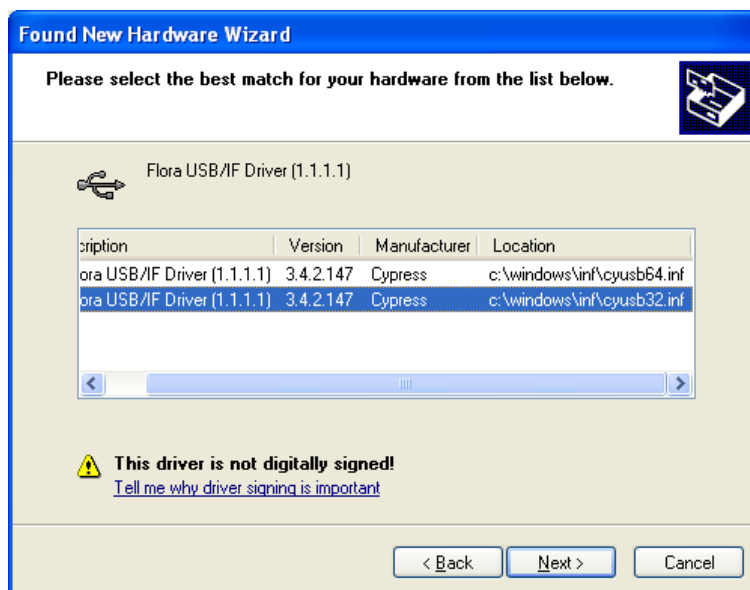
3. Right click on this option, and select “**Update Driver...**” as above. It will pop out **【Hardware Update Wizard】** windows as below;



4. Check radio box “**No, not this time**”, then click “**Next**”. It will pop another window as above;

✚ If you check “**Install the software automatically**”:

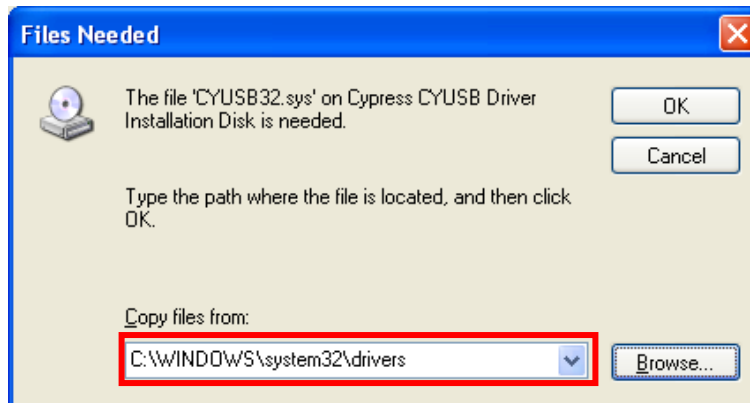
- 1) Click “**Next**”, it will pop out one **【Found New Hard Wizard】** as below:



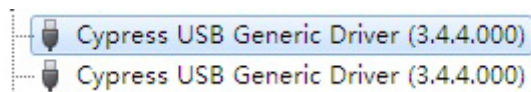
- 2) Choose the driver according your OS. If it is **32bit**, choose **CYUSB32**, or choose **CYUSB64**;



- 3) Click **“Continue Anyway”**;



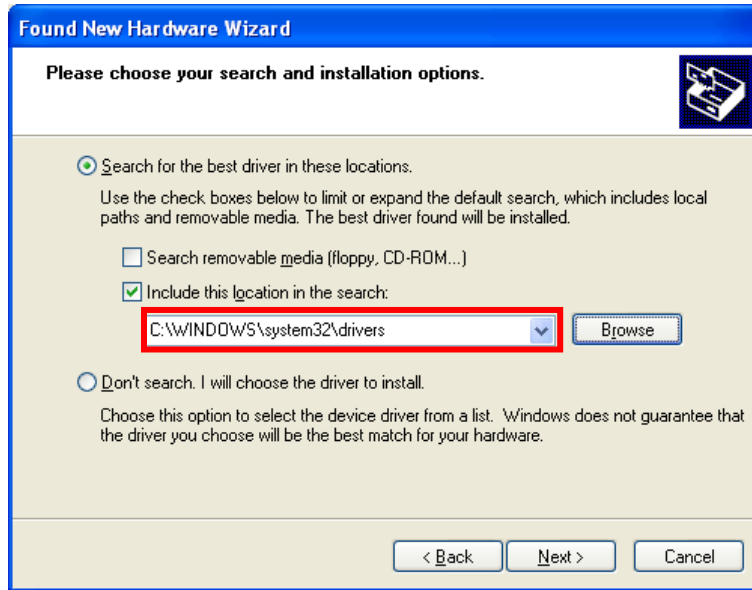
- 4) Browse the installation folder, **C:\WINDOWS\system32\drivers**. Then you will get the Cypress USB Generic Driver (3.4.4.000) under Universal Serial Bus Controller;



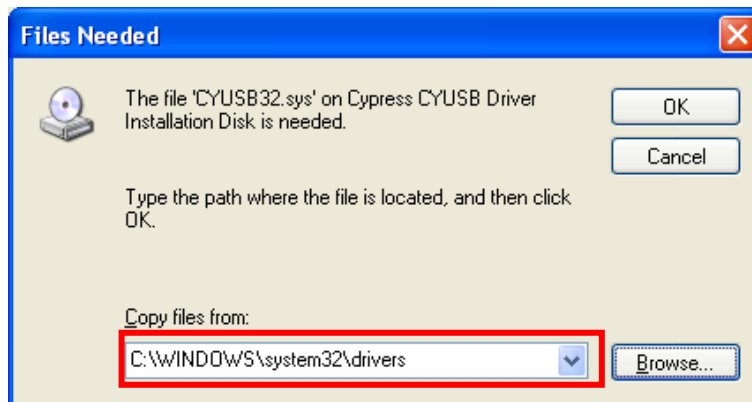
- 5) Finished!

 If you check **“Install from a list or specific location (Advanced)”**:

- 1) Click **“Next”**, it will pop out one **【Found New Hard Wizard】** as below:



- 2) Check “Search for the best driver in these locations”, then Browse **C:\Windows\system32\drivers**, Click “Next”;



- 3) Browse the installation folder **C:\WINDOWS\system32\drivers**. Then you will get the Cypress USB Generic Driver (3.4.4.000) under Universal Serial Bus Controller;
- 4) Finished!

Chapter 5 Print Head Installation Procedure

Print head installation is one of the important procedures. Please read this chapter carefully before you installing the print head.

5.1 Handling Precautions

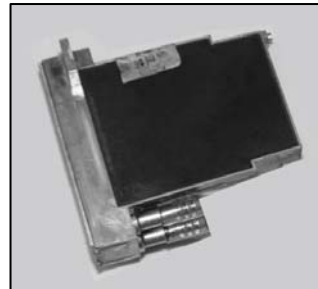
- ✚ The head is made sensitively against static electricity
- ✚ At the time of installation and removal, please work after discharging static electricity from your body. Anti-static strap must be worn.
- ✚ When handling the head, you must not touch the connector on the top of print head.
- ✚ Before connecting the printer, make sure that there is no foreign material in the connector of both the printing control board and head. Then connect to the connector each other.
- ✚ The AC power supply for printer should be used a UPS including a stabilized power supply.

5.2 Print head assembly

1. Unpacking the Print head
 - a) Check if the box is damaged or extruded before unpacked. Took out the print heads and print head assembly after confirmed;
 - b) Open the anti-static plastic bag, check the serial No. which should be same with label on the box



Print Head Box



Print Head



Assembly Box



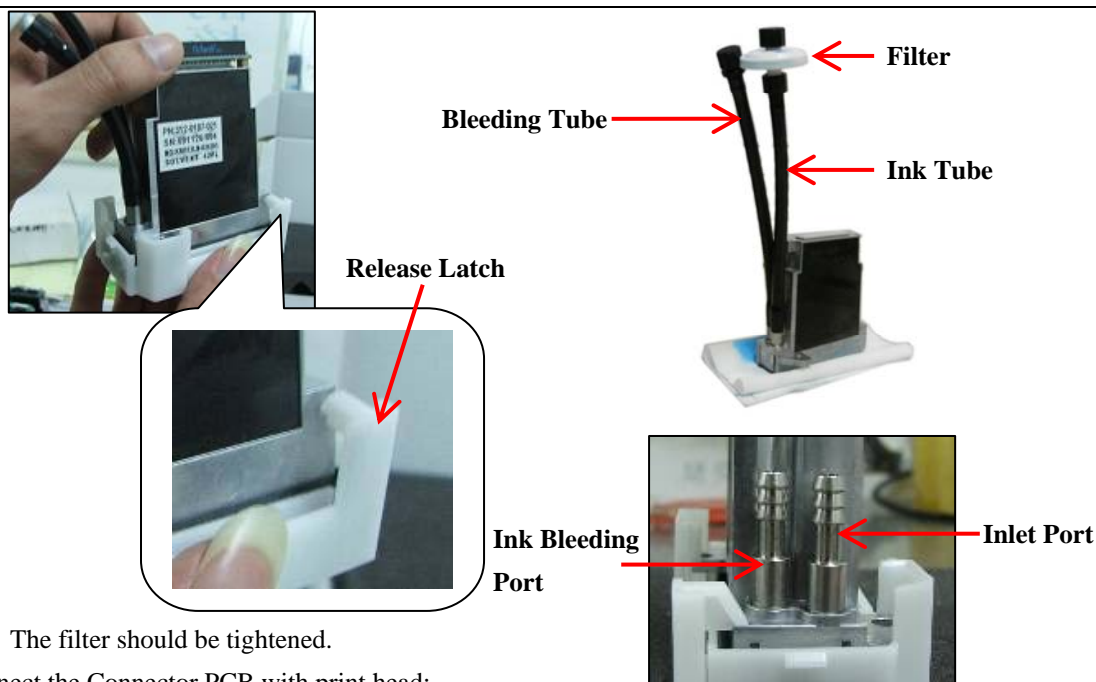
Tube & Connector PCB

Note:

- The head is pre-loaded with ink analog to prevent drying of the nozzles during transportation.
 - Wrap the head with a non-woven cloth to protect the nozzle surface and prevent drying of the ink analog.
2. Connect the ink tube assembly follow below way;

Note:

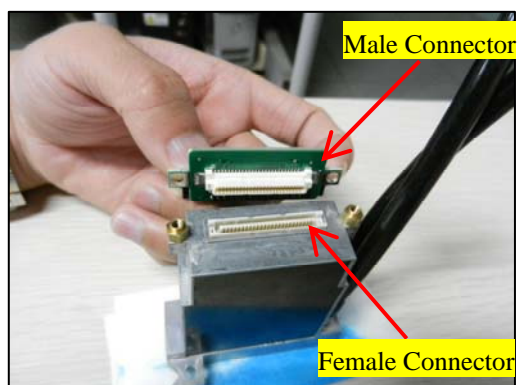
- The right inlet should connect with the short one with the filter; the right one is outlet connecting with the other tube.



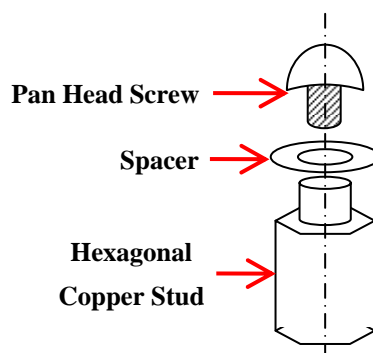
- The filter should be tightened.
- 3. Connect the Connector PCB with print head;
 - a) Fix the Hexagonal Copper Stud on the print head;



- b) Plug the connector board in the socket on print head;

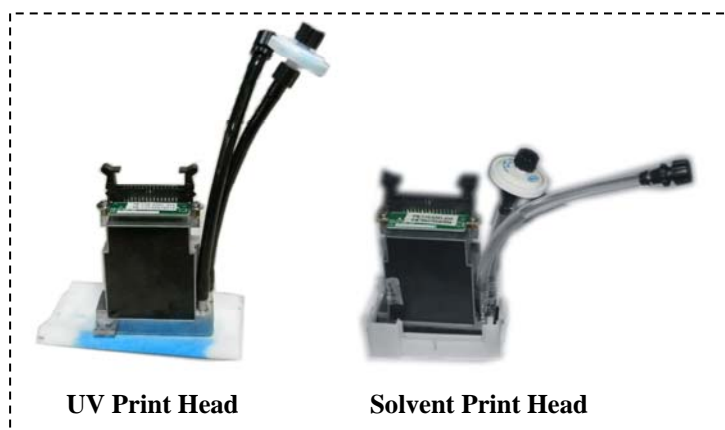


- c) Mounting the connector board with 2 pan head screws



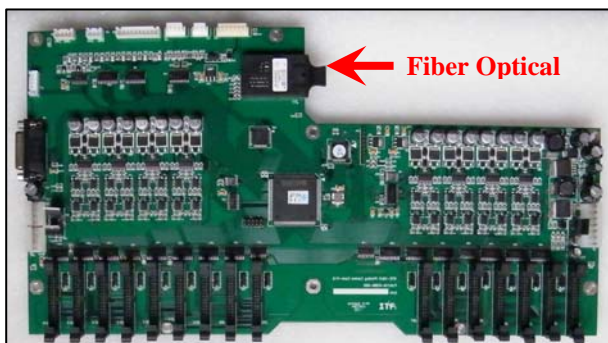
Print Head with Connector PCB

4. Finish! The completely print head should as below.



5.3 Print Head Installation

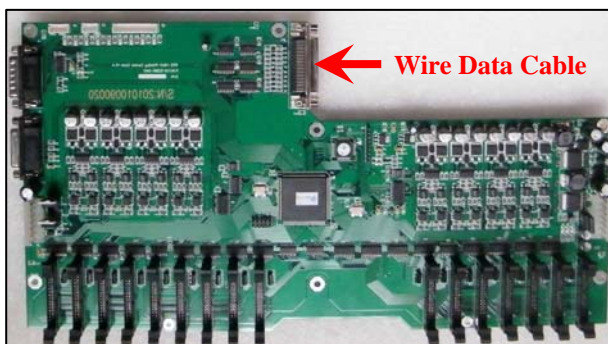
The correct connection is necessary to get proper printing.



RTZ-16UV Printing Control Card-v1.6

Note:

V1.6 is fiber optical version. It can support Win 7 and Win XP.



RTZ-16UV Printing Control Card-v1.4

Note:

V1.4 is wire data cable version. It supports only Win XP!

Notice: The sort orders of these two versions are different! Please refer below table

V1.6	JB1	JB2	JB3	JB4	JB5	JB6	JB7	JB8	JB9	JB10	JB11	JB12	JB13	JB14	JB15	JB16
V1.4	JB2	JB1	JB4	JB3	JB6	JB5	JB8	JB7	JB10	JB9	JB12	JB11	JB14	JB13	JB16	JB15

Print head channel connection Table:

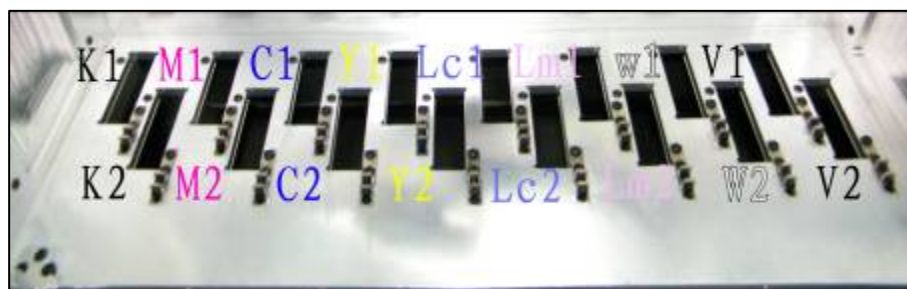
Carriage platform with two rows print heads:

PORT	JB1	JB2	JB3	JB4	JB5	JB6	JB7	JB8
COLOR	K1	K2	M1	M2	C1	C2	Y1	Y2
PORT	JB9	JB10	JB11	JB12	JB13	JB14	JB15	JB16
COLOR	Lc1	Lc2	Lm1	Lm2	W1	W2	V1	V2

**Double white just replace V1, V2 with W3, W4

Carriage platform with three rows print heads:

PORT	JB1	JB2	JB3	JB4	JB5	JB6	JB7	JB8
COLOR	K1	K2	K3	M1	M2	M3	C1	C2
PORT	JB9	JB10	JB11	JB12	JB13	JB14	JB15	JB16
COLOR	C3	Y1	Y2	Y3	W1	W2	W3	



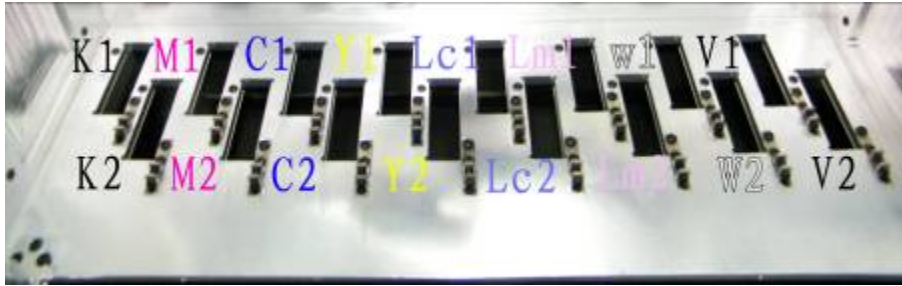
Printing Head Plate

Notice: If only 8 heads, you can install the print head on any row!

1. Install the print head, position the print head and then tight the two fixation screws accordingly.

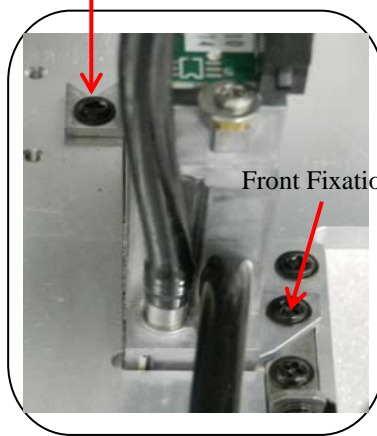
Note:

- The front fixation screw must be tightened properly before doing Y-align.



Print Head Mounting Plate

Back Fixation Screw



Front Fixation Screw



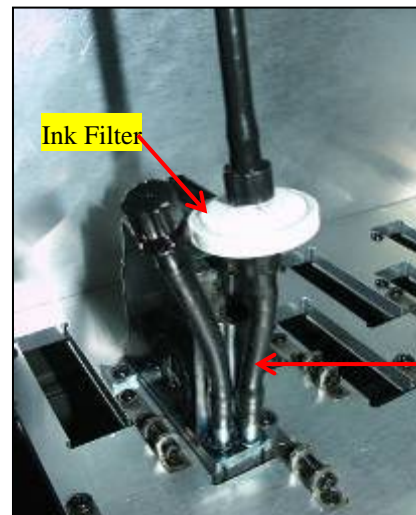
- Take note of proper print head orientation. Front side should be fixed outside.

2. Connect the ink tube, ensure all the connection places are tight;

Notice: Keep appropriate length tube to make the filter flat as the photo.



Tube is too Long



Good Connection

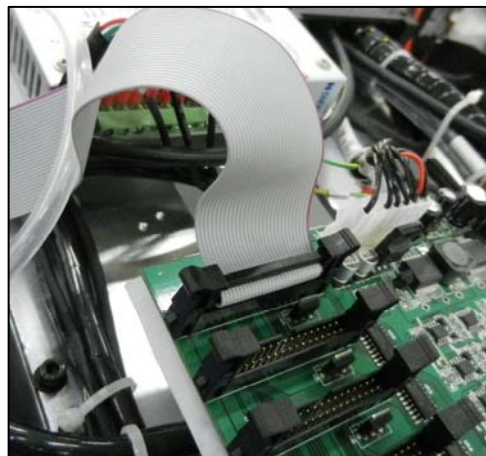
Inlet Tube

3. Connect the 30pins flexible print head data cable to the Print head Control Board and print head.

Notice: The tuber on data cable must match with groove on Connector PCB. Otherwise it will burn the print head.



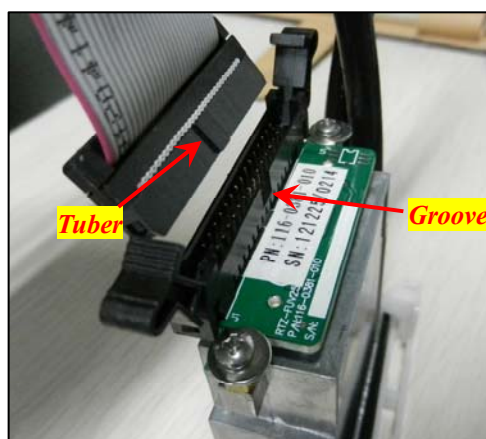
Print head Connection



Printing Control Board Connection



Print head Data Cable
(100-0621-020)



4. Install the other print head one by one.



Carriage with 16 Heads

5. Check all the connections again to ensure there are no misconnections or loose connections with the data cables.
6. Power on the machine, check for any functional abnormalities on the carriage.

📖 Install print heads, you must take notice as below:

- Switch off the power before install print heads
- The ink tube shouldn't be appropriate long, keep the filter flat as standard

- The installation of screws mounting the print head should moderate, the end of screw can't be beyond the carriage plate
- All the connectors and interface should be properly connected. No loose, no reversed or wrong connection