

## Service Information



Model Nakamichi 600II (2 Head Cassette Console)  
Serial No. from A206.7 07601  
Subject Modification of Shut-off P.C.B. Ass'y  
(Hall IC System)

No. NR-0024 (1/6)  
Date 7/19/78

### I. General:

#### A. Purpose:

To add the part Nos. R631 and C614 to the Service Manual and Spare Parts Price List.

In the current Shut-off P.C.B. Ass'y of Hall IC System (serial Nos. A206.7 05001 to A206.7 07600), R631 (1.5 k $\Omega$ ) and C614 (4.7  $\mu$ F) are mounted to the dip side of the Shut-off P.C.B. Ass'y. R631 and C614 have been removed from the dip side and mounted to the component side.

Note: In your services, if revised Shut-off P.C.B. Ass'y is required to replace for the Model of current Hall IC system or previous Reed Switch system, please refer to "III. Modification Procedures".

#### B. Modification of Shut-off P.C.B. Ass'y:

Part No. of the Shut-off P.C.B. Ass'y (BA03950A) stays the same as the circuit and parts are not changed.

##### Current Parts

BA03950A Shut-off P.C.B. Ass'y (Hall IC System) ..... 1 pce.  
including;  
OB07784A Shut-off P.C.B.  
R631 not listed  
C614 not listed

##### New Parts

BA03950A Shut-off P.C.B. Ass'y (Hall IC System) ..... 1 pce.  
including;  
OB07784B Shut-off P.C.B.  
R631 OB05505A Carbon Resistor 1.5 k ERD-25V J ..... 1 pce.  
C614 OB01402A Electrolytic Capacitor 4.7  $\mu$ F 25 V ..... 1 pce.

#### C. Compatibility (of new Shut-off P.C.B. Ass'y with the current Model):

Possible (for the Models of Hall IC system serial Nos. from A206.7 05001 to A206.7 07600).

If new Shut-off P.C.B. Ass'y is applied for the Models of Reed Switch system serial Nos. up to A206.7 05000, refer to "III. Modification Procedures".

## II. Parts List:

BA03950A Shut-off P.C.B. Ass'y ..... 1 pce.

| <u>Schematic Ref. No.</u> | <u>Part No.</u> | <u>Description</u>   |                      |
|---------------------------|-----------------|--|----------------------|
|                           | BA03950A        | Shut-off P.C.B. Ass'y<br>(Serial No. A206.7 07601 and greater) |                      |
|                           | OB07784B        | Shut-off P.C.B.  |                      |
| Q601                      | OB01695A        | Transistor   | 2SA496               |
| Q602,603,604<br>608       | OB01872A        | Transistor   | 2SC945               |
| Q605,606,607              | OB06013A        | Transistor   | 2SA733               |
| ZD601                     | OB06063A        | Zener Diode  | YZ-040B              |
| D601                      | OB06092U        | Silicon Diode  | MI-151               |
| D602,603,604<br>605       | OB01909A        | Silicon Diode  | 1S1555               |
| R601,604                  | OB01781A        | Carbon Resistor  | 1K ERD-25V J         |
| R602                      | OB01830A        | Carbon Resistor  | 1.8K ERD-25V J       |
| R603                      | OB05569A        | Carbon Resistor  | 47 ERD-25V J         |
| R605,609,620              | OB01795A        | Carbon Resistor  | 4.7K ERD-25V J       |
| R606,607                  | OB05562A        | Carbon Resistor  | 47K ERD-25V J        |
| R608,612,621<br>625       | OB01833A        | Carbon Resistor  | 10K ERD-25V J        |
| R610,619,631              | OB05505A        | Carbon Resistor  | 1.5K ERD-25V J       |
| R611,623                  | OB01921A        | Carbon Resistor  | 330K ERD-25V J       |
| R613,618,629              | OB01920A        | Carbon Resistor  | 100K ERD-25V J       |
| R614,616,626<br>630       | OB05661A        | Carbon Resistor  | 22K ERD-25V J        |
| R615                      | OB01792A        | Carbon Resistor  | 470 ERD-25V J        |
| R617                      | OB05568A        | Carbon Resistor  | 120K ERD-25V J       |
| R622,624                  | OB05597A        | Carbon Resistor  | 680K ERD-25V J       |
| R627                      | OB05940A        | Fail Safe Type Resistor  | 5.6 ERF-14F J        |
| R628                      | OB05674A        | Carbon Resistor  | 820K ERD-25V J       |
| C601,603                  | OB01173A        | Electrolytic Capacitor   | 1 $\mu$ 25V          |
| C602,611                  | OT04027A        | Ceramic Capacitor  | 680P 50V             |
| C604                      | OB09120A        | Tantalum Capacitor   | 15 $\mu$ 16V         |
| C605                      | OB01664A        | Electrolytic Capacitor   | 0.22 $\mu$ 25V M(MS) |
| C606                      | OB01835A        | Electrolytic Capacitor   | 2200 $\mu$ 18V       |
| C607                      | OB01674A        | Electrolytic Capacitor   | 10 $\mu$ 25V         |
| C608                      | OB05817A        | Electrolytic Capacitor   | 33 $\mu$ 16V M(MS)   |
| C609                      | OB05815A        | Electrolytic Capacitor   | 1.5 $\mu$ 25V M(MS)  |
| C610                      | OB01502A        | Electrolytic Capacitor   | 330 $\mu$ 16V        |
| C612                      | OB01609A        | Mylar Capacitor  | 0.01 $\mu$ 50V       |
| C613                      | OB09117A        | Electrolytic Capacitor   | 10 $\mu$ 25V M(MS)   |
| C614                      | OB01402A        | Electrolytic Capacitor   | 4.7 $\mu$ 25V        |
|                           | OB08001A        | Tab  | (2 pcs.)             |
|                           | OB08152A        | 4P Jack Ass'y 2  | (1 pce.)             |

### III. Modification Procedures for the Current Models:

#### A. Hall IC System (serial Nos. A206.7 05001 to A206.7 07600):

When the current Shut-off P.C.B. Ass'y of the Hall IC system (BA03950A) (R631 and C614 are mounted to the dip side) is replaced with the latest one (R631 and C614 are mounted to the component side), the following modifications are required:

##### 1. Part removed:

BA03950A Shut-off P.C.B. Ass'y (R631 and C614 are mounted to the dip side)

##### 2. Part required:

BA03950A Shut-off P.C.B. Ass'y (R631 and C614 are mounted to the component side)

##### 3. Modification Procedures:

- a. Remove the Cassette Lid Plate.
- b. Disassemble the Cabinet by removing 5 screws.
- c. Pull out the 10 Volume Caps.
- d. Disassemble the 2 Handle Assemblies by removing 2 screws for each.
- e. Remove the Front Panel.
- f. Disassemble the Mechanism Ass'y by removing 3 screws and 2 connectors.
- g. Remove the current Shut-off P.C.B. Ass'y by removing 1 screw.
- h. Disconnect 11 signal wires from the current Shut-off P.C.B. Ass'y.
- i. Refer to Fig. 2, new Shut-off P.C.B. Ass'y mounting diagram.  
Connect 11 signal wires to the new Shut-off P.C.B. Ass'y.  
Wiring of 10 wires (Nos. 5 - 7 and 10 - 16) stays the same and the rest of ORN wire connected with the cross point of R631 and C614 should be connected to No. 9.
- j. Assemble the new Shut-off P.C.B. Ass'y with the Mechanism Ass'y by mounting 1 screw.
- k. Assemble the Mechanism Ass'y by mounting 3 screws and 2 connectors.
- l. Check to insure that the operation in each mode (Play, F.F., Rew., Stop, Record and Pause) is accurate and each shut-off function operates correctly.
- m. Assemble the Front Panel then mount the 2 Handle Assemblies by fastening 2 screws for each.
- n. Assemble the 10 Volume Caps.
- o. Assemble the Cabinet by fastening 5 screws.
- p. Assemble the Cassette Lid Plate.

**B. Reed Switch System (serial Nos. up to A206.7 05000):**

As for spare parts you can order the Shut-off P.C.B. Ass'y of Reed Switch system (BA03722B) therefore the change of the Reed Switch system to Hall IC system is not necessary unless otherwise you desire to adopt Hall IC system.

When desired, please refer to the following steps:

**1. Parts removed:**

- CA03271A Counter Holder Ass'y (Reed Switch System) ..... 1 pce.
- BA03722B Shut-off P.C.B. Ass'y (Reed Switch System) .... 1 pce.

**2. Parts required:**

- CA03305A Counter Holder Ass'y (Hall IC System) ..... 1 pce.
- BA03950A Shut-off P.C.B. Ass'y (Hall IC System) ..... 1 pce.
- V1 Wire 140 mm ORN .....

**3. Modification Procedures:**

- a. Remove the Cassette Lid Plate.
- b. Disassemble the Cabinet by removing 5 screws.
- c. Pull out the 10 Volume Caps.
- d. Disassemble the 2 Handle Assemblies by removing 2 screws for each, then separate the Front Panel.
- e. Disassemble the Mechanism Ass'y by removing 3 screws and 2 connectors.
- f. Disassemble the Counter Holder Ass'y (Reed Switch system: CA03271A) by removing 2 screws, 6 signal wires and 1 belt.
- g. Assemble the new Counter Holder Ass'y (Hall IC system: CA03305A) by mounting 2 screws, 7 signal wires and 1 belt. The signal wires disconnected from the Reed Switch and one additional ORN wire should be connected with the Hall IC P.C.B. Ass'y as shown in Fig. 1.
- h. Disassemble the Shut-off P.C.B. Ass'y (Reed Switch system: BA03722B) by removing 1 screw, then disconnect 10 signal wires (Nos. 5 - 7 and 10 - 16).

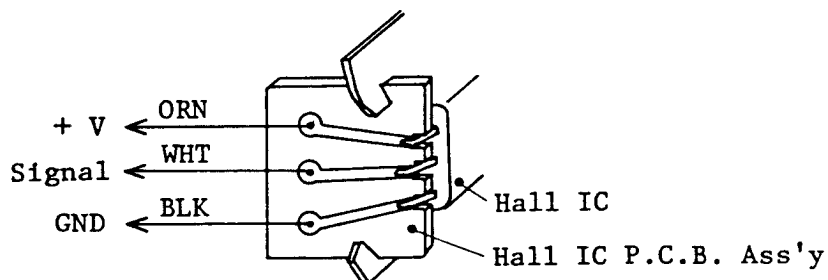


Fig. 1

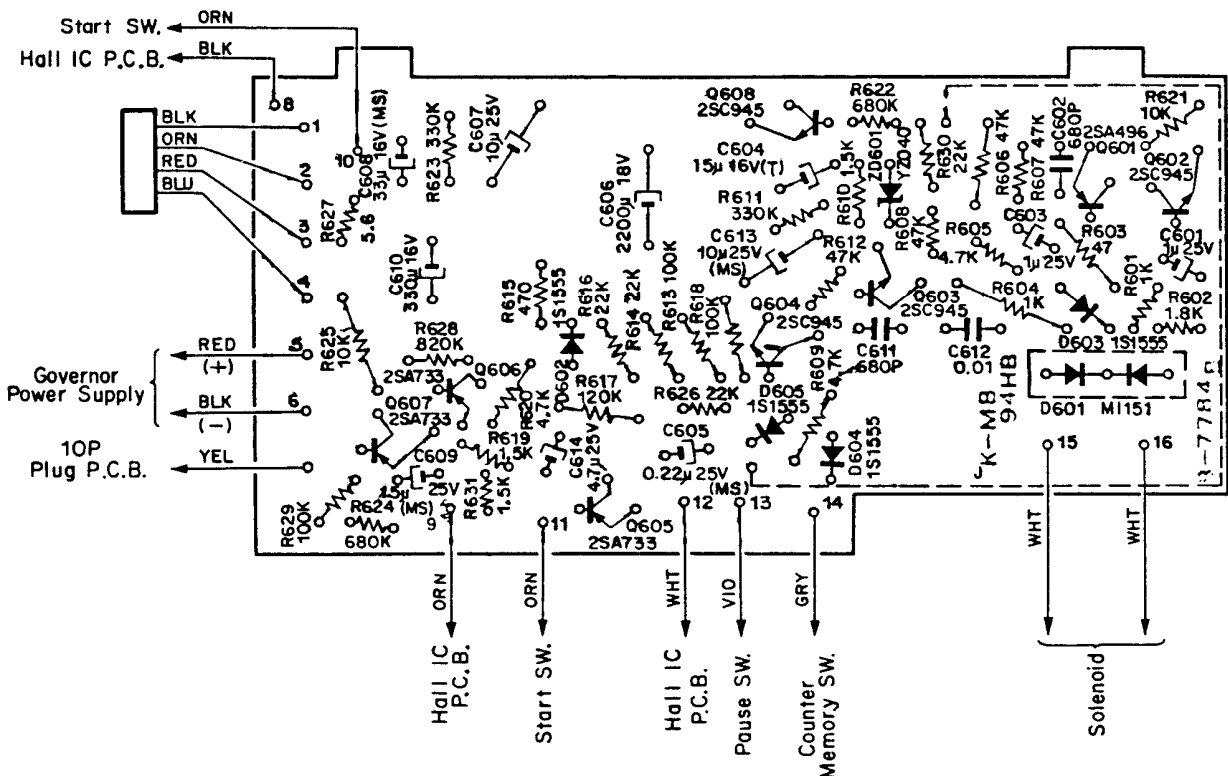
- i. Connect 11 signal wires to the new Shut-off P.C.B. Ass'y (Hall IC system: BA03950A).

Wiring of 10 wires stays the same and the rest of added ORN wire from the Hall IC P.C.B. Ass'y should be connected to the No. 9 of the Shut-off P.C.B. Ass'y.

- j. Assemble the Shut-off P.C.B. Ass'y with the Mechanism by mounting 1 screw.
- k. Assemble the Mechanism Ass'y by mounting 3 screws and 2 connectors.
- l. Check to insure that the operation in each mode (Play, F.F., Rew., Stop, Record and Pause) is accurate and each shut-off function operates correctly.
- m. Assemble the Front Panel then mount the 2 Handle Assemblies by fastening 2 screws for each.
- n. Assemble the 10 Volume Caps.
- o. Assemble the Cabinet by fastening 5 screws.
- p. Assemble the Cassette Lid Plate.

IV. Modified Mounting Diagram (Shut-off P.C.B. Ass'y):

Hall IC System: serial Nos. A206.7 07601 and greater



V. Modified Schematic Diagram:

Hall IC System: serial Nos. A206.7 07601 and greater

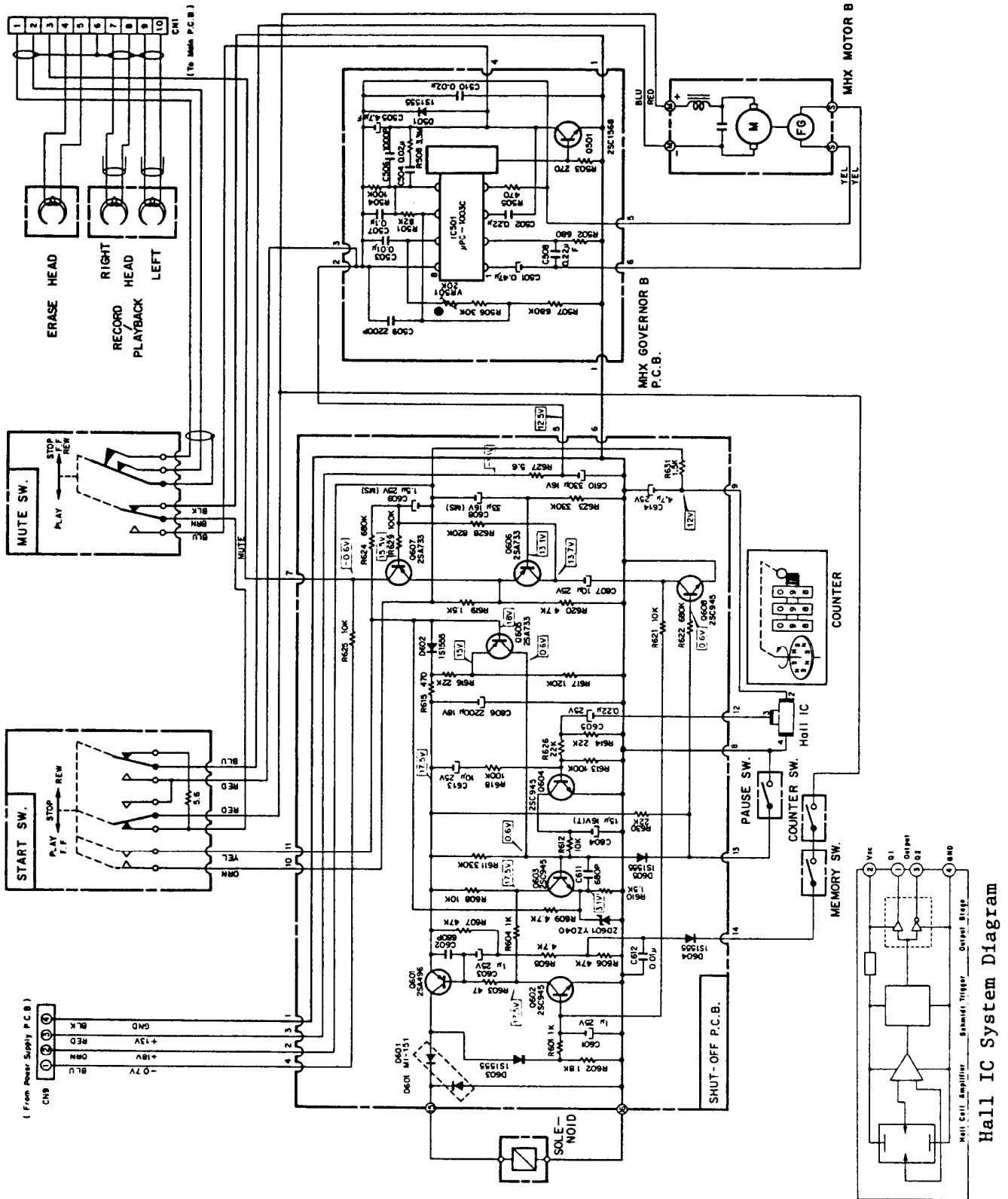


Fig. 3