RICOH

Technical Bulletin No. RTB-001

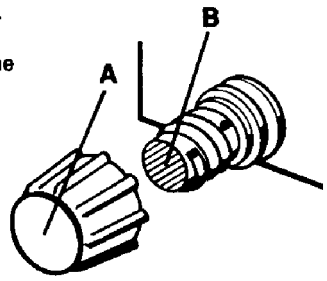
SUBJECT: Black Ink Cartridge Seal	DATE: Sep. 30,'91 PAGE: 1 of 1
PREPARED BY: S.Asai CHECKED BY:	FROM: Copier Technical Support Section

CLASSIFICATION:		MODEL:
☐ Action Required ☐ Troubleshooting ☐ Retrofit Information	☐ Revision of service manual ■ Information only ☐ Other	VT3500 Ges 5375/Rex 1280 NSA CP375

To increase ink production, the transparent seal will be removed from the exit of the black ink cartridge (500cc and 800cc ink). For the color inks, the transparent seal remains because the color inks are more fluid than the black ink.
Due to this change, the instructions printed on the black ink cartridge will be changed as shown below.

OLD

Handling Instructions
Remove the Cap A from a new cartridge of ink. Do not remove the Seal B. Set ink cartridge.
Manuel d'Instruction
Retirer le bouchon de la nouvelle cartouche d'encre. Ne pas retirer le joint B. Mettre en place la cartouche d'encre.
Bedienungshinweise
Kappe a von neuer farbpatrone entfernen! Dichtung B nicht entfernen.Farbpatrone einsetzen.
Instrucciones de manejo
Extraiga la tapa A del nvevo cartucho de tinta.
No extraiga el precinto B.
Coloque el cartucho de tinta.
Modo di impiego
Rimuovere il coperchio A dalla nuova cartuccia di inchiostro.
Non rimuovere il sigillo B.
Posizionare la cartuccia di inchiostro.



NEW

Handling Instructions
■Set the ink in the machine immediately after the cap is removed to prevent entry of air.

Handhabung
■Den Farbbehalter sofort nach dem Offnen in die Maschine einsetzen, um Eindringen von Luft zu verhindern.

Instructions d'emploi
■Placer l'encre dans l'appareil des que son bouchon a ete ouvert afin d'eviter que l'air ne penetre.

Instrucciones
■Para evitar la entrada de aire, la tinta se debe colocar en la maquina inmediatamente despues de abrir.

Istruzioni per l'uso
■Mettere l'inchiostro nella macchina subito dopo aver tolto il tappo, per evitare che entri aria.

This modification will be implemented from the October '91 production run for the 500cc ink cartridge and November '91 production run for 800cc ink cartridge.

RICOH

Technical Bulletin No. RTB-002

SUBJECT: ROM Change (B jam with A4/LT drum/Jam detection in Skip Feed mode)	DATE: Nov.15,'91 PAGE: 1 of 5
PREPARED BY: S. Asai CHECKED BY:	FROM: Copier Technical Support Section

CLASSIFICATION:		MODEL:
☐ Action Required ■ Troubleshooting ☐ Retrofit Information	☐ Revision of service manual ☐ Information only ☐ Other	VT3500 Ges 5375/Rex 1280 NSA CP375

[Contents of ROM Modification]:

The ROM on the main control board has been modified due to the following reasons:

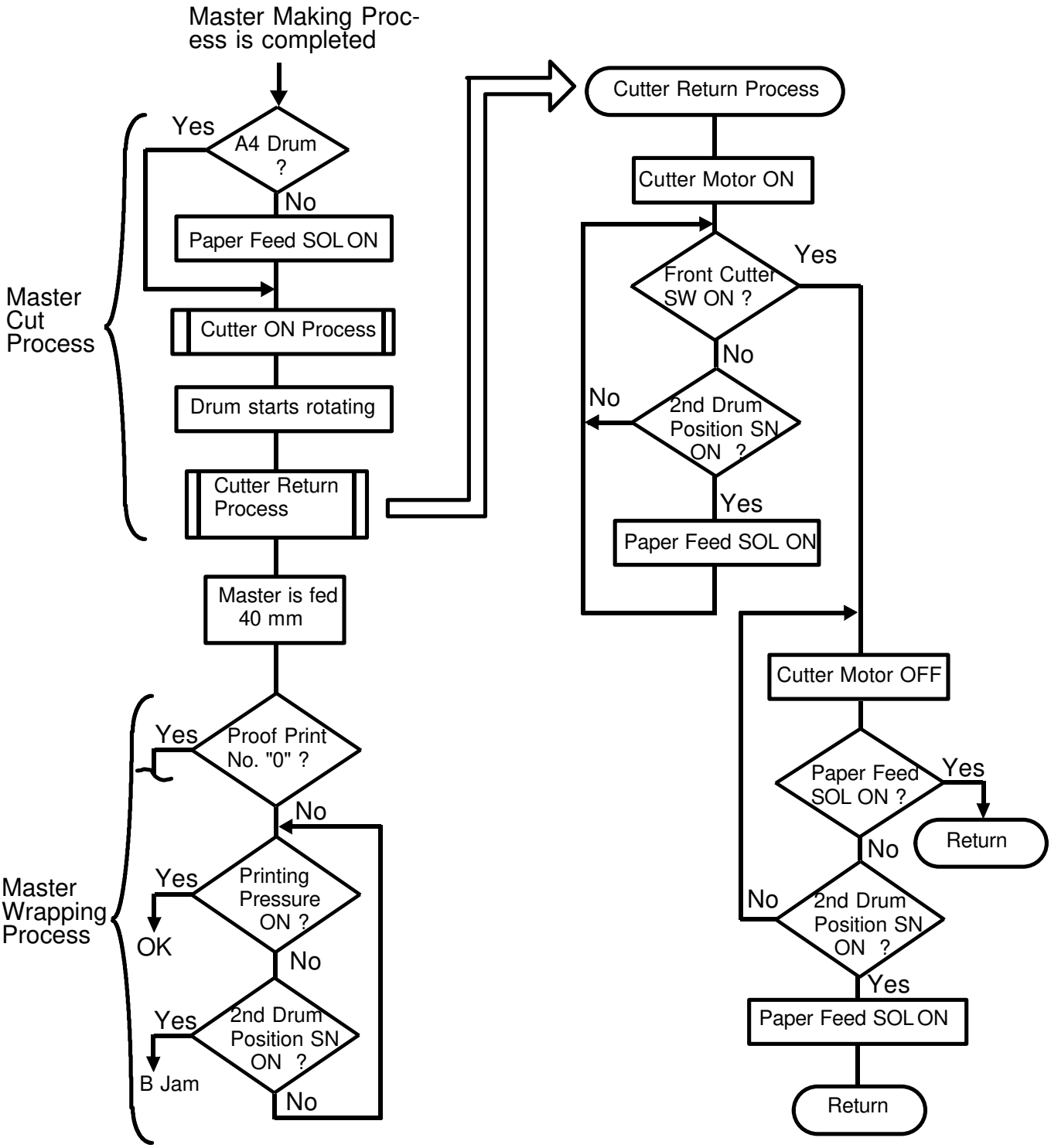
Reason 1:

There has been reports in the field of the B jam with the A4/LT optional drum because the paper feed solenoid does not turn on at correct timing. This problem only occurs in proof mode (trial print) when the optional A4/LT drum is installed. Therefore, when the proof print number is set to zero with SP mode 81, the problem (B jam) disappears. Please note that this problem does not happen very often. One circumstance when this occurs is when the drum rotation is delayed due to an overload.

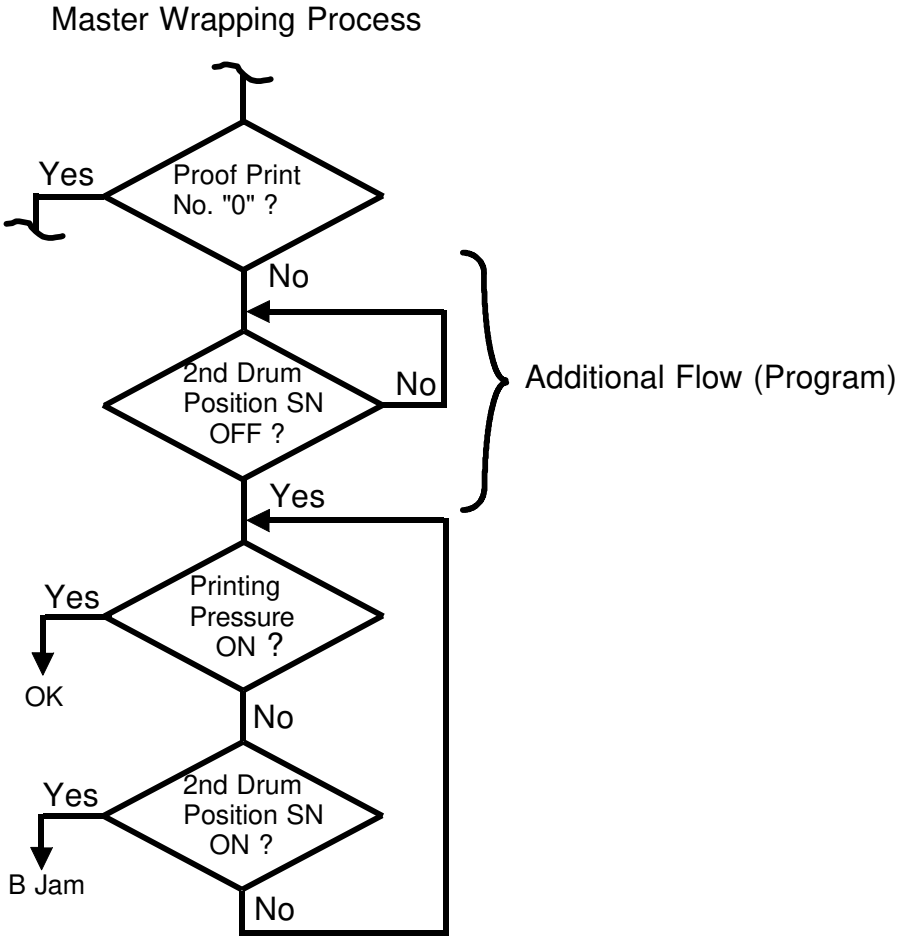
On the A3 drum, the paper feed solenoid turns on when the master making process is completed. However, this ON timing is too early for the A4/LT drum. Therefore, on the A4/LT drum. the paper feed solenoid turns on when the 2nd drum position sensor turns on.(Normally, the 2nd drum position sensor turns on while the cutter returns to the home position. Then, the process proceeds to the master wrapping process.) But, if the drum rotation is delayed due to an overload, a paper jam is detected during the master wrapping process because the 2nd drum position sensor ON timing is delayed. Normally, the 2nd drum position sensor should be OFF at this time. (See the attached flow chart A.)

To prevent the above problem, the ROM program relating to the master wrapping process has been modified. During master wrapping process, the paper misfeed is detected after the 2nd drum position sensor turns off. (See the attached flow chart B.)

Current ROM Program (Flow Chart A)



Modified ROM Program (Flow Chart B)



Reason 2:

In order to enable a long sheet paper feeding (more than A3/DLT size) without misfeed detection, an additional subroutine has been added to SP 82 (Skip Feed mode) as follows:

When SP 82 is selected, LCD is displayed as follows:

```
Skip Feed No.
1- 1 - 5              1
```

If 2 or more is set as a Skip Feed No. and then the Enter key is pressed, the following LCD is displayed. The additional routine asks if the sheets used are longer than A3 or DLT size.

```
Long Sheet ?
 0: No  1: Yes      0
```

On the above display, if "0"(No) is selected, paper feed detection is normal mode. However, if "1"(Yes) is selected, ignore the paper exit jam detection so that a long sheet paper can be fed without misfeed detection.

Note: 1. The Maximum length of a long sheet paper is 600 mm.

2. The A4 optional drum cannot be used with this new mode (long sheet paper feeding).

3. When the paper length is 450 or more, printing sheet may be stained by the master trailing edge. Also, when the paper length is 477 or more, printing sheet may be stained by the rubber pads used for turning the pressure roller.

4. Pull the paper delivery end plate down if the paper length is long. Hold the printing sheets delivered from the machine. Otherwise, printing sheets drop from the paper delivery table.

[P/N and S/N Information]:

The ROM part number for each language remains the same. However, a suffix (9th character) has been changed as follows:

Old P/N	New P/N	
C2108626A	C2108626B (Europe version in English)	Total Sum Check "0100"
C2108452	C2108452A (Europe version in French)	Total Sum Check "2800"
C2108457	C2108457A (Europe version in Italian)	Total Sum Check "2A00"
C2108455	C2108455A (Europe version in Spanish)	Total Sum Check "0700"
C2108450	C2108450A (Europe version in German)	Total Sum Check "0D00"
C2108621A	C2108621B (American version in English)	Total Sum Check "0600"
C2108459	C2108459A (American version in French)	Total Sum Check "2D00"
C2108461	C2108461A (American version in Spanish)	Total Sum Check "0C00"

The new ROM has been implemented since the October '91 production. The cut-in serial numbers are as follows:

Ges 5375 (NA version): S/N 50621100001-
Ges 5375 (Eu version): S/N 50611100001-
Rex 1280: S/N 50611100141-
NSA CP375: S/N 50611100161-

VT3500: S/N C2791100001-

Note: On the VT3500 (S/N C279110****) produced in October '91, the new ROM has not been implemented on machines with serial numbers (last 4 digits) listed below:

0031, 0048, 0050, 0096, 0105, 0106, and 0108.

RICOH

Technical Bulletin No. RTB-003

SUBJECT: Paper Exit Pawl	DATE: Feb. 15, '92 PAGE: 1 of 1
PREPARED BY: S. Asai CHECKED BY:	FROM: Copier Technical Support Section

CLASSIFICATION:		MODEL:
☐ Action Required	☐ Revision of service manual	VT3500
■ Troubleshooting	☐ Information only	Ges 5375/Rex 1280
☐ Retrofit Information	☐ Other	NSA CP375

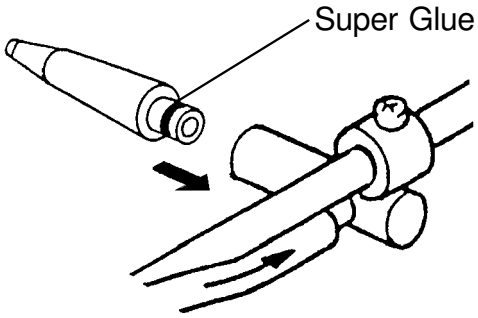
[Phenomenon]:

During the printing run, the paper exit pawl slightly comes off and it contacts the drum screen. This causes a black line on copies. In the worst case, the exit pawl contacts the master clamper and the clamper may be damaged.

[Countermeasure]:

1. Check whether the exit pawl comes off or not.
2. Make sure that the exit pawl does not come off by pulling it out with light force (with fingers).
3. If it comes off, apply super glue one turn around the joint area and insert it as shown.

Note: Before applying super glue, place a sheet of paper on the vacuum unit to prevent glue from dropping on the vacuum belt.



[Causes]:

Variation of amount of glue

The amount of glue has been controlled since December '91 production. The cut-in serial number for each model is as follows:

VT3500: S/N C2791120001-
Ges5375/Rex 1280/NSA CP305: USA version: S/N 50621120001-
Europe/Asia version: S/N 50611120001-
Taiwan version: S/N 50631120001-

RICOH	Technical Bulletin	No. RTB-004

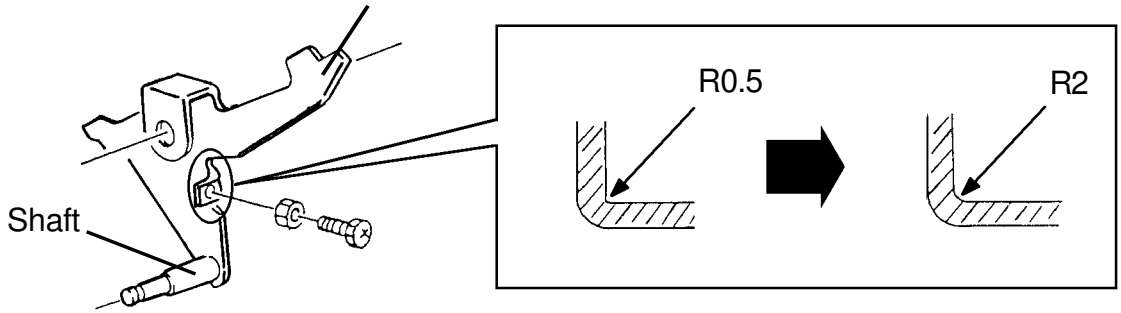
SUBJECT: Pressure On/Off Lever Breakage	DATE: June 15, '92 PAGE: 1 of 1
PREPARED BY: H. Kokubo CHECKED BY:	FROM: Copier Technical Support Section

CLASSIFICATION:		MODEL:
☐ Action Required ☐ Troubleshooting ☐ Retrofit Information	☐ Revision of service manual ■ Information only ☐ Other	VT3500 Ges 5375/Rex 1280 NSA CP375

It was reported that the adjusting screw tab of the pressure on/off lever is sometimes broken.

The pressure on/off lever (part number: C200 5566) is commonly used for all the series models, but this problem is typical only on this model. This is because the pressure roller's pressure of this model is higher than that of the other models due to the A3 size printing.

C2005566: Pressure On/Off Lever



To increase the durability of the lever, the angle has been rounded as shown in the illustration. This will reduce the stress on the adjusting screw tab. The new type lever has been applied since the May '92 production. The cut-in serial numbers are as follows:

C210-12 (Ges 115V version): 50622050001
C210-13 (Ges TWN version): From next production
C210-14 (Rex TWN version); From next production
C210-15 (Rex 115V version): From next production
C210-16 (NSA 115V version): From next production
C210-19 (Ricoh TWN version): From next production
C210-22 (Ges Eu. version): 50612050001
C210-24 (Rex Eu. version): 50612050217
C210-25 (NSA Eu. version): 50612050274
C210-27 (Ricoh Eu. version): C2792050001
C201-29 (Ricoh 220V version): C2792050201

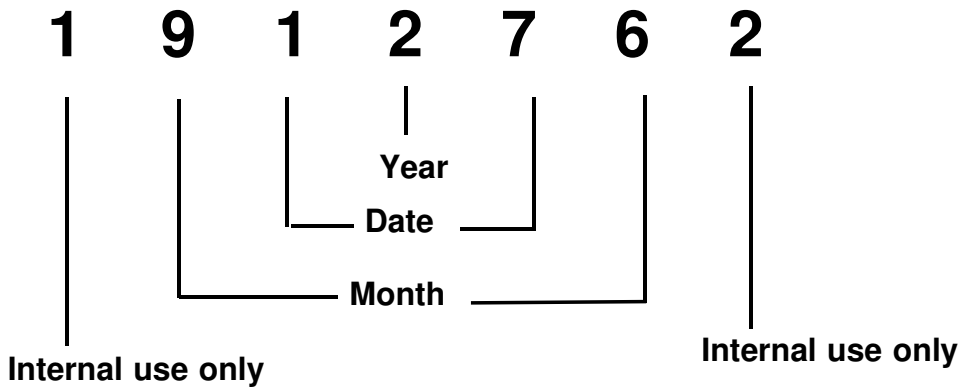
The new lever has also been applied for all the other series models from May '92 production due to part standardization.

Note: Although the part number (C200 5566) is still the same, the shaft on the lever is marked with white paint. All spare parts which have been delivered from our SPC since May '92 are the new type only. Please note that the old type lever can still be used for the other series models.

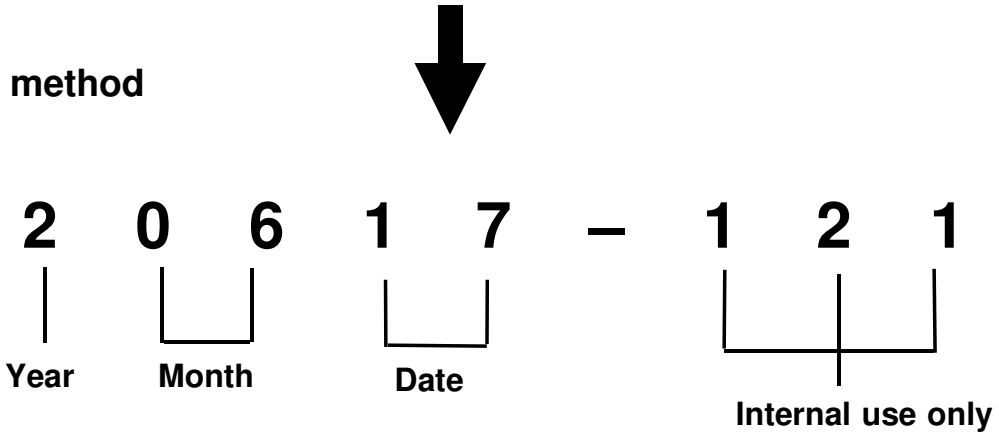
RICOH	Technical Bulletin	No. RTB-005
SUBJECT: Priport Ink Lot Number		DATE: Aug. 15, '92 PAGE: 1 of 2
PREPARED BY: J. Mochizuki CHECKED BY:	FROM: Copier Technical Support Section	
CLASSIFICATION: ☐ Action Required ☐ Troubleshooting ☐ Retrofit Information	☐ Revision of service manual ■ Information only ☐ Other	MODEL: VT3500 Ges 5375/Rex1280 NSA CP375

To clarify the ink production dating, the method of lot numbering has been changed as follows:

Old method



New method



The above lot number means that the ink is produced on **June 17, '92**

The table below shows the new lot numbering start date.

Type of ink	New lot numbering start date
Black 800cc	July 13, '92
Black 500cc	July 13, '92
Color Red 500cc	July 13, '92
Color Blue 500cc	July 16, '92
Color Green 500cc	July 14, '92
Color Brown 500cc	July 16, '92

RICOH

Technical Bulletin

No. RTB-006

SUBJECT: Damage of Optional A4 Drum

DATE: Nov. 30, '92
PAGE: 1 of 2

PREPARED BY: H. Kokubo
CHECKED BY: H. Terashita

FROM: Copier Technical Support Section

CLASSIFICATION:
- ■ Action Required
- ❑ Troubleshooting
- ❑ Retrofit Information
- ❑ Revision of service manual
- ❑ Information only
- ❑ Other

MODEL:
Priport VT3500/
Ges 5375/Rex 1280/
Nsa CP375

When the optional A4 drum is used, the pressure of the press roller is released from the drum by the cam installed in the drum itself, unlike the A3 drum, which is originally installed in the machine. The cam applies strong force to the A4 pressure on/off lever that is connected with the press roller shaft in order to drive it and release the press roller pressure,

It was reported that the bolt (M5x14 hexagonal hole head bolt) that secures the A4 pressure on/off lever on the press roller shaft breaks. This will cause the exit pawl to hit the drum surface because the exit pawl drive cam is fixed with the A4 pressure on/off lever.

Since August 1992, the torque to tighten the bolt has been reduced and controlled to 40 to 50 kgfcm on the production line. In the past, it was around 100 kgfcm. It was found that there was possibility of the bolt breaking while using the optional A4 drum. The cut-in serial numbers are as follows:

C210-12 (Ges U.S.A.): 50622080001
C210-13 (Ges Taiwan): 50632080001
C210-22 (Ges Europe): 50612090001
C210-24 (Rex Europe): 50612080001
C210-25 (Nsa Europe): 50612080016
C210-27 (Ricoh Europe): C2792080001
C210-29 (Ricoh Asia, etc.): C2792080108

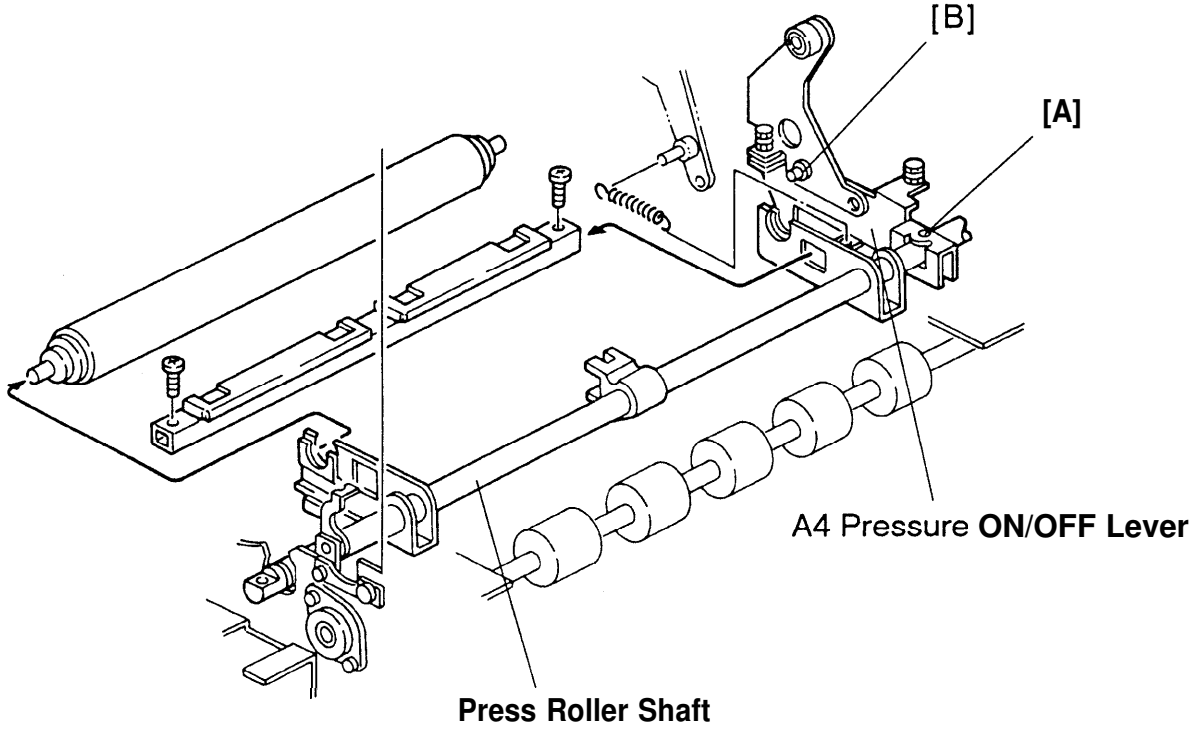
Note: Even if the bolt is tightened manually with a hexagon key, if a engineer tightens as much as he can, the torque will be about 70 kgfcm.

[Action Required]

When the optional A4 drum is installed for a machine produced before the cut-in serial numbers listed in the preceding page, perform the following:

1. Replace the bolt [A] with a new one (P/N: 05950140E).

2. Be sure that the bolt [B] (M4x6 hexagonal hole head bolt) is firmly tightened. If this is loose, the A4 pressure on/off lever does not operate properly.



RICOH

Technical Bulletin No. RTB-007

SUBJECT: A4 Pressure On/Off Lever Damage	DATE: Nov. 30, '92 PAGE: 1 of 9
PREPARED BY: H. Kokubo CHECKED BY:	FROM: Copier Technical Support Section

CLASSIFICATION:		MODEL:
❑ Action Required ■ Troubleshooting ❑ Retrofit Information	❑ Revision of service manual ❑ Information only ❑ Other	Priport VT3500/ Ges 5375/Rex 1280/ Nsa CP375

It was reported that the bolt (P/N: 05950140E) securing the A4 pressure on/off lever sometimes breaks (see RTB no. 6).

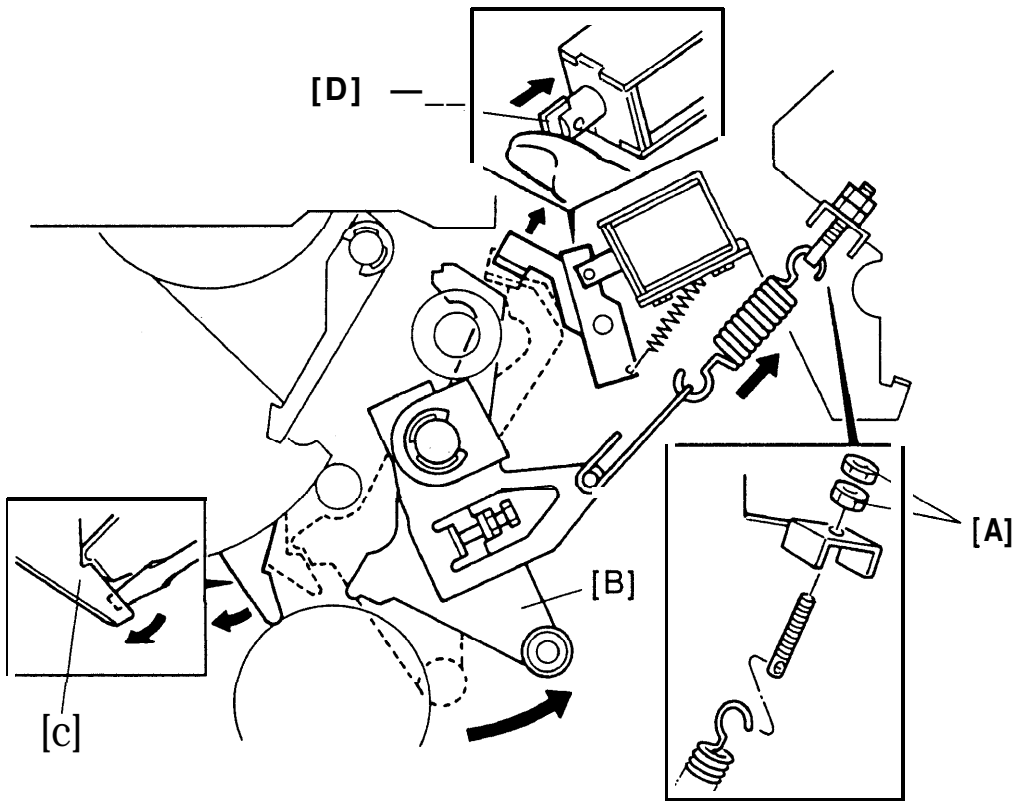
At worst, you may have to replace the A4 pressure on/off lever together with the press roller shaft if the head of the bolt is broken and the lever cannot be removed from the press roller shaft.

To cope with such situation, we have registered the press roller shaft kit (P/N: C210 9505) as a service part. (See page 8 of 9.) This bulletin is to give the installation procedure for the kit.

Follow the procedure below only when you cannot remove the broken bolt from the press roller shaft and you have to replace the press roller shaft with new one.

1. **Make sure that the paper feed table is in its lowest position and the drum is in its home position, Then, turn off the main switch and disconnect the power cord.**
2. **Remove the front and rear covers.**
3. **Remove the drum unit.**
4. **Remove the plotter unit. (Refer to page 5-18 in the service manual.)**
5. **Remove the A3 printing pressure cam. (Refer to page 5-69 in the service manual.)**

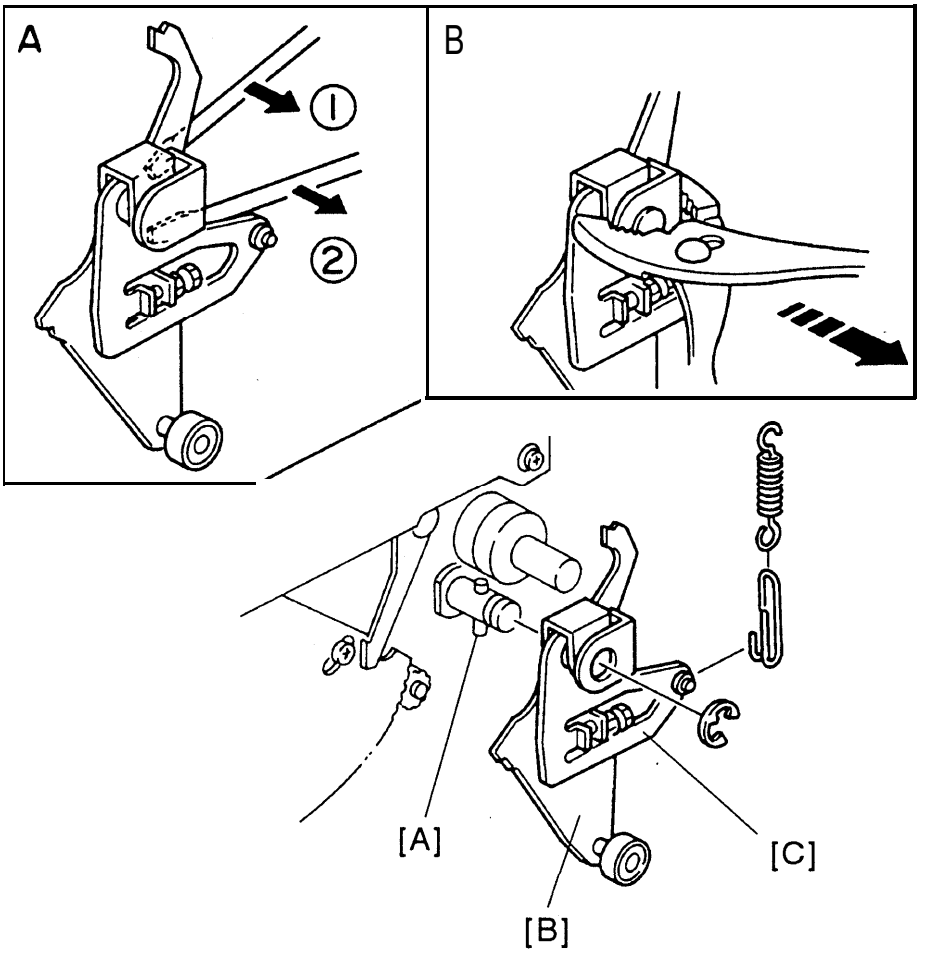
(Continued)



6. While pressing the plunger of the pressure release solenoid [D], disengage the paper detection arm [C] from the A3 pressure on/off lever [B]. Using a spanner, turn the drum shaft manually until the printing pressure is applied.

7. While the printing pressure is applied, remove the printing pressure spring by loosening the two nuts [A].

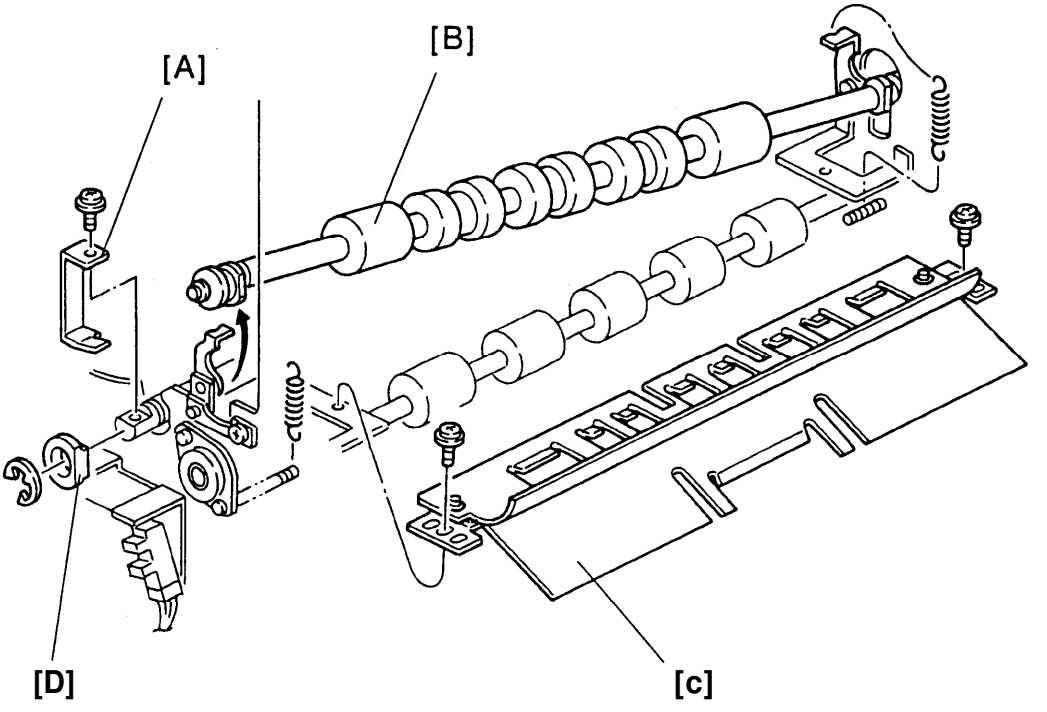
(Continued)



8. Remove **the A3 pressure on/off lever [B] with the pressure spring arm [C] as shown.**

Note: The lever and arm are securely held on the shaft with a spring pin [A]. Before pull them out of the shaft, apply a sufficient amount of spray grease or equivalent. After that, insert two screwdrivers behind the pressure on/off lever and gradually moves the screwdrivers to take the lever and arm out the spring pin. Finally, pull them out using pliers.

(Continued)

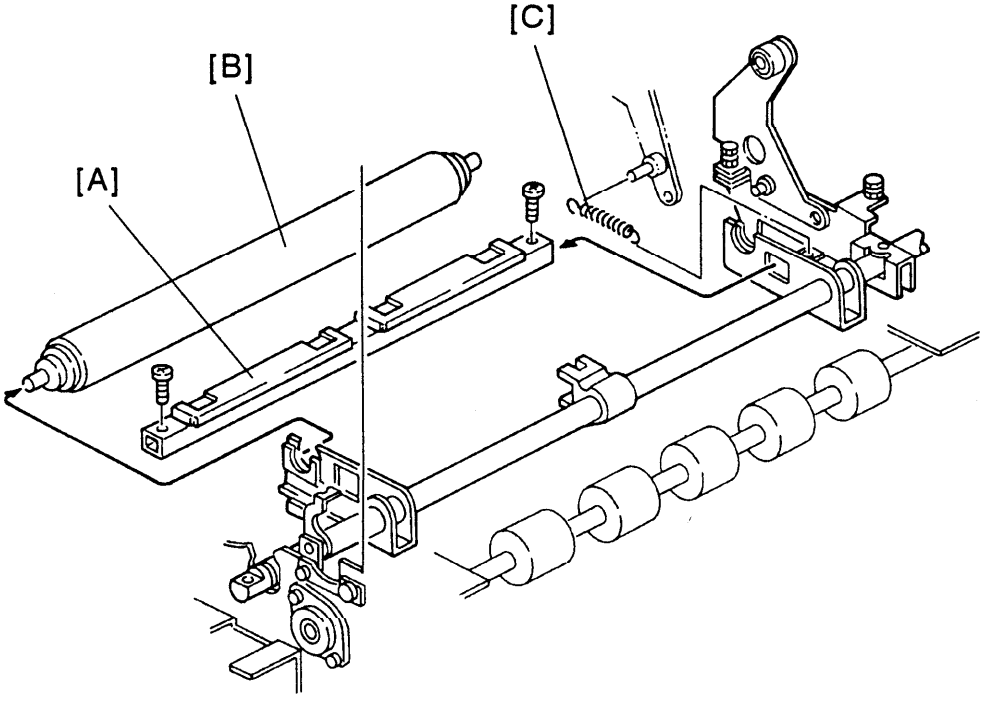


9. Remove the upper second feed roller [B] (2 springs), then remove the upper and lower paper guide plates [C] (2 screws),

Note: * You do not have to remove the upper second feed roller completely to remove the paper guide plates.
* When reassembling the paper guide plates, make sure that the guide plates do not touch the lower second feed roller,

10. Remove the sensor actuator [A] on the front of the press roller shaft (1 screw), and remove an E-ring and the bushing [D].

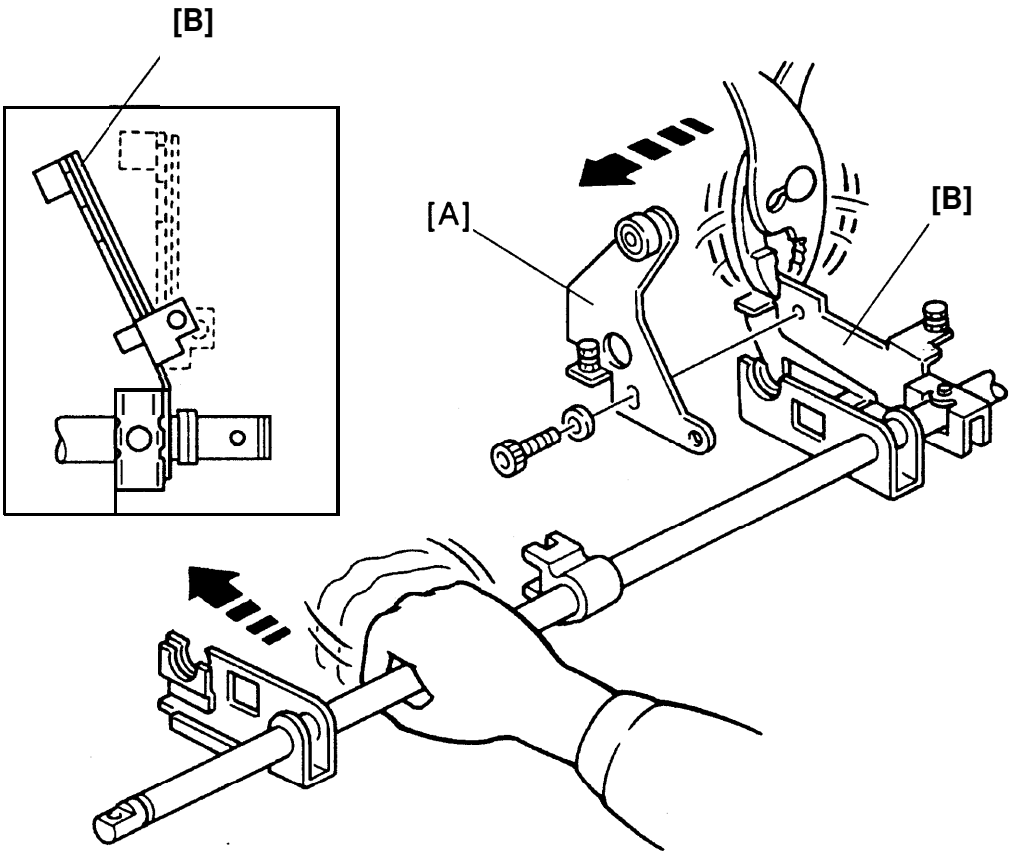
(Continued)



11. Remove the press roller [B] and press roller guide [A] (2 screws).

12. Remove the spring [C].

(Continued)



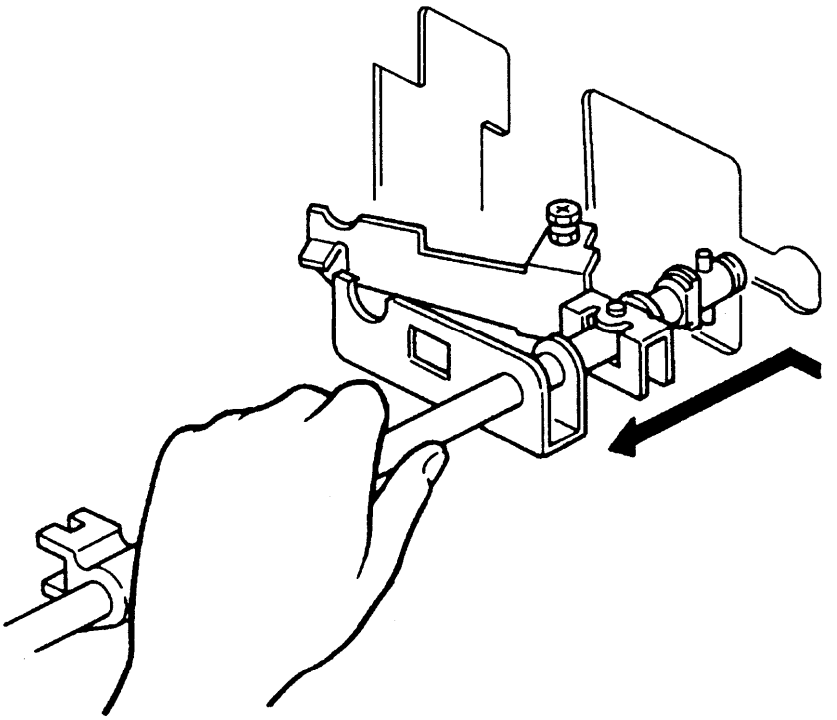
13. Slide the A4 pressure on/off lever to the front, so that you can remove the press roller shaft.

If the head of the bolt breaks and you cannot slide the A4 pressure on/off lever to the front, follow the steps below:

1) Remove the A4 cam follower bracket [A] (1 bolt).

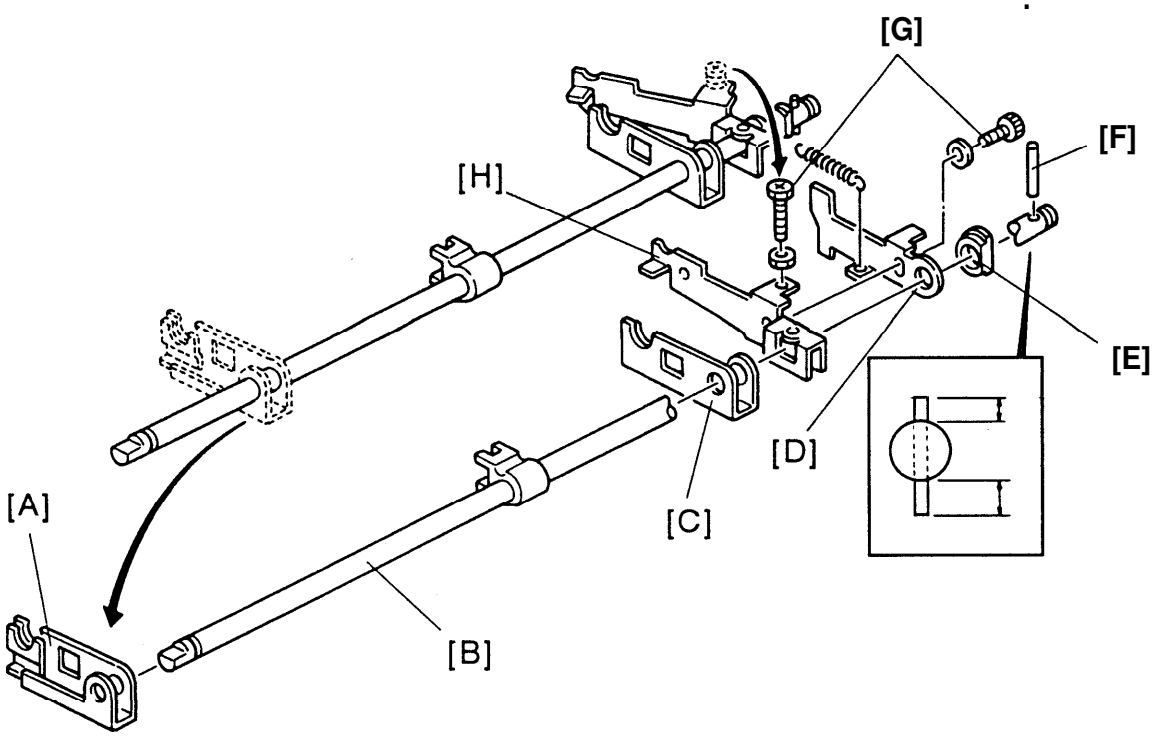
2) Bend the A4 pressure on/off lever [B] as shown using pliers. Grasp the front end of the press roller shaft and bend it more by pressing the lever against the rear frame.

(Continued)



3) Remove the press roller shaft through the cutout of the rear frame as shown.

(Continued)



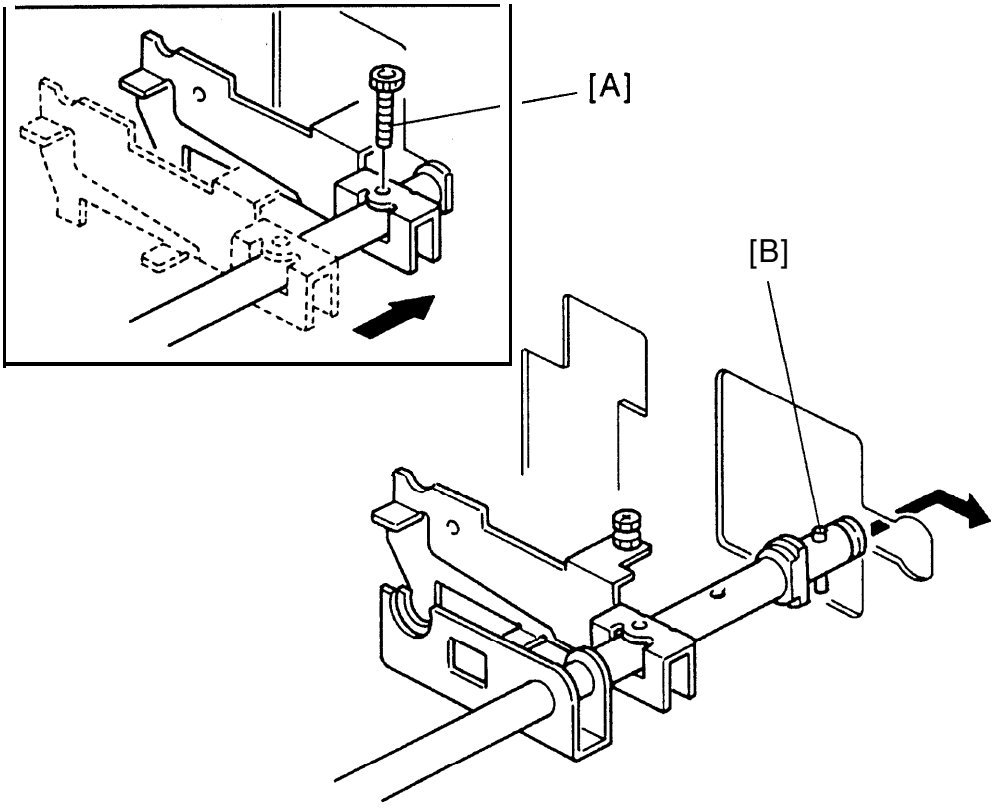
14. Remove all parts from the press roller shaft. Then, replace the defective parts with new ones. If you use the press roller shaft kit (see Note below), remove the front press roller arm [A] and two bolts with the nuts [G] from the old press roller shaft, and add them to the kit.

Note: To replace the A4 pressure on/off lever, you have to remove the spring pin [F] on the rear of the press roller shaft. However, It is difficult to remove it because the spring pin is firmly fitted in the hole of the shaft. Also, it may be difficult to remove the bolt from the shaft if it has broken.

To cope with such a situation, we have registered the press roller shaft kit (P/N: C210 9505) as a service part. The kit is composed of one each of the following parts (not assembled). Please order it from our SPC as usual.

* Press roller shaft (C2095505) [B]
* Rear press roller arm (C2095553) [C]
* A4 pressure on/off lever (C2095570) [H]
* Exit pawl drive cam (C2036004) [D]
* Bushing (C2005526) [E]
* Spring pin - 4x22 (08044060) [F]
* Hexagon bolt - M5x14 (05950140E)

(Continued)



15. Assemble the press roller shaft and install it in the machine,

Note: * Do not secure the A4 pressure on/off lever first. Slide the A4 pressure on/off lever to the front when you install the press roller shaft. Then, slide it to the rear and secure with the bolt [A].
* Position the spring pin [B] in the hole of the press roller shaft so that the A3 pressure on/off lever and pressure spring arm can be installed,

16. Reassemble all the removed parts.

17. Check the following:

* Press roller position (Page 5-50 and 5-51 in the service manual)
* Printing pressure timing (Page 5-52)
* Printing pressure (Page 5-53)
* Clearance of exit pawl (Page 5-75)
* Exit pawl timing (Page 5-76)

RICOH	Technical Bulletin	No. RTB-008

SUBJECT: Ink Set-off on Prints or Master Damage When Using the VT-II Master	DATE: Dec. 15, '94 PAGE: 1 of 2
PREPARED BY: H. Kokubo CHECKED BY: S. Hamano	FROM: 2nd Technical Support Section

CLASSIFICATION:

- ☐ Action Required
- ■ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ☐ Information only
- ☐ Other

MODEL: Priport NA2 (Ricoh VT3500/ Ges 5375/Rex 1280/ Nsa CP375/ABDICK 6720)

There are two types of the master for the NA2. They are the VT-II master (RICOH VT-II-L, NRG CPMT10, ABDICK 60-6725) and VT master (RICOH VT-L, NRG CPMT6, no equivalent for ABDICK). The VT-II master is slightly more sensitive to the heat of the thermal head than the old VT master. (The VT-II master has started being used instead of the old VT master.) When the VT-II master is used, the following symptom might occur:

SYMPTOM

- Amount of ink transferred on prints increases due to larger holes made by the thermal head on the master than those of the old VT master. As a result, ink set-off on the reverse side of prints will increase.

- The thermal head makes too large holes on the master and some parts of the master surface (the polyester film layer) are peeled off during printing. The damaged parts will appear as black patches on prints.

SOLUTION

Reduce the thermal head energy using the SP mode as follows:

1. Access the SP mode. (Press the Clear Modes key, Clear key, Combine 2 Originals key, then Enter (#) key in this order.)

2. Select **SP 35 "Head Energy Adjust."** (Input "35", then press Enter key.)

3. Input "15", then press Enter key to set it at **-15%**. (The default setting is -5%.)

4. Press the Clear Modes key to leave the SP mode.

NOTE:

1) The thermal head energy can also be reduced by reducing the input voltage with the potentiometer in the power supply unit (see service manual page 5-17 "ADJUSTING THE THERMAL HEAD VOLTAGE"). However, this is not effective against the above symptom and the above solution must be used. SP 35 enables the adjustment of the pulse length which determines the period that voltage is applied to the thermal head.

2) If you also reduce the press roller pressure (the printing pressure) to reduce the ink set-off, turn the adjusting bolt until the clearance becomes 8 mm. (See service manual page 5-53 "ADJUSTING THE PRINTING PRESSURE." The standard setting for the clearance is 4 mm.) However, this will give just a little improvement against the ink set-off and the following side effects are expected:

   - Since the ink is not transferred quickly enough from the ink roller to paper at the beginning of a printing run, images with insufficient ink will appear on the first few prints.
   - The image density will be slightly lighter.
   - When printing is made on A3 or 11" x 17" (the full size) paper, images on both edges might become faint because of insufficient printing pressure.

3) When you reduce the thermal head energy with the SP mode, tiny white spots tend to be more visible in solid-fill image areas. This is just like the images made with the old VT master. The density of the solid-fill images looks slightly lighter. (Therefore, you should not reduce the thermal head energy more than -15% as indicated in the above procedure.) You can reduce the tiny white spots if the 2 thermal head springs (P/N-C209 4033) and the platen roller (P/N-C209 4047) are replaced with those for the NA3 model (RICOH VT3600, Gestetner 5380, RexRotary 1285, nashuatec CP380, ABDICK 6770).

   - Thermal Head Spring: P/N-C218 4034 (2 springs are needed.)
   - Platen Roller: P/N-C218 4045

   These parts can apply more platen roller pressure against the master during master making and improve the tiny white spots in solid-fill images.

4) If the fences on the paper delivery table are not adjusted exactly to the paper size, ink set-off on the reverse side of prints will increase. Instruct the operator if he is not familiar with this.

RICOH

Technical Bulletin No. RTB-009

SUBJECT: Ink Pump Improvement (For the NA2/NA3/NB2 Only)	DATE: Nov. 15, '95 PAGE: 1 of 2
PREPARED BY: H. Kokubo CHECKED BY: T. Inoue	FROM: 2nd Technical Support Section

CLASSIFICATION:

- ☐ Action Required
- ■ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ☐ Information only
- ☐ Other

MODEL:
Priport
NA2/NA3/NB2/RN925

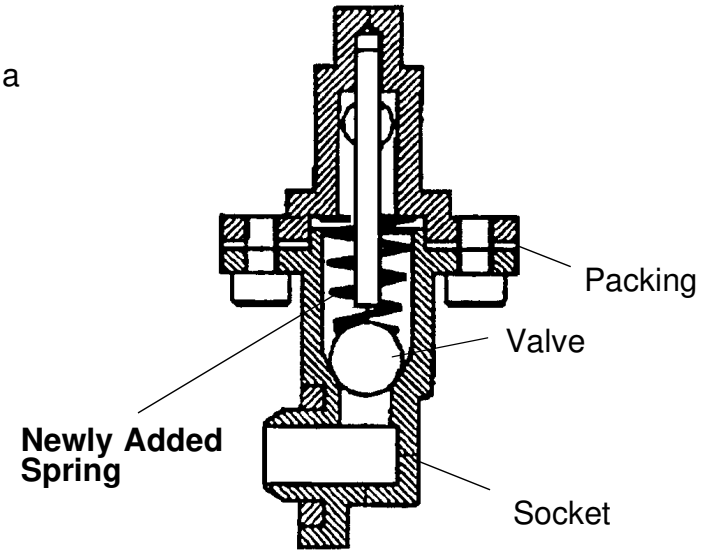
NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

Information for the NA3/NB2/RN925 starts from this bulletin. RTB numbers 1 to 8 are for the NA2 only.

To ensure that all ink in the cartridge is supplied, a spring has been added inside the ink pump as shown to the right. The spring ensures that the small ball, which is used as a valve, is pushed back properly.

This modification has been applied from the September 1995 production runs of all Priport series. The part numbers of the ink pump assemblies remain the same. (Note that the N850 and RN925 have been using the new type from the first mass production.)

There are three types of ink pump. They are the NA/NB type that can hold the 1000 cc ink cartridge, the N type that can hold the 600 cc ink cartridge only, and the N810 type that is for the N810 and N810-II only. See the following table for the applicable models.



[Section Plan of the Bottom Part of the Ink Pump]

TYPE OF INK PUMP	APPLICABLE MODELS
NA/NB	NA-2, NA-3, NB-2
N	N865, N860, N915, N935, N955, and all SS series models.
N810	N810, N810-II

There are two types of spring for these three types of the ink pump. The part numbers are:

C222 4710 (Pump Spring - 21 mm) : For the NA/NB type ink pump.

C224 4715 (Pump Spring - 13 mm) : For the N and N810 type ink pumps.

SOLUTION IN THE FIELD

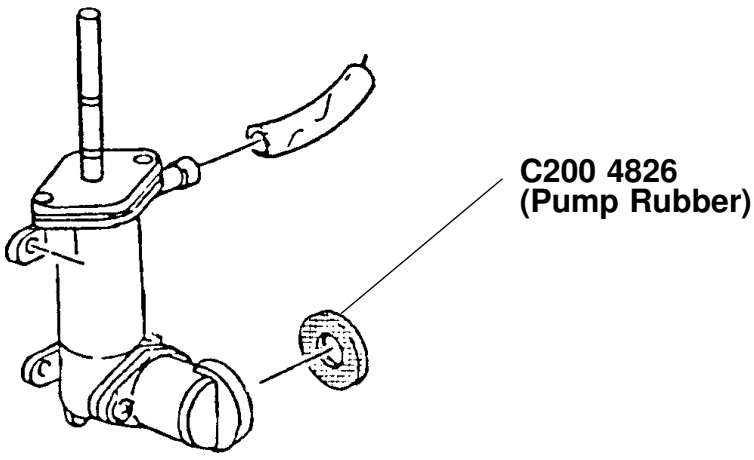
For the field machines, you can install the spring after removing the socket (with two screws). (It takes longer to replace the whole pump assembly.)

CAUTION:	When you remove the socket, ink will leak. Be sure to place absorbent material to prevent ink from getting on the floor.

NOTE: 1. There is a packing between the socket and housing (see the illustration on the previous page). If it is damaged, you may have to replace the packing at the same time. (Normally, this is not required.) The part number is:

C200 4827 (Packing - Pump Socket)

2. A rubber packing is used as shown below in order to ensure that the nozzle of the ink cartridge tightly contacts the pump socket. Check if this part is dislocated. The rubber packing used in the N810, the N865, and the other later models is adhered with glue, but it is not adhered for the other older models.



RICOH	Technical Bulletin	No. RTB-010
SUBJECT: Master Eject Belt Modification		DATE: Mar. 31, '96 PAGE: 1 of 2
PREPARED BY: H. Kokubo CHECKED BY: M. Iwasa	FROM: Technical Support Section	
CLASSIFICATION: ☐ Action Required ☐ Revision of service manual ☐ Troubleshooting ■ Information only ☐ Retrofit Information ☐ Other		MODEL: Priport NA2/NA3/NB2/RN925

NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

PROBLEM

Master eject jams frequently occur. In the worst case, the upper or lower master eject belts slip off the rollers.

CAUSE

At the March 1995 production of all PRIPORT models, the vendor who produced the upper and lower master eject belts was changed. (The part numbers were not changed because there was no change in configuration.) Since then, all PRIPORT models have been using the belts manufactured by the new vendor.

Recently it was found that some of these parts tend to stretch and can cause the problem, as stated above, due to part variation. (The occurrence of the problem varies from one lot to another.)

SOLUTION

The upper and lower master eject belts will be modified as follows:

Old P/N	New P/N	Description	Q'ty used	Inter-change-ability	Applicable Models
C219 3545	**C219 3605**	Upper Belt	4 → 4 * (5 → 5)	x/o	NB2, N850, RN925, NA33 * : The number of both parts used for the NA33 is 5.
C219 3546	**C219 3606**	Lower Belt	4 → 4 * (5 → 5)	x/o	
C200 3545	C219 3605	Upper Belt	4 → 4 * (5 → 5)	x/o	NA3, NA2, N865, and other older models. * : The number of both parts used for the NA3 and NA2 is 5.
C200 3546	C219 3606	Lower Belt	4 → 4 * (5 → 5)	x/o	

NOTE: There are two types of old part numbers as shown in the table. Both these types will be changed into a new type of upper and lower belt.

The new upper and lower belts will be implemented into the production from April 1996. For the service parts, the SPC will have the new parts in stock soon.

Technical Bulletin No. RTB-011

SUBJECT: Worn Main Drive Gear (NA3/NB2 Only)	DATE: June 15, '96 PAGE: 1 of 2
PREPARED BY: H. Kokubo	FROM: Priport Service Planning Section

CLASSIFICATION:

- ☐ Action Required
- ■ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ☐ Information only
- ☐ Other

MODEL:
Priport
NA2/NA3/NA33/
NB2/RN925

NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NA33:	Ricoh VT3800/Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

Information for the NA33 starts from this bulletin. RTBs 1 to 10 are for the NA2/NA3/NB2/RN925 only.

It was found that gears C2032215 and C2032326 (see the illustration on the next page) can rapidly wear out if they are not greased. In particular, gear C2032215 wears out faster (after about 30,000 to 50,000 copies).

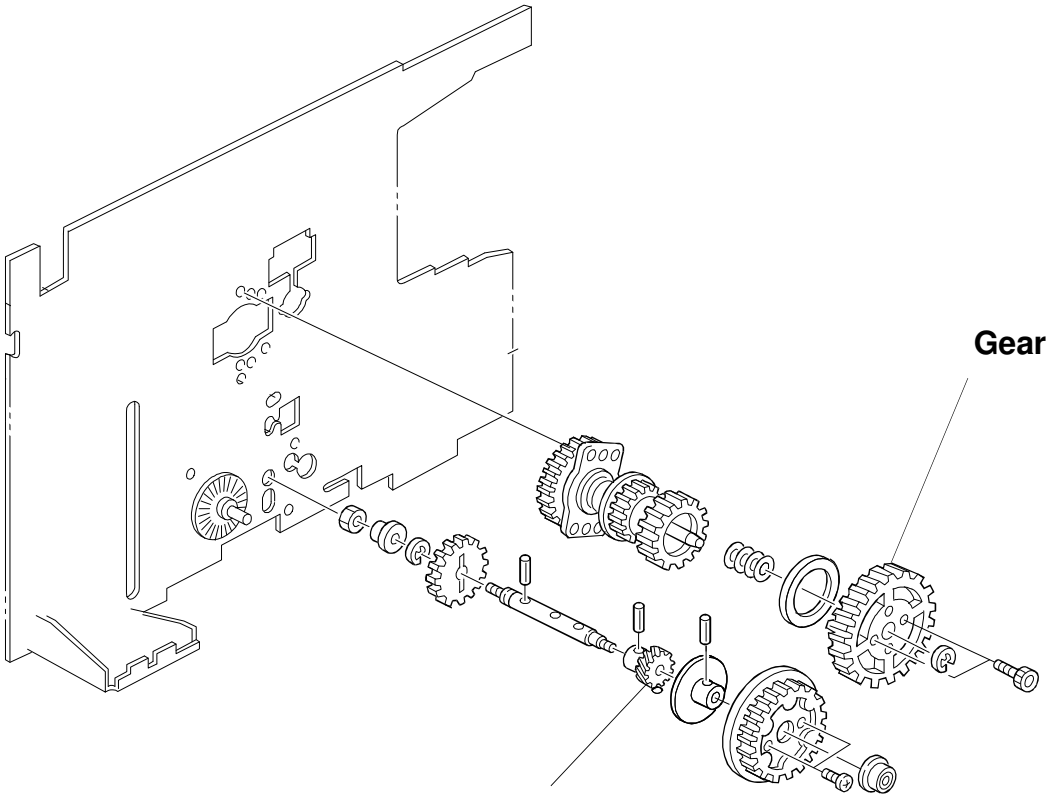
It was also found on the production lines that some machines which were manufactured during the period from the end of 1994 to May 1995 have a lack of greasing for these gears. From April 1995, an inspection process was added to check the greasing of these gears.

NOTE: The models NA2, RN925 and NA33 do not have this problem. The RN925 and NA33 started manufacture after May 1995, and there was no production of the NA2 during that period. Therefore, it is only possible for the NA3 and NB2 to have this problem.

RECOMMENDATIONS

Grease the gears (evenly on the surface of the gear C2032215) in the following cases:

1. For the machines detailed above (the NA3 and NB2 manufactured between the end of 1994 and May 1995), check if grease is properly applied and grease if necessary.
2. Grease the gears every time when they are replaced.
3. Grease at yearly PM intervals (as mentioned in the service manual).



RICOH Technical Bulletin No. RTB-012

SUBJECT: New Paper Delivery Table

ISSUED ON: July 15, 1996

ISSUED B

H. Kokubo
Priport Service Planning Section

CLASSIFICATION:

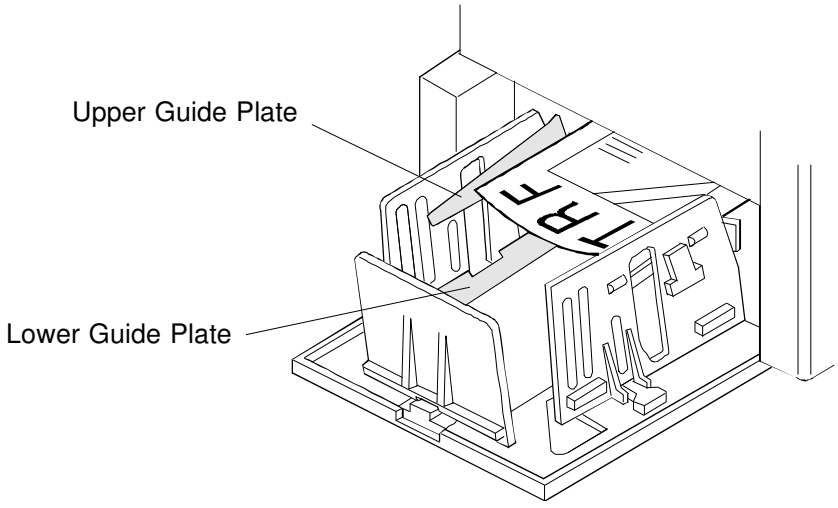
- ☐ Action Required
- ☐ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ■ Information only
- ☐ Other

MODEL: PRIPORT

NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NA33:	Ricoh VT3800/Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

This bulletin is to inform you that the new paper delivery table has been used from the June 1996 production for the NB2, RN925, and NA33 models. (The NA2 and NA3 models were discontinued. For the cut-in serial numbers, refer to the Modification Bulletins for each model.)

The features of the new table are as follows:



1. Thanks to the newly added small guide plates on the upper of each front and rear side fences, the copies are more evenly stacked on the table. Both edges of the copy are guided by the small guide plates as the copy is fed out. Then, the copy is correctly directed to the end plate for stacking.

------ Continued ----------

The end plate is also new. The material and configuration of the cushion have been changed. The new end plate better receives the copies for stacking. (The 2nd end plate, which is for the smaller sized paper, remains the same.)

The other small guide plates, which are also provided on the bottom of each side fence, can hold the copies in the center of the table while the copies are stacked on the bottom.

This feature is more beneficial when thinner paper is used.

2. To prevent the side fences and end fence of the paper delivery table from being pushed and spread outwards while the copies are stacked, the springs that hold those fences straight-up have been strengthened. This also helps the copies to stack evenly.

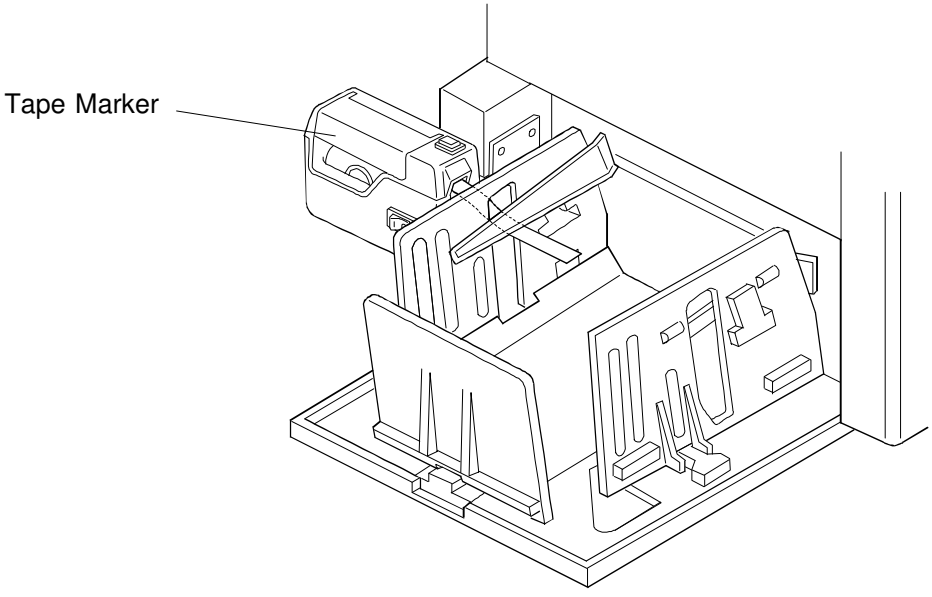
REMARKS for using the new paper delivery table

1. It is recommended to use the upper small guide plates when thin or normal paper (80 g/m² or 20 lbs and thinner paper) is used. For thicker paper, close the guide plates. If paper is too thick, the paper tends to be caught by the upper guide plates. (Thick paper can be stacked evenly even without using the upper guide plates.)

2. The paper stack capacity of the table reduces to around 750 sheets (this varies depending on paper type) when the upper small guide plates are used. Close the guide plates to achieve the maximum paper stack capacity.

3. When you store the paper delivery table, you must first close the upper small guide plates.

4. The optional Tape Marker can be used for up to 500 sheets (this varies depending on paper type). When the old paper delivery table is used, the Tape Marker's capacity was around 750 sheets. This is because the position of the Tape Marker has been slightly lowered to prevent the dispensed tape from touching the added guide plate.

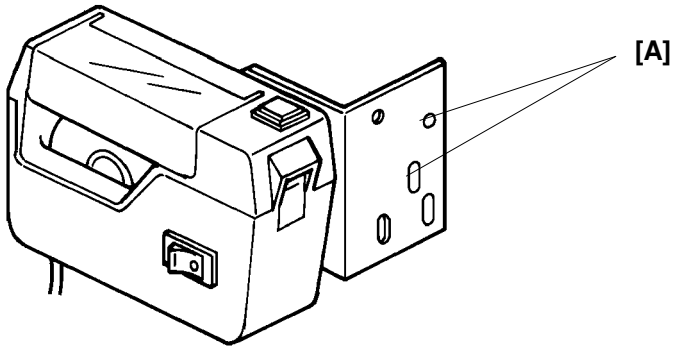


RICOH **Technical Bulletin** **No. RTB-012**

5. Because of the new paper delivery table, the position of the Tape Marker has been slightly lowered (as mentioned above). The tape marker bracket has been changed from the June 1996 production of the Tape Marker as follows:

Old P/N	New P/N	Description	Q'ty Used	Inter-change-ability	Location on Parts Catalog (Index-Page)
C532 2004	**C532 2111**	Tape Marker Bracket	1 → 1	X/O	31-3

To use the old type Tape Marker with the new paper delivery table, a new bracket is necessary. The new bracket has an additional screw hole. Install the Tape Marker using the holes [A] as shown below:



6. Since freshly printed sheets are stacked on the bottom of the delivery table, the ink on the top copy of the stack tends to be transferred to the reverse side of the next fed-out copy (this is called "ink set-off"). Especially with the new paper delivery table, this is likely on the middle part (the reverse side) of copy.

   When the added small guide plates are used, both edges of the copy are guided by the guide plates, as mentioned before. Due to this, the copy tends to buckle downward and the middle part of the copy first reaches and smears the bottom of the delivery table. (The ink set-off is not so visible when there is not a large solid-fill image in the middle of the copy.)

   In June 1996 production for the NB2, RN925, and NA33 models, the new paper delivery table has been implemented. At the same time, the software of each model has been changed to reduce ink set-off, as follows:

Applicable Models	Old P/N of the ROM	New P/N of the ROM	Notes
NA33	C223 8045D	C223 8059 (Check Sum:423H)	The suffix has been advanced for the main control board. (C2238042G → H)
	C223 8047	C223 8061 (Check Sum:EFDH)	There are two ROMs on the main control board, and the old and new ones are interchangeable as a set only.
RN925	C2228045H	C222 8049 (Check Sum:81AH)	The suffix has been advanced for the MPU board. (C2228042M → N)

   For the NA33, the default of the SP mode setting (SP35-1: Head Energy Adjust for Normal Mode) has been changed from -7% to -17%. For the RN925, the thermal head energy has been reduced to -17% just like the NA33, however the SP mode is not available in this model. (Since there is little production for the NB2 model, the software was not changed. The default setting remains -7%. If there is production after June 1996, the SP mode setting: SP35 Head Energy Adjust, will be manually changed to -17% on the production line.)

   For the field units, carry out the following actions if the ink set-off level is not acceptable for the user.

Applicable Models	Required Actions
NA33, NB2	Reduce the thermal head energy using SP35. Set it at -17%.
RN925	Replace the ROM with the new one.

RICOH Technical Bulletin No. RTB-013

SUBJECT: Paper Feed Jams (NA33 Only)

ISSUED ON: July 31, 1996

ISSUED BY:
H. Kokubo,
Priport Service Planning Section

CLASSIFICATION:
- ☐ Action Required
- ■ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ☐ Information only
- ☐ Other

MODEL: PRIPORT

NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NA33:	Ricoh VT3800/Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

SYMPTOM:

Paper does not reach the second feed roller and jams. This is especially likely for the first sheet fed or the trial print that is always made after making a new master.

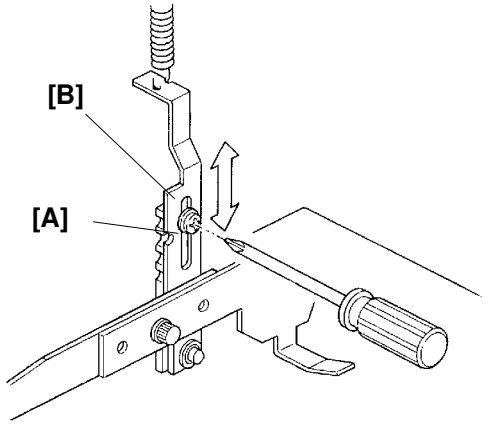
CAUSE:

The paper feed roller pressure is too low. It was found that on the production line the adjustment was performed improperly, for some units. Therefore, this problem can occur in the NA33 model only.

SOLUTION:

From June 1996, the adjustment has been corrected on the production line. If the above problem occurs in the field, re-adjust the paper feed roller pressure as follows:

1. Check the original position first, then loosen the screw [A] while holding the lower adjustment plate [B].
2. Shift the lower adjustment plate [B] up by one notch to increase the paper feed roller pressure. Then, re-tighten the screw [A].



RICOH Technical Bulletin No. RTB-014

SUBJECT: Paper Table Drive Error E-02 (N850 and NA33 Only)

ISSUED ON: July 31, 1996

CLASSIFICATION:

- ☐ Action Required
- ■ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ☐ Information only
- ☐ Other

ISSUED BY:

H. Kokubo,
Priport Service Planning Section

MODEL: PRIPORT

NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NA33:	Ricoh VT3800/Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

SYMPTOM:

The paper feed table is not driven. Service call status code E-02: paper table drive error is displayed.

CAUSE:

The dc motor that drives the table occasionally generates electrical noise when it starts rotating. This electrical noise is input into the ac drive board and damages IC301 on the board.

Electrical noise tends to be generated especially when the motor is still new. While the motor turns, the brushes inside are not yet worn in and this can cause electrical noise to occur.

Since a dc motor of this type is used in the N850 (Ricoh VT2200/Gestetner 5327/ RexRotary 1252/nashuatec CP327/ABDICK 6530) and NA33 (Ricoh VT3800/ Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790) models only, this problem does not occur in the other PRIPORT models.

SOLUTION:

To prevent the electrical noise from being generated, a harness which contains two capacitors will be installed between the ac drive board and dc motor from the August 1996 production.

-------- Continued ----------

RICOH **Technical Bulletin** **No. RTB-014**

For the field units, the following part has been registered as a service part:

Motor Relay Harness Kit: P/N-C223 8131

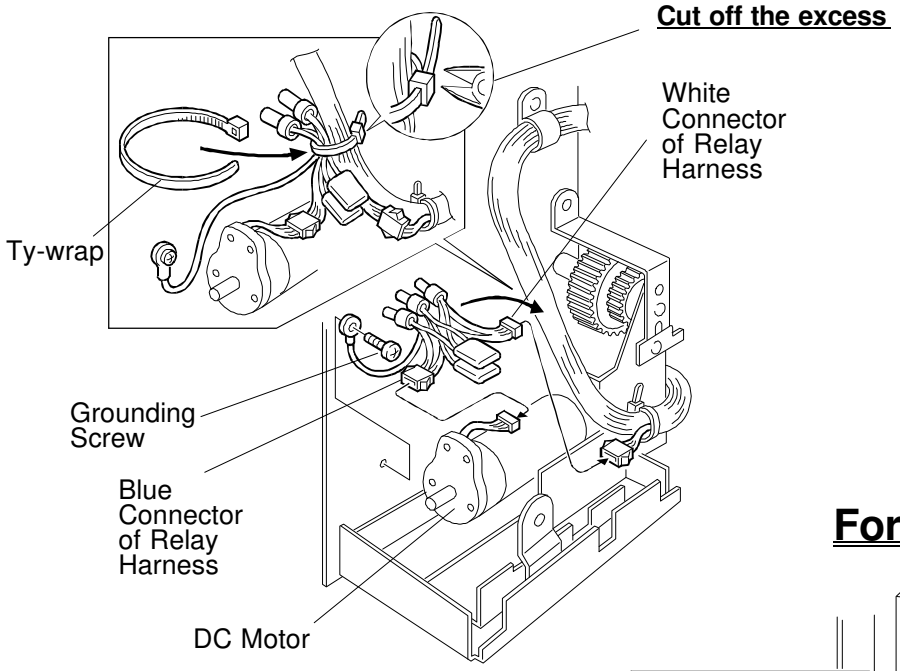
NOTE: The above part includes:

- One Relay Harness (includes the capacitors)
- One Ty-wrap
- One Grounding Screw (M4 x 6)

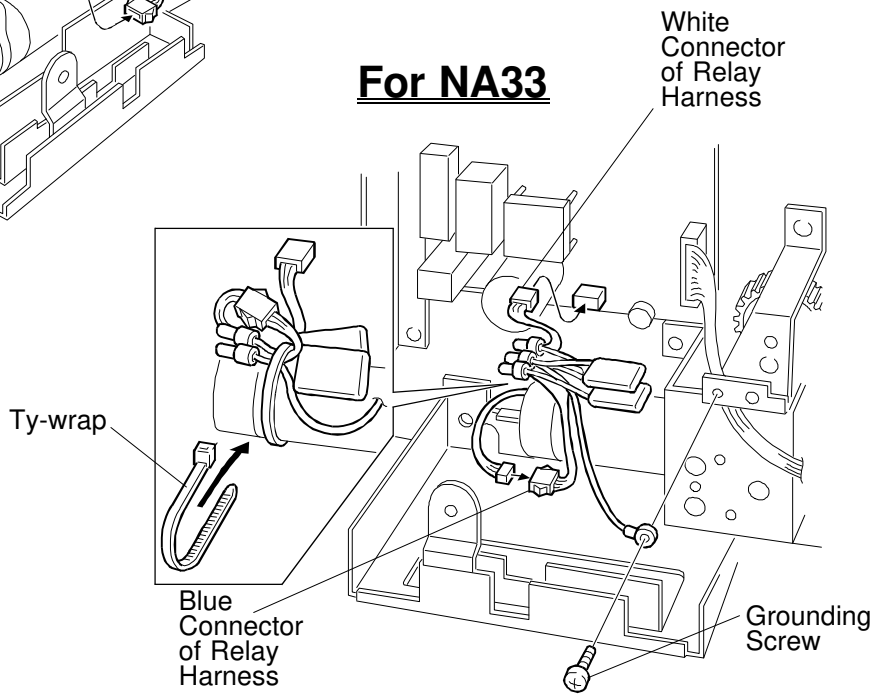
In the field, install the kit as shown below:

NOTE:
- The layout of the dc motor is slightly different between the N850 and NA33 models as shown. To prevent the relay harness from being caught by the gears, firmly secure it with the Ty-wrap as shown in the illustrations for each model.
- Since the Ty-wrap is too long for the N850 model, cut off the excess, as shown.

For N850



For NA33



RICOH Technical Bulletin No. RTB-015

SUBJECT: Paper Leading Edge Dirty with Ink

ISSUED ON: August 31, 1996

CLASSIFICATION:

- ☐ Action Required
- ■ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ☐ Information only
- ☐ Other

ISSUED BY:

H. Kokubo,
Priport Service Planning Section

MODEL: PRIPORT

NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NA33:	Ricoh VT3800/Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790/SVN3300DNP
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

SYMPTOM:

During a long printing run, unwanted ink appears at the leading edge of copies. At first, it is very hard to see, but it becomes more visible as the printing continues.

CAUSE:

Due to rough edges of the paper, the master wrapped around the drum becomes damaged.

Just when the leading edge of paper reaches under the drum, it is pressed against the drum surface, so that the master is wrapped around by the press roller. Due to this repeating action, the master's surface is gradually torn where the paper leading edge contacts it.

Also, if paper generates a lot of paper dust, this is accumulated on the press roller surface and damages the master in the same manner.

Normally, even if the master is damaged, there is no ink around the area beneath the master where the paper leading edge contacts it (there are no holes in the metal screen). However, after a long printing run, ink leaks onto this area and is transferred to the paper through the damaged part of the master.

SOLUTION:

1. Change the paper type. Re-setting the paper on the paper feed table upside-down (so that the rough edge of the paper faces downward) may also solve the problem.
2. Change the image position on paper slightly using the IMAGE SHIFTING key before the leading edge of the paper becomes dirty with ink.

-------- Continued ----------

3. Cover the leading edge part of the cloth screen on the drum with tape, so that ink does not leak even when the master is damaged.

   Instructions and remarks for installing the tape for each PRIPORT model are as follows:

Remarks general to all models:

- It is recommended to use:

  Teflon Tape - 19 mm: P/N-A012 9112

- The position of the tape for each model has been determined to maintain the specified leading edge blank margin for copies. (The specification is 10 mm for the NA2/N915/935/955 models, 8 mm for the NA3 model, and 5 mm for the other models.)

- Even after installing the tape, the same problem may occur if the leading edge registration of copies is not adjusted properly (if the paper feed timing is delayed). At first, check that the leading edge registration of copies is OK. If it is out of specification, follow the "SECOND FEED ROLLER START TIMING" adjustment procedure in the service manual. (For the N810 and N810-II models, follow the "LEADING EDGE REGISTRATION ADJUSTMENT" procedure.)

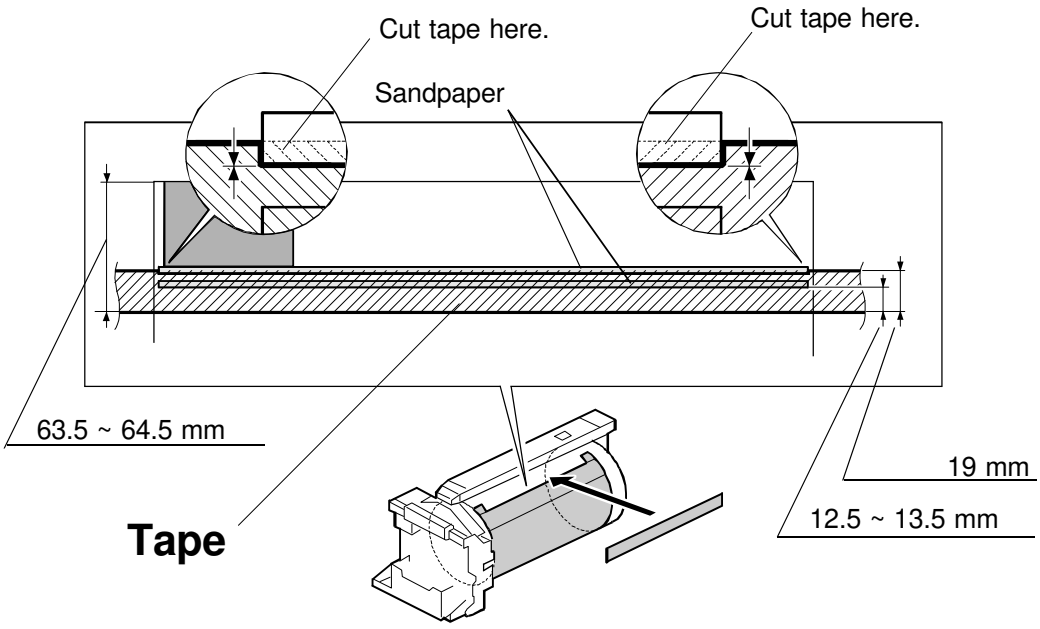
- For each model, strip(s) of sandpaper are used on the leading edge part of the cloth screen. This prevents the master wrapped around the drum from slipping out of the master clamper due to the repeating press roller on/off action. Avoid covering all the sandpaper when you install the tape. (To adhere the tape firmly, some area of the sandpaper should be covered. Details are in the instructions for each model on the following pages.)

- Even if the sandpaper is not used on the cloth screen (the old type cloth screen), install the tape at the same position by measuring the distance from the edge of the cloth screen. (Refer to the distance between the edge of the screen and the sand paper, which is shown in the following illustrations for each model.)

RICOH **Technical Bulletin** **No. RTB-015**

For NA33 model

NA33: Ricoh VT3800/Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790/SVN3300DNP



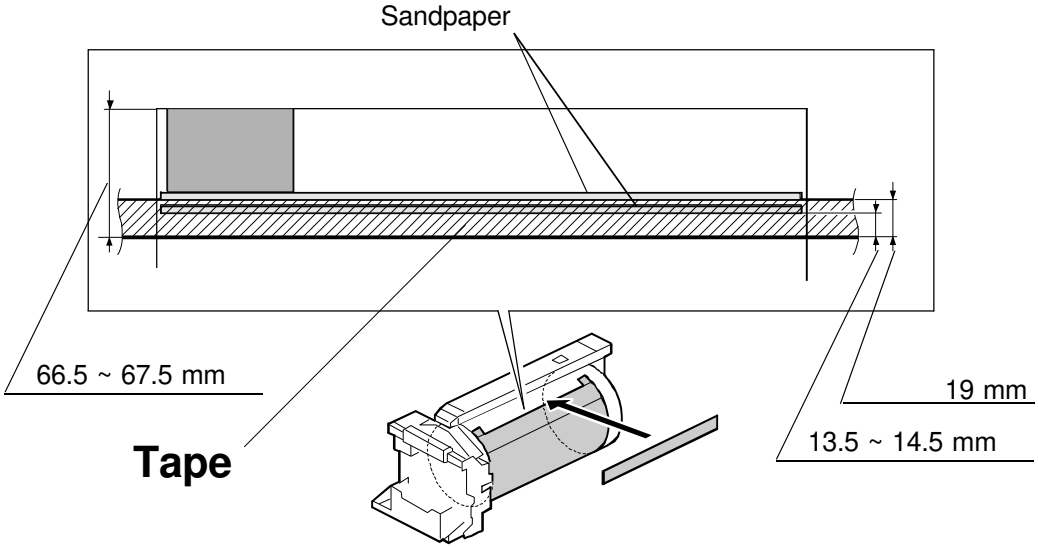
REMARKS:

- Cut the tape where it covers the upper strip of sandpaper as shown. Be careful not to damage the cloth screen surface.
- Cut both edges of the tape at the edge of the metal screen. Do not let the tape ride over the drum flanges.

RICOH **Technical Bulletin** **No. RTB-015**

For NA3 and NA2 Models

NA2: Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3: Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770



REMARKS:

- The position of the tape is slightly different from that for the NA33 model since the specification of the leading edge blank margin is different. (The position of the sandpaper is also different.) The upper edge of the tape should meet between the two strips of sandpaper. You do not have to cut the tape (unlike in the case of the NA33 model).

- Cut both edges of the tape at the edge of the metal screen. Do not let the tape ride over the drum flanges.

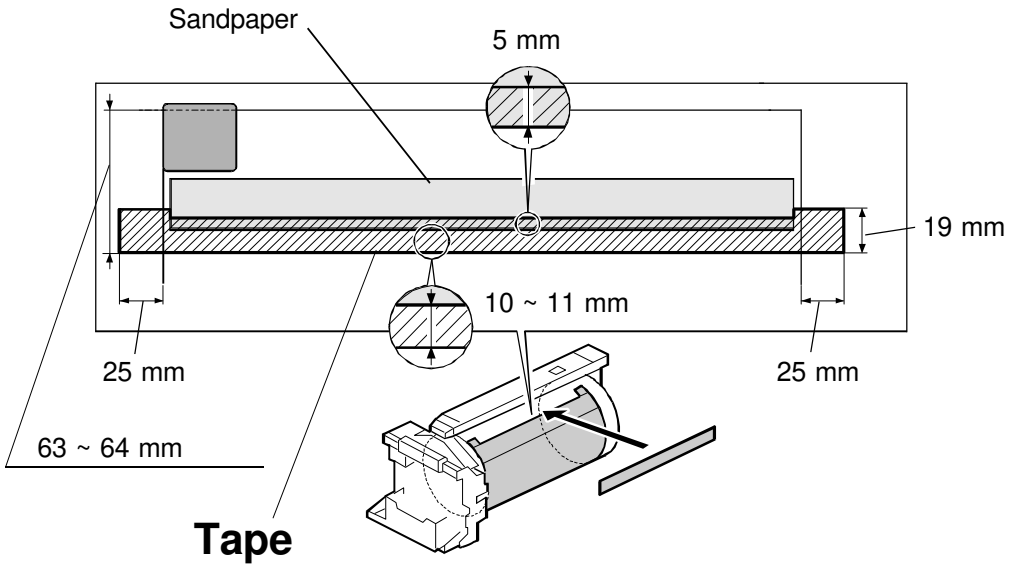
- Even if the sandpaper is not used on the cloth screen (the old type cloth screen), install the tape at the same position by measuring the distance from the edge of the cloth screen to the lower edge of the tape (between 66.5 and 67.5 mm).

- Since the specification of the leading edge blank margin for the NA2 model is 10 mm (8 mm for the NA3 model), it is permissible to install the tape 2 mm lower than the position indicated above (NA2 only).

RICOH Technical Bulletin No. RTB-015

For RN925, NB2, N850, N860, N865, N915, N935, and N955 Models

RN925: Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550
NB2: Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
N850: Ricoh VT2200/Gestetner 5327/RexRotary 1252/nashuatec CP327/ABDICK 6530/SVN3200DNP
N860: Ricoh VT2005/Gestetner 5323/RexRotary 1245/nashuatec CP323
N865: Ricoh VT2105/Gestetner 5325/RexRotary 1250/nashuatec CP325/ABDICK 6520
N915: Ricoh VT2100/VT2130/VT2150/Gestetner 5310/5315/5320/RexRotary 1240/1241/1242/ nashuatec CP310/CP315
N935: Ricoh VT2300/Gestetner 5330/RexRotary 1260/nashuatec CP330
N955: Ricoh VT2500



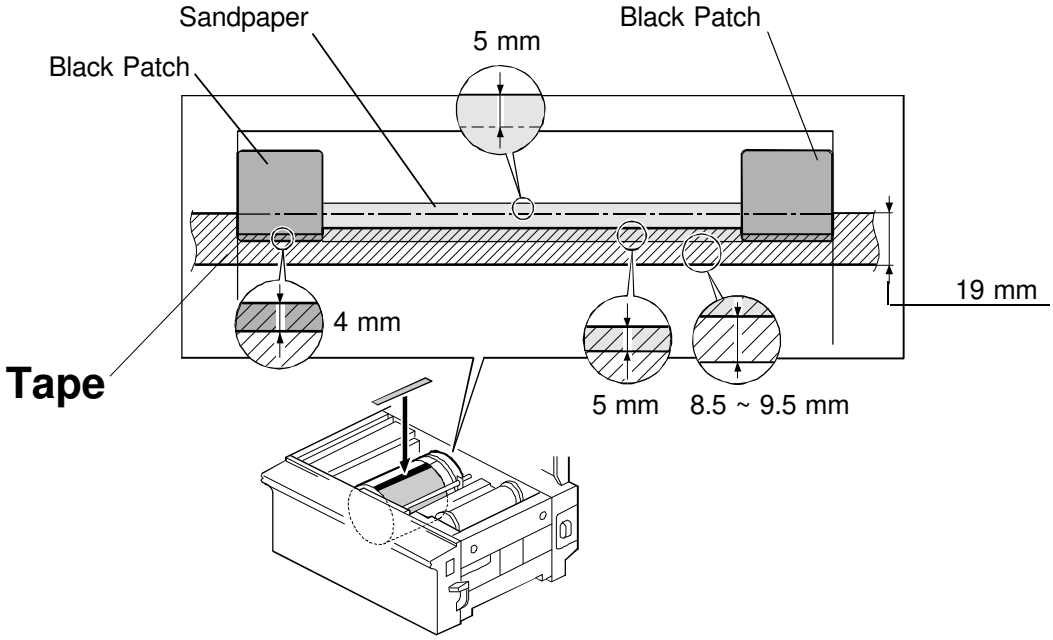
REMARKS:

- Cut the tape where it covers the sandpaper as shown. (The indicated area must be left as shown to hold the tape on the screen firmly.) Be careful not to damage the cloth screen surface.
- Cut both edges of the tape as indicated.
- Even if the sandpaper is not used on the cloth screen (the old type cloth screen), install tape at the same position by measuring the distance from the edge of the cloth screen to the lower edge of the tape (between 63 and 64 mm).
- Since the specification of the leading edge blank margin for the N915/935/955 model is 10 mm (5 mm for the other models), it is permissible to install the tape 5 mm lower than the position indicated above.

RICOH **Technical Bulletin** **No. RTB-015**

For N810 and N810-II Models

N810: Ricoh VT1730/Gestetner 5303/RexRotary 1220/nashuatec CP303/ABDICK 6120
N810-II: Ricoh VT1800/Gestetner 5304/RexRotary 1222/nashuatec CP304/ABDICK 6130/SVN3100DNP



REMARKS:

- Cut the tape where it covers the sandpaper as shown. (The indicated area must be left as shown to hold the tape on the screen firmly.) Be careful not to damage the cloth screen surface.
- **Also, cut the tape where it covers the black patches (for the drum master detection sensor) as shown. It they are covered, drum master detection does not work properly.**
- Cut both edges of the tape at the edge of the metal screen. Do not let the tape ride over the drum flanges.
- Even if the sandpaper is not used on the cloth screen (the old type cloth screen), install tape at the same position by measuring the distance from the edge of the black patch to the lower edge of the tape (between 8.5 and 9.5 mm).

RICOH Technical Bulletin No. RTB-016

SUBJECT: Add Ink Indicator (Software Modification) - N850 and RN925 Only -

ISSUED ON: August 31, 1996

CLASSIFICATION:

- ☐ Action Required
- ☐ Troubleshooting
- ☐ Retrofit Information
- ☐ Revision of service manual
- ■ Information only
- ☐ Other

ISSUED BY:

H. Kokubo,
Priport Service Planning Section

MODEL: PRIPORT

NA2:	Ricoh VT3500/Gestetner 5375/RexRotary 1280/nashuatec CP375/ABDICK 6720
NA3:	Ricoh VT3600/Gestetner 5380/RexRotary 1285/nashuatec CP380/ABDICK 6770
NA33:	Ricoh VT3800/Gestetner 5385/RexRotary 1290/nashuatec CP385/ABDICK 6790/SVN3300DNP
NB2:	Ricoh VT2600/VT2630/Gestetner 5360/RexRotary 1270/nashuatec CP360
RN925:	Ricoh VT2400/Gestetner 5340/RexRotary 1255/nashuatec CP340/ABDICK 6550

Problems of Current Software:

1. **N850 and RN925 Only**
   At installation of a new machine, the ADD INK INDICATOR is not reset even after an ink cartridge is installed and the drum idling procedure is carried out.

2. **RN925 Only**
   When a paper jam occurs at the sorter exit (the sorter bin) during a copy run ***with the sorting mode in combination with the auto cycle mode***, you would clear the jammed paper and press the Reset key to clear the jam condition. Then, normally the copy run should be continued by pressing the Start key again.

   However, when the Start key is pressed again in this case, the paper delivery table (the proof tray) lowers to the non-sort position and all copies are fed to the paper delivery table, NOT to the sorter bins, due to a software problem. After all copies are fed-out, all keys on the operation panel are locked out. The main switch must be turned off then on to reset this condition.

   This problem occurs only when the optional sorter is installed.

CAUSE:

1. At installation, to start rotating the drum and to supply ink to the drum, the drum idling procedure: ***"While holding down the "0" key on the operation panel, press the Reset key"***, is used.

   In the other Priport models, if sufficient ink is detected after performing the above drum idling procedure, the ADD INK INDICATOR is reset (disappears) even without depressing the RESET key. However, in the N850 and RN925 models, the ADD INK INDICATOR is NOT reset by the drum idling procedure even if there is enough ink. (**It is reset by depressing the RESET key.**)

--------- Continued ----------

RICOH **Technical Bulletin** **No. RTB-016**

This problem does not occur if you do not use the drum idling procedure. When the ADD INK INDICATOR is displayed during the normal printing procedure, it can be reset properly by depressing the RESET key.

2. An error in the software.

SOLUTION:

The software has been changed from the August 1996 production.

The ADD INK INDICATOR is reset if sufficient ink is detected after performing the drum idling procedure, just like in the other Priport models. Even if a paper jam occurs at the sorter bin, the copy run can continue properly.

The part numbers (or the suffixes) of the ROMs and boards have been changed as follows:

RN925

Old P/N	New P/N	Description	Note
C222 8049	C222 8049A	IC124 - M27C512-15F1	New Check Sum: E75H
C222 8042N	C222 8042P	MPU Board	

N850

Old P/N	New P/N	Description	Note
C224 8045C	C224 8075A	IC134 - M27C512-15F1	New Check Sum: 95FH
C224 8042H	C224 8042J	MPU Board	

Model: PRIPORT NA2/NA3/NA33/NB2/RN925	**Date:** 30-Jun-97	**No: 017**
Subject: Master Eject Belt Slip-off	**Prepared by:** H. Kokubo, Priport Service Planning Section	

Classification:

☒ Troubleshooting	☒ Part information	☐ Action required
☐ Mechanical	☐ Electrical	☐ Service manual revision
☐ Paper path	☐ Transmit/receive	☐ Retrofit information
☐ Other ( )		

Model Name:

NA2: Ricoh VT3500, Gestetner 5375, RexRotary 1280, nashuatec CP375, ABDICK 6720
NA3: Ricoh VT3600, Gestetner 5380, RexRotary 1285, nashuatec CP380, ABDICK 6770
NA33: Ricoh VT3800, Gestetner 5385, RexRotary 1290, nashuatec CP385, ABDICK 6790, SVN 3300DNP
NB2: Ricoh VT2600/VT2630, Gestetner 5360, RexRotary 1270, nashuatec CP360
RN925: Ricoh VT2400, Gestetner 5340, RexRotary 1255, nashuatec CP340, ABDICK 6550

PROBLEM

We found that the master eject belt may slip off in the following situation:

Even when the Full Master Box indicator (the Empty Master Eject Box indicator) lights, it can be reset once an operator turns the machine off then on (without removing the used masters). If this occurs, the used masters fully stacked in the box can interfere with the master eject belts, resulting in the slip-off problem.

SOLUTION 1

To minimize this problem, the recent series models have the Initial Compression mode in which full master box detection is carried out each time the machine is switched on. For each model, this mode can be set as follows:

- GOLD: Set SP No. 85 to "1"
- N850: Set DPS103-3 on the main board to ON
- N865/N860: Set DPS101-8 on the main board to ON
- RN925: Set SP No. 2-11 to ON
- NA33: Set SP No. 85 to "1"
- NA3: Set SP No. 85 to "1"
- NB2: Set SP No. 85 to "1"

NOTE: An instruction to the operator is also required, to instruct them to empty the master eject box when it is full.

Model: PRIPORT NA2/NA3/NA33/NB2/RN925	**Date:** 30-Jun-97	**No: 017**

SOLUTION 2

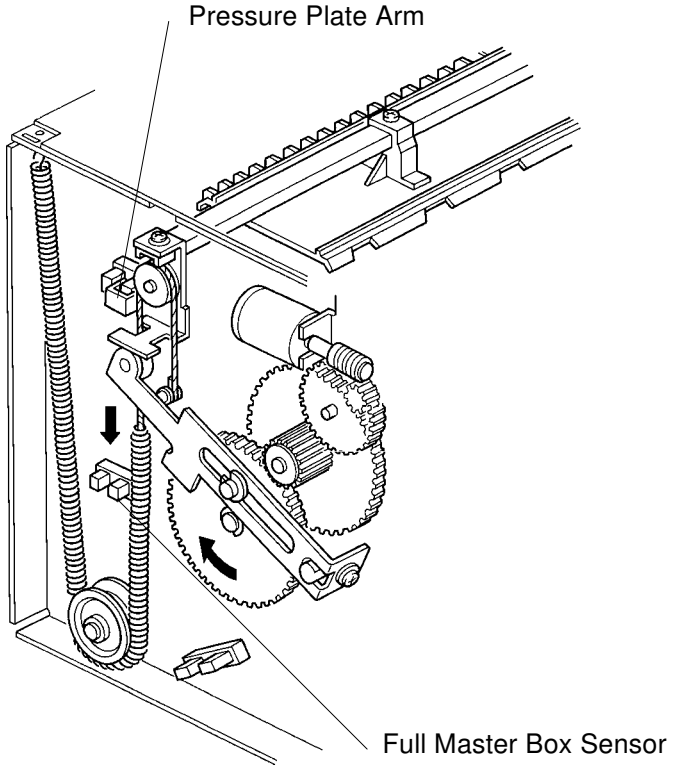
The latest models; i.e. the Gold, N850, and RN925, use a master eject mechanism that is slightly different from the older models. This enables a higher capacity for the master eject box.

Due to this, for these models, the ejected masters tend to interfere more with the master eject belts when the box is full, compared with the older models. To minimize the occurrence of the belt slip-off problem, the capacity of the master eject box has been reduced slightly by using a new actuator for the full master box sensor. (The master eject box capacity is still within the current specification.)

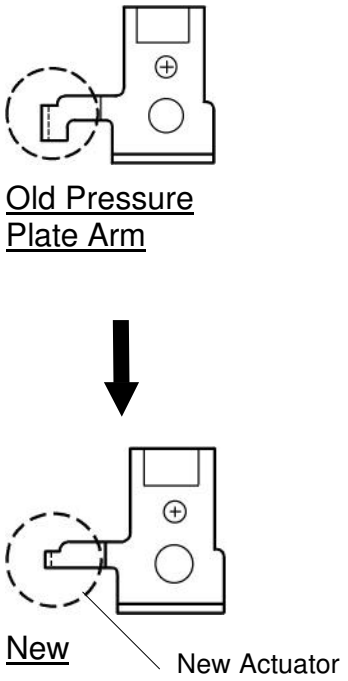
Old Part Number	New Part Number	Description	Interchangeability
C209 3533	**C227 3533**	**Pressure Plate Arm**	**X/O**

The new part has a narrower actuation plate as shown below. This means that the full master condition will be detected earlier than before.

If "SOLUTION 1" is not good enough, install the new part on the operation side of the master eject unit (see below).



VIEW FROM OPERATION SIDE



Model: PRIPORT NA2/NA3/NA33/NB2/RN925	**Date:** 30-Jun-97	**No: 017**

The new part has been implemented from the May 1997 production. The new actuator can also be used for the NA33, NA3, NB2, and NA2 models, but this is for the field countermeasure only. This is because the specification of the master eject box capacity cannot be maintained if the new actuator is used for these models.

NOTE: On the production line, two of the same new part are used both on the operation and non-operation sides for part standardization purposes. For the field solution, you do not have to replace the non-operation side part.

Model: PRIPORT NA2/NA3/NA33/NB2/RN925/NA6	**Date:** 31-Mar-98	**No: 18**
Subject: Master Feed Jam or Error - NA6 Only -	**Prepared by**: H. Kokubo, Priport Service Planning Section	

Classification:
- ☒ Troubleshooting
- ☒ Mechanical
- ☐ Paper path
- ☐ Other ( )
- ☐ Part information
- ☐ Electrical
- ☐ Transmit/receive
- ☐ Action required
- ☐ Service manual revision
- ☐ Retrofit information

Model Name:

NA2: Ricoh VT3500, Gestetner 5375, RexRotary 1280, nashuatec CP375, ABDICK 6720
NA3: Ricoh VT3600, Gestetner 5380, RexRotary 1285, nashuatec CP380, ABDICK 6770
NA33: Ricoh VT3800, Gestetner 5385, RexRotary 1290, nashuatec CP385, ABDICK 6790, SVN 3300DNP
NB2: Ricoh VT2600/VT2630, Gestetner 5360, RexRotary 1270, nashuatec CP360
RN925: Ricoh VT2400, Gestetner 5340, RexRotary 1255, nashuatec CP340, ABDICK 6550
NA6: Ricoh VT6000, Gestetner 5390, RexRotary 1295, nashuatec CP390, SVN 3400DNP

- Information for the NA6 begins with this bulletin. RTB number 1 to 17 are for the other models only.
- Note that this issue is related to the NA6 only.

PROBLEM

The following symptoms occurred on the production line:

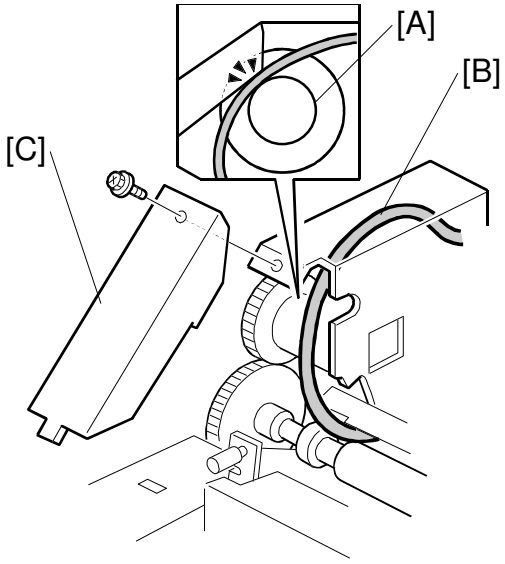
1. Master feed jam (location C jam).
2. The length of the master that wraps around the drum is shorter than normal. This causes a master eject jam during the next master making process. This is because the master eject rollers cannot catch the trailing edge of the master on the drum.

CAUSE

There is a torque limiter [A] built into the gear on the upper master feed roller. If the wire harness [B] from the cutter unit is run (installed) improperly when the gear cover [C] is installed, the gear cover may catch and press the wire harness against the sleeve of the torque limiter.

If this occurs, the rotation of the upper master feed roller is interfered with and the above problems will occur.

NOTE: The torque limiter is used in the NA6 only, and this problem does not occur in other PRIPORTs.

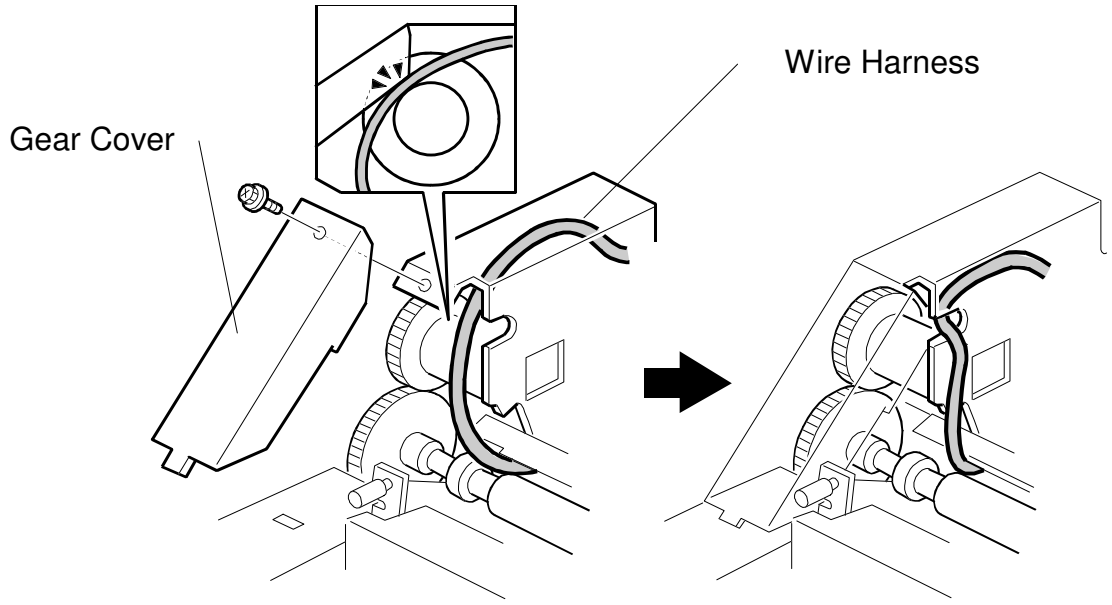


Model: PRIPORT NA2/NA3/NA33/NB2/RN925/NA6	Date: 31-Mar-98	No: 18

SOLUTION

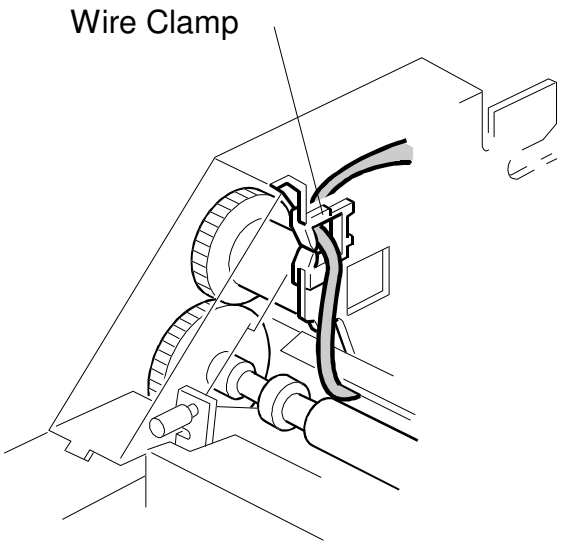
When you reinstall the gear cover, be sure to install the wire harness from the cutter unit as shown below.

NOTE: This gear cover is removed when you remove the thermal head or platen roller.



On the production line, this part has been carefully inspected from the February 1998 production.

From the April 1998 production, a wire clamp is installed on the plotter unit frame to fix the wire, as shown to the right. (The part number of the frame remains the same, although the cutout for the clamp has been added.)



Model: PRIPORT NA2/NA3/NA33/NB2/RN925/NA6	**Date:** 15-Apr-00	**No:** R-C210-**19**
Subject: 2nd Feed Roller Damage	**Prepared by:** H. Onodera, Priport Service Planning Section	

Classification:
- ☒ Troubleshooting
- ☐ Mechanical
- ☐ Paper path
- ☐ Other ( )
- ☐ Part information
- ☒ Electrical
- ☐ Transmit/receive
- ☐ Action required
- ☐ Service manual revision
- ☐ Retrofit information

Model Name:

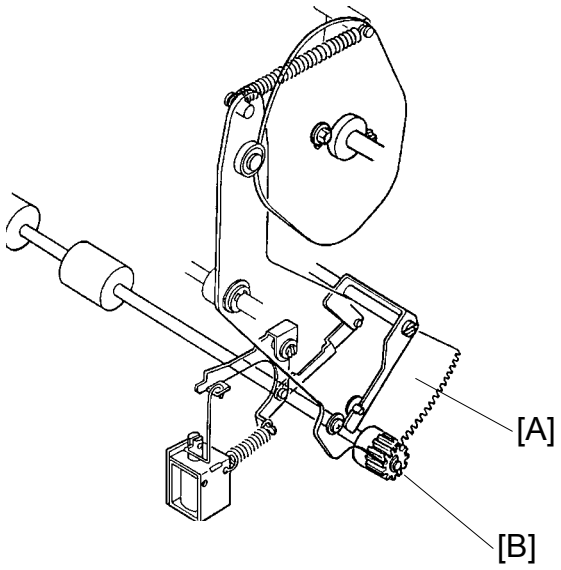
NA2: Ricoh VT3500, Gestetner 5375, RexRotary 1280, nashuatec CP375, ABDICK 6720
NA3: Ricoh VT3600, Gestetner 5380, RexRotary 1285, nashuatec CP380, ABDICK 6770
NA33: Ricoh VT3800, Gestetner 5385, RexRotary 1290, nashuatec CP385, ABDICK 6790, SVN 3300DNP
NB2: Ricoh VT2600/VT2630, Gestetner 5360, RexRotary 1270, nashuatec CP360
RN925: Ricoh VT2400, Gestetner 5340, RexRotary 1255, nashuatec CP340, ABDICK 6550
NA6: Ricoh VT6000, Gestetner 5390, RexRotary 1295, nashuatec CP390, SVN 3400DNP

SYMPTOMS

A worn 2nd sector gear and/or 2nd feed roller gear causes paper feed jams.

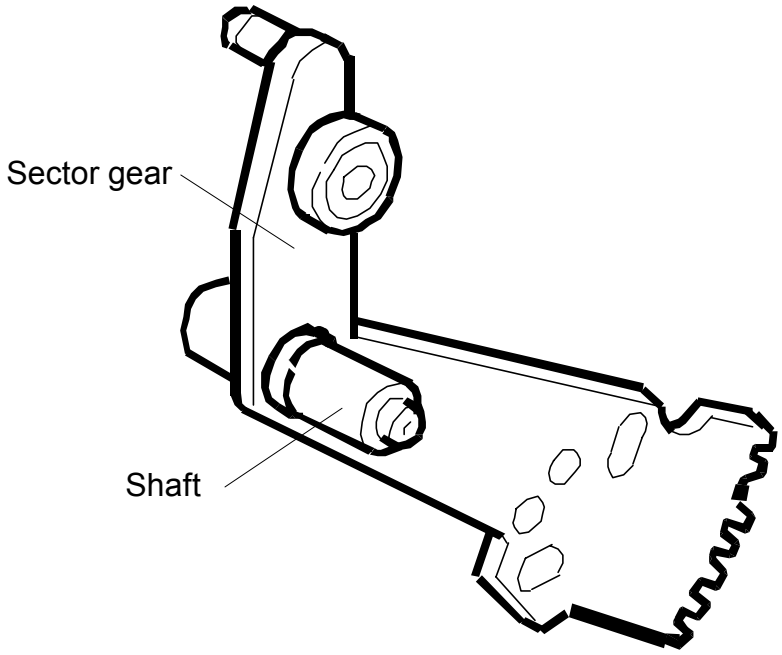
This also causes the 2nd feed roller lifting mechanism to not work properly. In this case, printed images will be distorted. (Images are not transferred to paper properly because of the lifting mechanism failure.)

CAUSE



Case 1:

The sector gear [A] and the feed roller gear [B] ran out of lubricant. Because of this, the sector gear [A] will not be able to oscillate back and forth correctly.

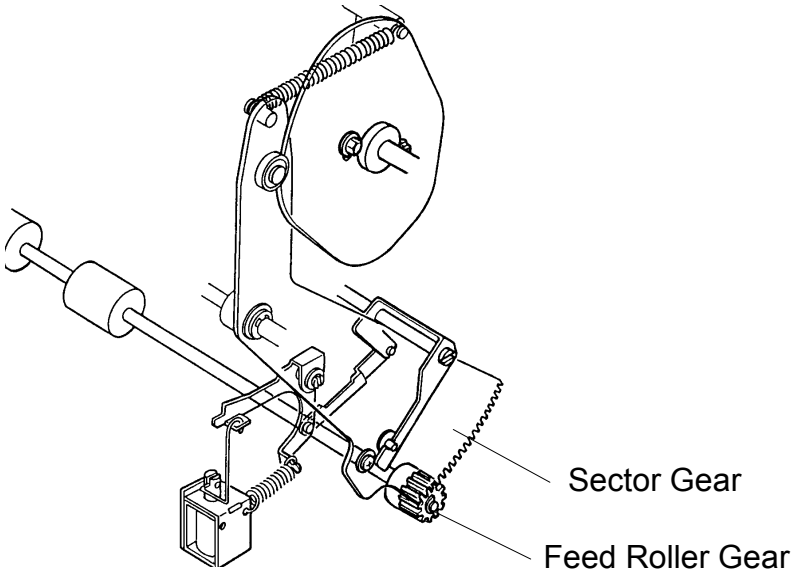


Case 2:

There is too much thrust play, and the sector gear is oscillating on the shaft.

Due to this, the sector gear will not be able to oscillate back and forth correctly. As a result, the sector gear does not move correctly on the 2nd feed roller gear and damages the teeth of the gear.

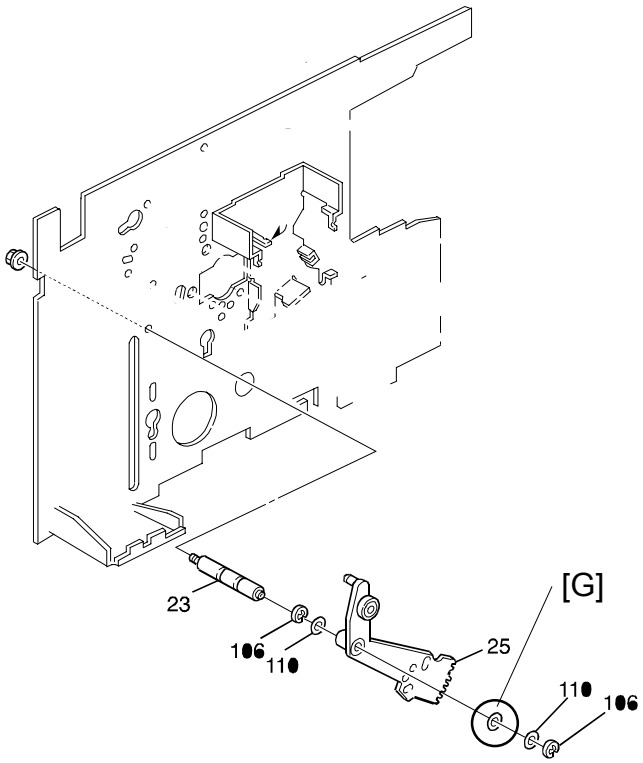
SOLUTION



Solution 1:

Make sure to lubricate between the sector gear and the feed roller gear periodically.

Model: PRIPORT NA	Date: 15-Apr-00	No: R-C210-019



Solution 2:

Add some spacers to remove the play.

The part numbers of the added spacers are as shown below.

Production Name	Using Spacer #	Description
NA6 (C228) only	0807 7013	SPACER - 10.2X14X0.2 MM
Other models	0807 7018	WASHER - M10

Add 1 or 2 additional spacers [G] on the front side, as shown above.

The same procedure was applied from the March 2000 production, so that the thrust play has become 0.2 mm or less.

Model: PRIPORT NA2/NA3/NA33/NB2/RN925/NA6	Date: 19-Oct-00	No: R-C210-**020**
Subject: NA33/NA6 manual correction	**Prepared by:** H. Onodera, Priport Service Planning Section	

Classification:

☐ Troubleshooting	☐ Part information	☐ Action required
☐ Mechanical	☐ Electrical	☒ Service manual revision
☐ Paper path	☐ Transmit/receive	☐ Retrofit information
☐ Other ( )		

Model Name:

NA2: Ricoh VT3500, Gestetner 5375, RexRotary 1280, nashuatec CP375, ABDICK 6720
NA3: Ricoh VT3600, Gestetner 5380, RexRotary 1285, nashuatec CP380, ABDICK 6770
NA33: Ricoh VT3800, Gestetner 5385, RexRotary 1290, nashuatec CP385, ABDICK 6790, SVN 3300DNP
NB2: Ricoh VT2600/VT2630, Gestetner 5360, RexRotary 1270, nashuatec CP360
RN925: Ricoh VT2400, Gestetner 5340, RexRotary 1255, nashuatec CP340, ABDICK 6550
NA6: Ricoh VT6000, Gestetner 5390, RexRotary 1295, NSA CP390, SVN 3400DNP, Standard SD600

Please correct your service manuals (NA33/NA6) as follows:

NA6 service manual Page 2-8

- **2.4 PRINTING, 2.4.1 OVERVIEW, Printing Pressure Cam**

Please delete **'Pressure Timing Adjustment'** from your manual as follows. The pressure timing is common between the NA33 and NA6 models.

Incorrect:

NOTE: 1) Because of the new printing pressure cam, the adjustment values (angles) for printing pressure application timing and exit pawl operation timing are changed. Refer to **'Pressure Timing Adjustment'** and 'Exit Pawl Timing Adjustment' in the 'Replacement and Adjustment' section.

Correct:

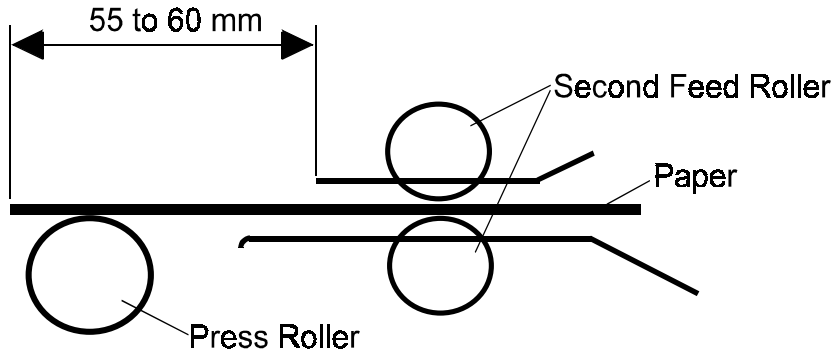
NOTE: 1) Because of the new printing pressure cam, the adjustment values (angles) for printing pressure application timing and exit pawl operation timing are changed. Refer to 'Exit Pawl Timing Adjustment' in the 'Replacement and Adjustment' section.

Model: PRIPORT NA2/NA3/NA33/NB2/RN925/NA6	Date: 19-Oct-00	No: R-C210-020

NA6 service manual section 5

- **Feed Length of the Second Feed Roller adjustment**

Please add the following adjustment procedure in section 5 of the C228 manual. The adjustment standard is different between the NA33 and NA6 models.



Operation side

Purpose: To ensure proper paper feed by the second feed rollers.

Adjustment Standard: 55 to 60 mm

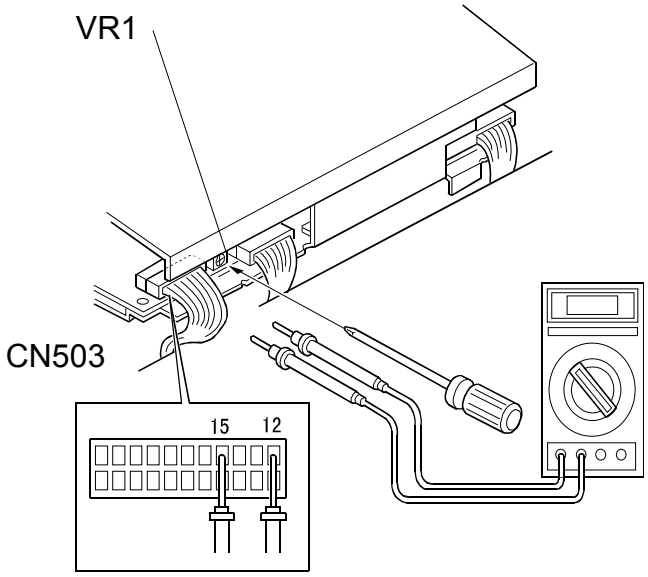
1. Stack about 100 sheets of paper on the paper table.
2. Set the paper table in the paper feed position (Use output check mode SP131, No. 19). Then, turn the main switch off and unplug the machine.
3. Remove the rear cover and the drum unit from the machine.
4. Turn on the paper feed solenoid manually, then gradually turn the drum rotation shaft with a 10 mm spanner.
5. Measure the paper feed length from the time the second feed roller starts rotating until it stops rotating. This feed length should be between 55 and 60 mm.
6. If it is not, adjust the feed length by loosening the screw and shifting the cam up or down.
7. Check the adjustment by repeating steps 4 and 5.

Model: PRIPORT NA2/NA3/NA33/NB2/RN925/NA6	Date: 19-Oct-00	No: R-C210-020

NA6 service manual Page 5-1, NA33 service manual Page 5-15

- **Thermal Head Voltage adjustment**

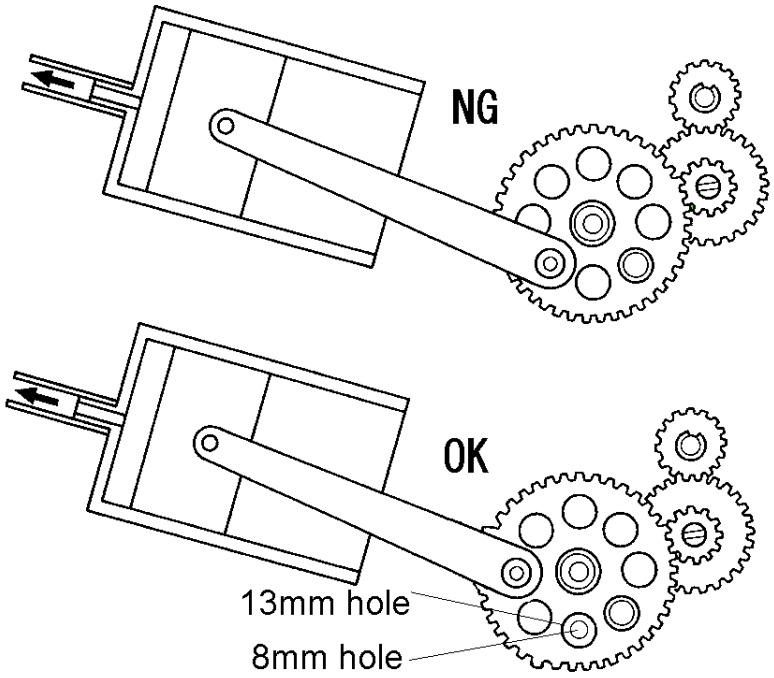
Please delete the step to disconnect CN503 in these procedures (step 3 for NA33, step 2 for NA6). If the connector is disconnected, the power to the operation panel is also disconnected.



NA33 service manual Page 5-74

- **9.5 Paper Exit Pawl Air Pump adjustment**

Please correct the procedure as follows. The 13 mm hole in the gear should be at the 6:00 position. (See below.)



1. Open the front door and remove the inner cover.
2. Press and hold down the 'Drum rotate' button until the drum reaches the home position.
3. Confirm that the 13 mm diameter hole in the gear and the 8 mm diameter hole in the side plate are lined up at the 6:00 position.
4. If the holes are not lined up, remove the E-rings and reposition the gear.
5. Rotate the drum to the home position and do step 3 again.

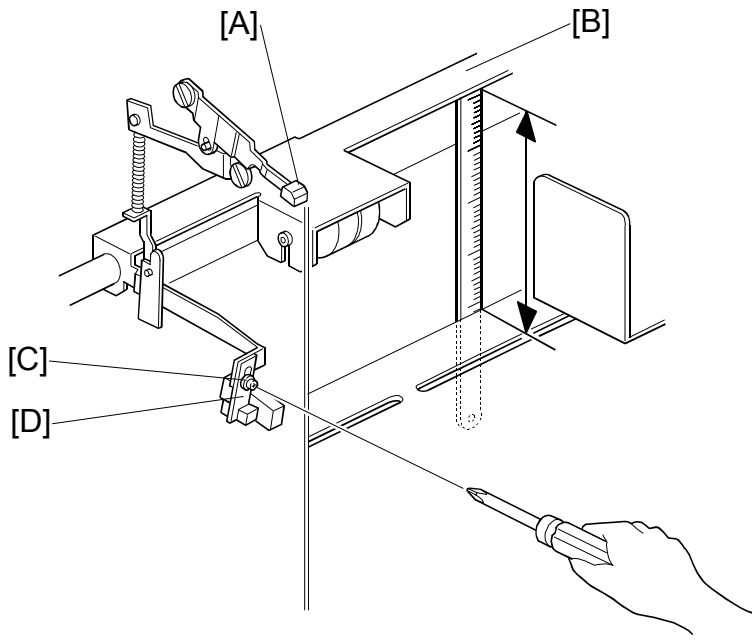
Model: PRIPORT NA2/NA3/NA33/NB2/RN925/NA6	Date: 19-Oct-00	No: R-C210-020

NA33 service manual Page 5-29

- **6.2 Paper Table Height adjustment**

The table height can NOT be adjusted using the procedure on Page 5-29 (because there is no lower stay at the measuring point).

The adjustment should be as follows.



Adjustment Standard: 52 ± 0.5 mm

1. Set the paper feed pressure adjusting lever [A] to the upper position.
2. Remove the right cover of the machine (5 screws).
3. Turn on the main switch and access the SP mode.
4. Select output check mode (SP131) no.19, and press the Print start key to raise the table.
5. After the paper table stops, insert a scale into the slot in the paper table. Make sure that the distance between the feed roller stay [B] and the surface of the paper table is 52 ± 0.5 mm.
6. If it is not, loosen the screw [C] and adjust the position of the actuator [D].
7. After adjusting, repeat step 5 by lowering the paper table (output No. 18) and raising the paper table (output No. 19) several times, checking the height each time.