Bridge Unit BU3000 Machine Code: B227

SERVICE MANUAL

Apr. 21st, 2006 Subject to change B227 Service Manual 21-Apr-2006

Read This First

Safety and Symbols

Replacement Procedure Safety

ACAUTION

 Turn off the main power switch and unplug the machine before beginning any of the replacement procedures in this manual.

When taking apart the bridge unit, first take the unit out of the copier.

Symbols Used in this Manual

This manual uses the following symbols.

See or Refer to

: Connector

☼: Clip ring

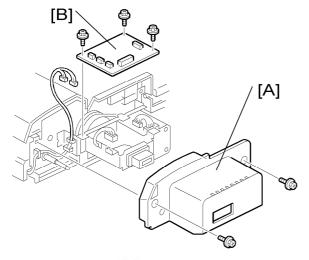
C: E-ring

Table of Contents

Read This First	i
Safety and Symbols	i
Replacement Procedure Safety	i
Symbols Used in this Manual	i
Table of Contents	ii
Replacement and Adjustment	1
Bridge Unit Control Board	1
Bridge Unit Drive Motor	2
Tray Exit Sensor	3
Relay Sensor	4
2. Detailed Section Descriptions	5
Mechanical Component Layout	5
Drive Layout	6
Electrical Component Layout	7
Electrical Component Descriptions	8
Junction Gate Mechanism	9

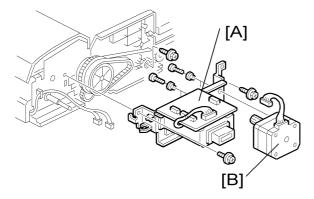
1. Replacement and Adjustment

Bridge Unit Control Board



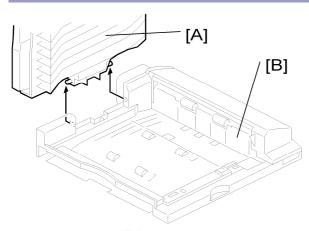
- 1. Bridge unit (Installation Procedure in the base copier manual)
- 2. Rear cover [A] (x 2)

Bridge Unit Drive Motor

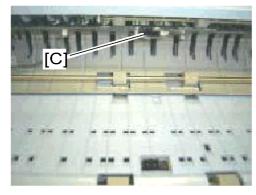


- 1. Bridge unit (Installation Procedure in the base copier manual)
- 2. Rear cover
- 3. Bracket [A] (x 3, 1 x 2)
- 4. Bridge unit drive motor [B] (ℰ x 4, ು x 1)

Tray Exit Sensor

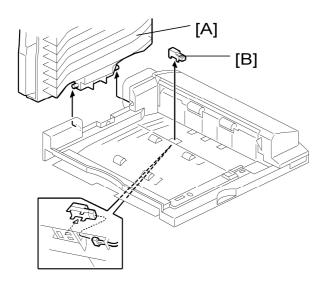


- 1. Bridge unit (Installation Procedure in the base copier manual)
- 2. Rear cover ("Rear Cover")
- 3. Paper tray [A]
- 4. Exit guide [B] (x 1)



5. Tray exit sensor [C] (🕮 x 1)

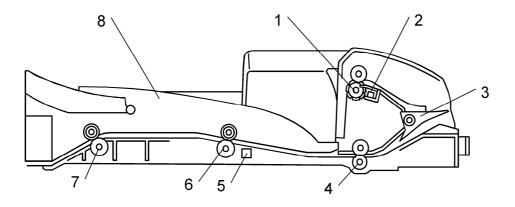
Relay Sensor



- 1. Bridge unit (Installation Procedure in the base copier manual)
- 2. Paper tray [A]
- 3. Relay sensor [B] (x 1)

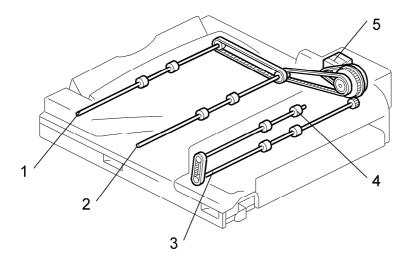
2. Detailed Section Descriptions

Mechanical Component Layout



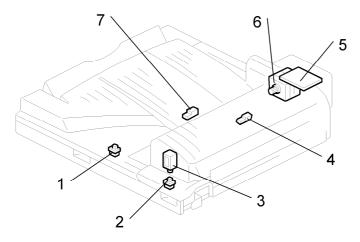
- 1. Upper Exit Roller
- 2. Tray Exit Sensor
- 3. Junction Gate
- 4. 1st Transport Roller
- 5. Relay Sensor
- 6. 2nd Transport Roller
- 7. Left Exit Roller
- 8. Paper Tray

Drive Layout



- 1. Left Exit Roller
- 2. 2nd Transport Roller
- 3. 1st Transport Roller
- 4. Upper Exit Roller
- 5. Bridge Unit Drive Motor

Electrical Component Layout

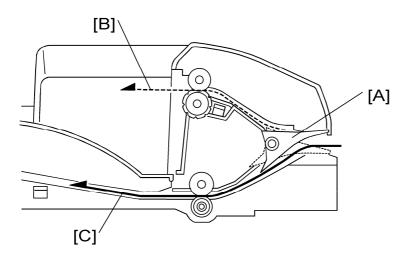


- 1. Left Guide Switch
- 2. Right Guide Switch
- 3. Junction Gate Solenoid
- 4. Tray Exit Sensor
- 5. Bridge Unit Control Board
- 6. Bridge Unit Drive Motor
- 7. Relay Sensor

Electrical Component Descriptions

Symbol	Name	Function	Index No.
Motors			
M1	Drive Motor	Drives the bridge unit.	6
Sensors			
S1	Tray Exit	Checks for misfeeds.	4
S2	Relay	Checks for misfeeds.	7
Switches			
SW2	Right Guide	Detects when the right guide is opened.	2
SW3	Left Guide	Detects when the left guide is opened.	1
Solenoids			
SOL1	Junction Gate	Moves the junction gate to direct the paper to the upper tray (on top of the bridge unit) or to the finisher.	3
PCBs			
PCB1	Bridge Unit Control Board	Controls the bridge unit.	5

Junction Gate Mechanism



The junction gate [A] directs any paper reaching the bridge unit to either the upper tray (on top of the bridge unit) or to the finisher, depending on which has been selected. If the junction gate solenoid has been activated, the junction gate [A] points downward and directs the paper to the upper tray [B] (dotted line path in illustration). When the solenoid is off, the junction gate points upward and the paper is fed out to the finisher [C] by the transport and left exit rollers (solid line).