

I. Manual Cold Laminator Operation Method

The cold laminator is consists of upper/lower rubber rollers, front/rear worktable, left/right frame, left/right adjusting buttons, a handwheel for rotating the rubber roller, a picture presser (FMJ-1600 series with this presser) and foot-wheels (FMJ-1600 series with the foot-wheels). (See Fig.1)



It is with sample structure, easy to operate. However, it requires a lot of laminating experiences. The experiences obtained in practices will play an important role in improving the laminating quality.

It usually needs 2 or 3 persons to work together. The operation varies from different brands of cold laminators. The following is to take "Beauty" brand laminator as an example to show you two basic laminating methods.

One person can free if you apply an electric cold laminator.

A. Front Laminating Method

- 1.Cut a piece of film with the same width as the picture to be laminated, and 5-10cm longer than the picture.
- 2.Turn the left/right adjusting buttons in counter-clockwise to lift up the rubber roller. Insert one end of the film into the rollers about 50cm. Then warp one end of the film around the upper roller, straighten the film with rollers and align its two sides (to ensure the film is straight). Then Turn the adjusting buttons in clockwise to their idle position, put down the upper roller to press the film. (Fig.2)



Fig.2

3.Turn the handwheel to let the film go alone for a distance. Check the film for flat. If there are bubbles, this means the pressure is too high and you need to

lift the roller to release the pressure. Then turn the Button for adjusting pressure to the upper limit of its idle position or to a suitable position.

4.Turn the handwheel in counter-clockwise to let one end of the film to be pressed by the rollers about 5-10cm. Two persons stand at each side of the machine working together, one person peeling off the film and stretch the film backward/downward. At the same time, another person make the area flat where the film separate with the back paper. The film peeled off should be lower than the height of the roller, or to be placed on the clean floor. Now the rollers will flatten the film. (Fig.3)



5.Put the picture on the back paper. Then align its two sides. Place the picture under the rollers and flatten, align it; press the picture with hands (if the picture is thin and long, stick the end of the picture evenly at the back paper with two-side adhesive tape). Another person turns the handwheel in clockwise to make the picture enter the rollers slowly. If everything goes well, speed up the handwheel until the laminating is finished. (Fig.4, 5)



You can also first place the picture presser, and then make the picture enter the rollers slowly. (Fig.5) When the end of the picture being laminated, the speed should be slow down. Keep you hand on the end of the film to avoid any unexpected dropping. (Fig.6)





B. Reverse Laminating Method

1.Place the picture flatly. Cut a piece of film with the same width as the picture to be laminated, with the film face upward and put it on the picture. Then roll the picture together with film. Be careful to roll them tidily. Insert one end of the picture/film (rolled together) into the rollers. The head of the picture should be 30cm longer than the rubber roller, (fig.1) put down the rollers. Turn the pressure handwheel to its idle position. (Fig.1-2)



2.Pull up one end of the film to open back paper about 10cm, and flatten the back paper backward (Fig.3); turn the handwheel in clockwise after putting down the film to press the film together with the head of the picture. Be careful not to let the film and picture to come out from the rubber rollers and let the back paper just appear a bit from the rollers. Then roll the film and picture respectively.(Fig.4)



3. Put the film behind the rollers to let the back paper (being opened) to appear (Fig.5), pull the back paper with hands (at this time you may place the picture presser on the picture), at the same time, another person turns the handwheel in clock-wise to laminate the film and picture together. Be careful to let the film on the upper roller to be flat, and the rolled film should be lower than the height of the rollers. The speed for pulling the back paper should be slow and even, at same pace with the rubber rollers.



II. Electric Cold Laminator

Left frame for manual/electric Cold Laminator



1.Left frame 2.Handwheel 3.Emergency stop

1. The only difference between the Manual Cold Laminator and the Electric Cold Laminator is the electric control device (see the figure below) and the manual/electric transformation clutch. It is easy to operate, speed adjustable, manpower saving and more efficient.



Control Panel Power supply and switchs

2. The operation method for the Electric Cold Laminator is similar to that of the manual one (omitted).

3.Instruction for applying a Electric Cold Laminator

- (1)Switch on the power supply: plug one end of the power cable into the machine, then insert the other end into the socket.
- (2)Running: first select the rotating direction of the rubber rollers. Press the upper/ lower position of the switch to let roller rotating in clock-wise/ counter clock-wise. Press the upper/lower position of the run/stop switch to let the machine work/stop.

During the machine working, stop it if you want to change the rotating direction of the rubber rollers. Restart the machine after you have changed rotating direction to avoid damages to the electric components and mechanical parts.

When the run/stop switch is at its stop position, you can use the pedal to operate the machine.

- (3)Speed adjustment: Turn the button in clock-wise or in counter clock-wise to decrease or increase the speed.
- (4)The sequences of switching off the power supply should be done reversibly as that of the switching on the power supply.
- (5)Before you operating an Electric Cold Laminator, please read carefully the instructions to a Manual Cold Laminator to ensure a successful process.
- (6)For FMJ-1600II series, they are equipped with a photoelectric safety switch and an emergency stop switch on the left frame. Restart the power supply switch after you have used these two switches. The pedal switch is not controlled by the photoelectric safety switch.
- 4. How to use the manual/electric transformation clutch

- (1) There is a set of Jaw Clutch on the left side of the lower rubber roller. Push the handwheel inward/outward to use electric/manual mode.
- (2) If you want to use the electric mode, please let the motor run in low speed and push the handwheel inward. Now the clutch might not be geared, push the handwheel again when you feel it slipping inward. The machine will work in electric mode while the handwheel and the rollers rotating synchronously.
- (3) To operate it manually, please pull the handwheel outward to set up a manual mode.
- (4) Be careful: while the handwheel and the rollers rotating synchronously in electric mode, the handle of the handwheel should be bent in order to avoid hurting people due to its wrapping the clothes. You can remove the handwheel if the machine is used in electric mode for a long time.



Electric Mode

Manual Mode

5. Special Attention to cold lamination

(1) When the upper roller is lying over the lower roller by its self-weight, the handwheel for adjusting pressure is at its idle position and it can rotate freely.

The idle position is consists of an upper limit and a lower limit. While the handwheel is at the idle position, turn it continuously in clockwise and feel hard to turn, you will reach the lower limit. While the handwheel is at the idle position, turn it continuously in counter clockwise and feel hard to turn, you will reach the upper limit.

- (2) During laminating, put down the upper and lower rollers and turn the two buttons (for pressure adjusting) to their idle position. Don't increase pressure.
- (3) When applying FMJ-1600 series, there may are bubbles in the laminated picture due to too high pressure. At this time, the left and right buttons should be at the upper limit of their idle positions. Turn the handwheel in counter clockwise to lift up the roller a bit to reduce pressure and bubbles.

(4) The contact line between the end of picture and film must be exactly aligned.

If the requirements (2), (3) and (4) above-mentioned cannot meet, this will cause wrinkles and damages to the entire picture.

6. There is three factors which may affect the quality of the lamination: the quality of the machine; the operator's skills and experiences; the quality of the film.

Therefore, it is recommended that the customers choose high quality laminators, improve laminating skills and choose high quality film.

- 7. When the machine starts to work, you may turn the rubber roller slowly, but don't stop it or let it rotate in counter direction. Otherwise, this will cause an inerasable mark.
- 8. During peeling off the film, this will produce strange electrostatic and absorb dusts, thus the work area should be clean.
- 9. Clean the rubber rollers with high-grade gasoline or ethyl alcohol frequently.
- 10.It is prohibited to make the machine contact with oil, organic agents or be scratched. The damages due to these above reasons will not be under warranty.
- 11.In order to prolong the service life of the rollers, please lift up the rollers after lamination.
- 12.The FMJ-II model cold laminator is an electric one, and FMJ-1600II series have the manual/electric transformation clutch. If the clutch is not geared completely, the motor doesn't turn or turn weakly after pressing the motor switch. At this time, you can operate the machine according to method specified in 4. (2) of II. Electric Cold Laminator.

III. Points for Attention to Safety

- 1. When using an Electric Cold Laminator, make sure the voltage on the machine nameplate in accordance with the local power supply. Use single-phase 6A3 socket with ground connection.
- 2. When doing maintenance, switch off the power supply to avoid electric shock.
- 3. Check wires and pedal switch wire for any damages before switching on the machine to avoid electric leakage.
- 4. Switch off the power supply after lamination.
- 5. While the handwheel and the rollers rotating synchronously in electric mode, the handle of the handwheel should be bent in order to avoid hurting people due to its wrapping the clothes. You can remove the handwheel if the machine is used in electric mode for a long time.

Be careful not to hurt hands by the rollers when using an Electric Cold Laminator.

IV. Special Instructions

1.For FMJ-360 Cold Laminator, the rotating direction of the handwheel for

adjusting pressure is contrary with other models. It will lift up the rollers when turning the handwheel in clockwise.

2. The stand for the Cold Laminator is an option.

