

**DUPLEX**  
**(Machine Code: A896)**

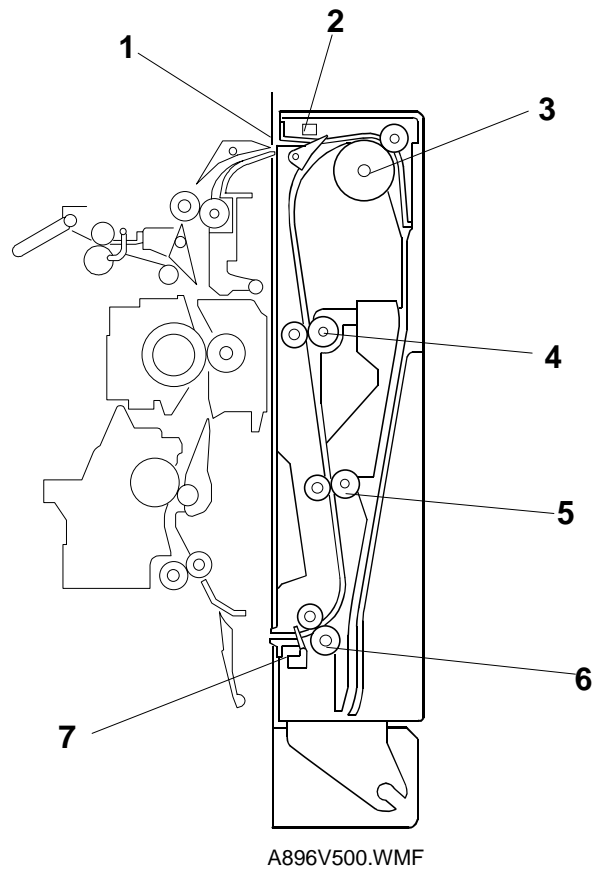
---

# 1. OVERALL MACHINE INFORMATION

## 1.1 SPECIFICATIONS

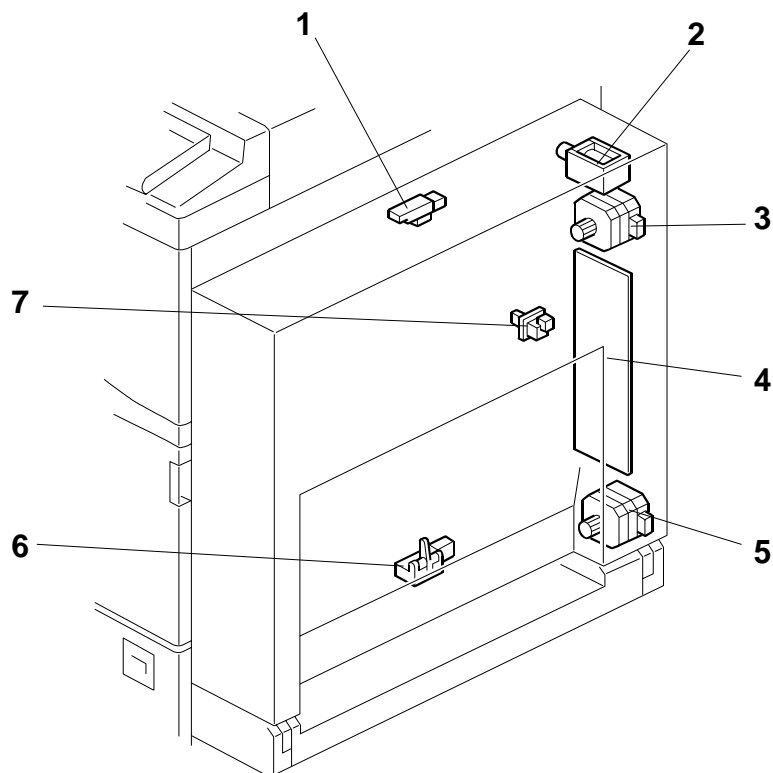
Paper Size:	Standard sizes A5 lengthwise to A3 HLT to DLT Non-standard sizes Width: 140 to 297 mm Length: 182 to 432 mm
Paper Weight:	64 g/m <sup>2</sup> ~ 105 g/m <sup>2</sup> , 20 lb ~ 28 lb
Tray Capacity:	1 sheet
Power Consumption:	40 W
Power Source:	DC 24 V, 5 V
Dimensions (W x D x H):	90 x 495 x 452 mm
Weight:	6 kg

## 1.2 MECHANICAL COMPONENT LAYOUT



- |                    |                            |
|--------------------|----------------------------|
| 1. Inverter Gate   | 4. Upper Transport Roller  |
| 2. Entrance Sensor | 5. Middle Transport Roller |
| 3. Inverter Roller | 6. Lower Transport Roller  |
|                    | 7. Exit Sensor             |

## 1.3 ELECTRICAL COMPONENT LAYOUT



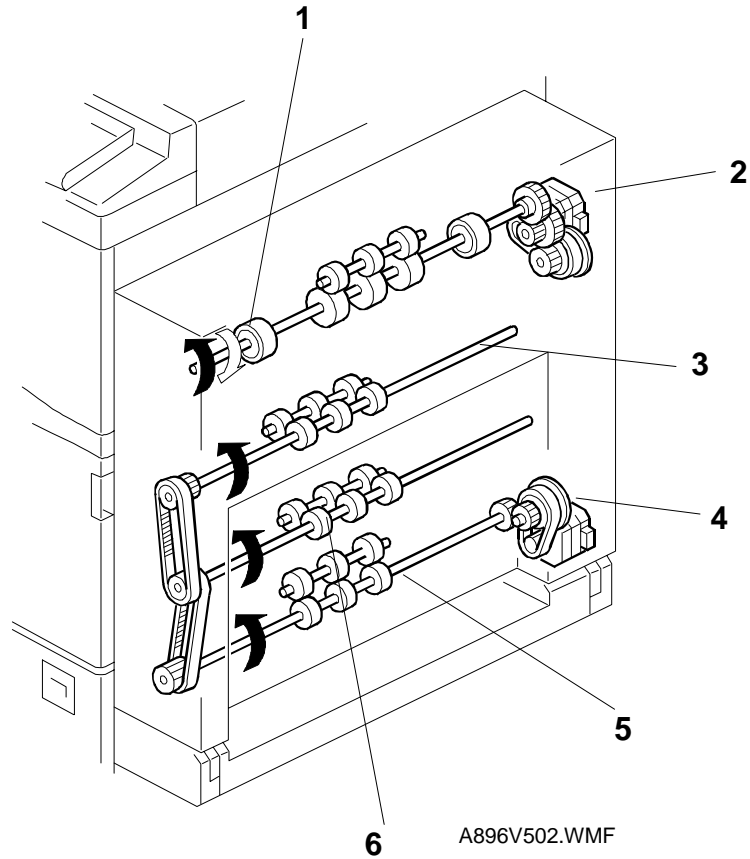
A896V501.WMF

- |                           |                            |
|---------------------------|----------------------------|
| 1. Entrance Sensor        | 5. Transport Motor         |
| 2. Inverter Gate Solenoid | 6. Exit Sensor             |
| 3. Inverter Motor         | 7. Duplex Unit Open Switch |
| 4. Main Board             |                            |

## 1.4 ELECTRICAL COMPONENT DESCRIPTION

Symbol	Name	Function	Index No.
<b>Motors</b>			
M1	Inverter	Drives the inverter roller.	3
M2	Transport	Drives the upper and lower transport rollers.	5
<b>Sensors</b>			
S1	Entrance	Detects the trailing edge of the copy paper to turn on the inverter gate solenoid and turn on the inverter motor in reverse. Checks for misfeeds.	1
S2	Exit	Checks for misfeeds.	6
<b>Switches</b>			
SW1	Duplex Unit Open	Detects whether the duplex unit is opened or not.	7
<b>Solenoids</b>			
SOL1	Inverter Gate	Controls the inverter gate.	2
<b>PCBs</b>			
PCB1	Main	Controls the duplex unit and communicates with the copier.	4

## 1.5 DRIVE LAYOUT



- |                           |                            |
|---------------------------|----------------------------|
| 1. Inverter Roller        | 4. Transport Motor         |
| 2. Inverter Motor         | 5. Lower Transport Roller  |
| 3. Upper Transport Roller | 6. Middle Transport Roller |

## 2. DETAILED DESCRIPTIONS

### 2.1 BASIC OPERATION

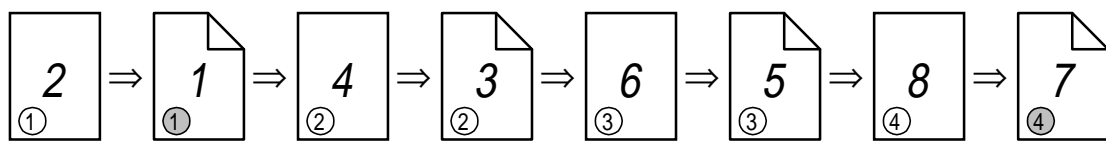
To increase the productivity of the duplex unit, copies are printed as follows.



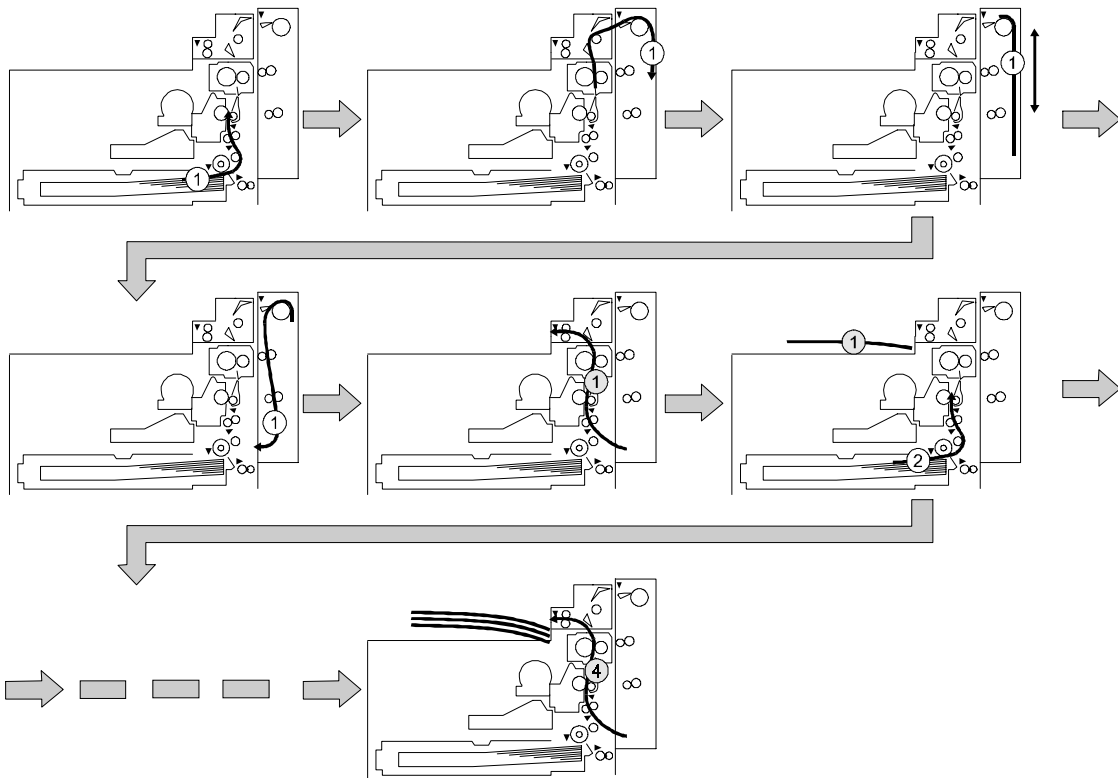
#### ***Larger than A4 lengthwise/LT lengthwise***

The duplex unit can store only one sheet of copy paper.

Example: 8 pages. The number [A] in the illustration shows the order of pages. The number [B] in the illustration shows the order of sheets of copy paper (if shaded, this indicates the second side).



A267D519.WMF



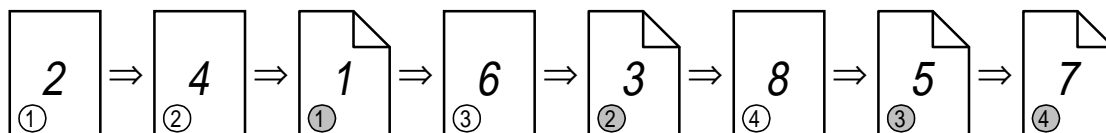
A267D518.WMF



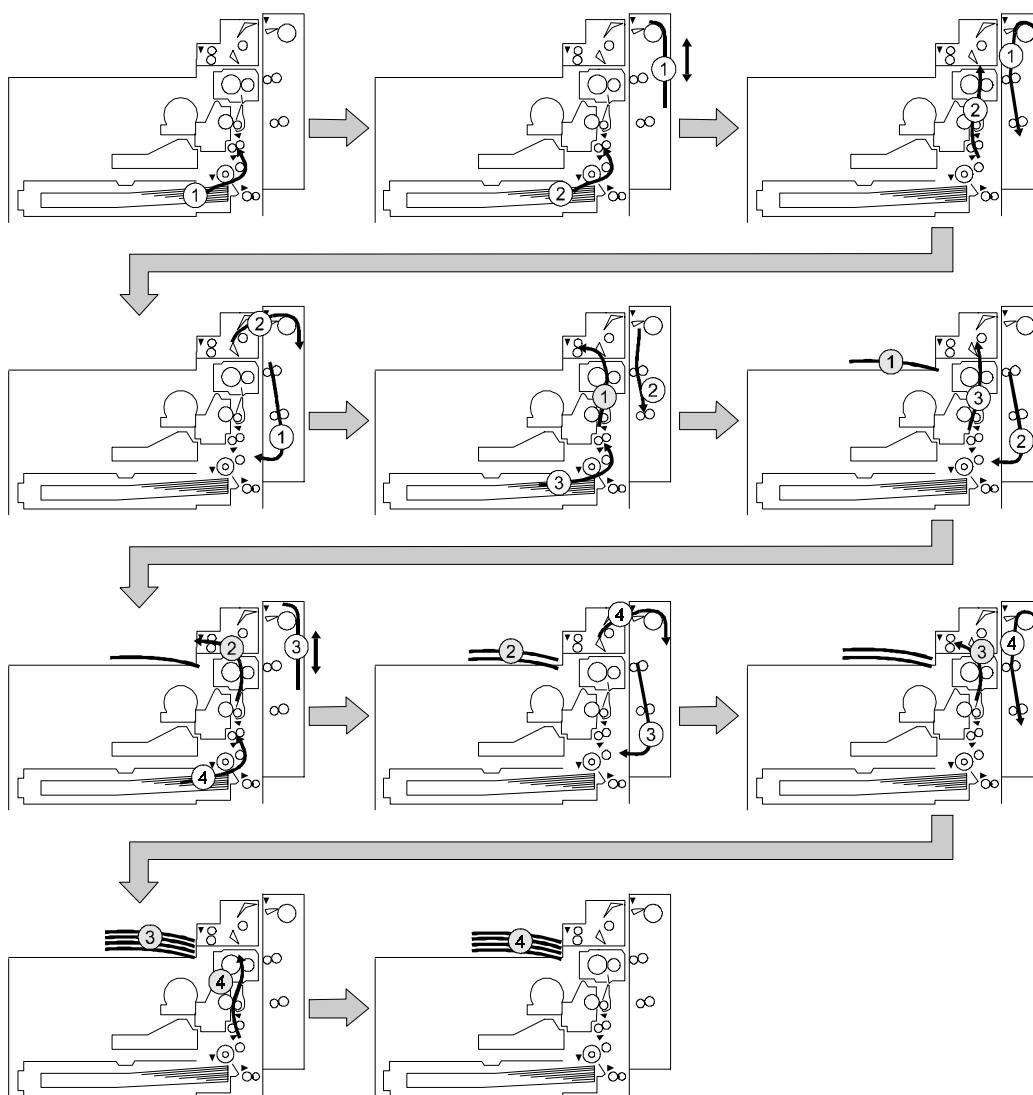
### **Up to A4 lengthwise/LT lengthwise**

The duplex unit can store two sheets of copy paper

Example: 8 pages. The number [A] in the illustration shows the order of pages. The number [B] in the illustration shows the order of sheets of copy paper (if shaded, this indicates the second side).



A267D520.WMF

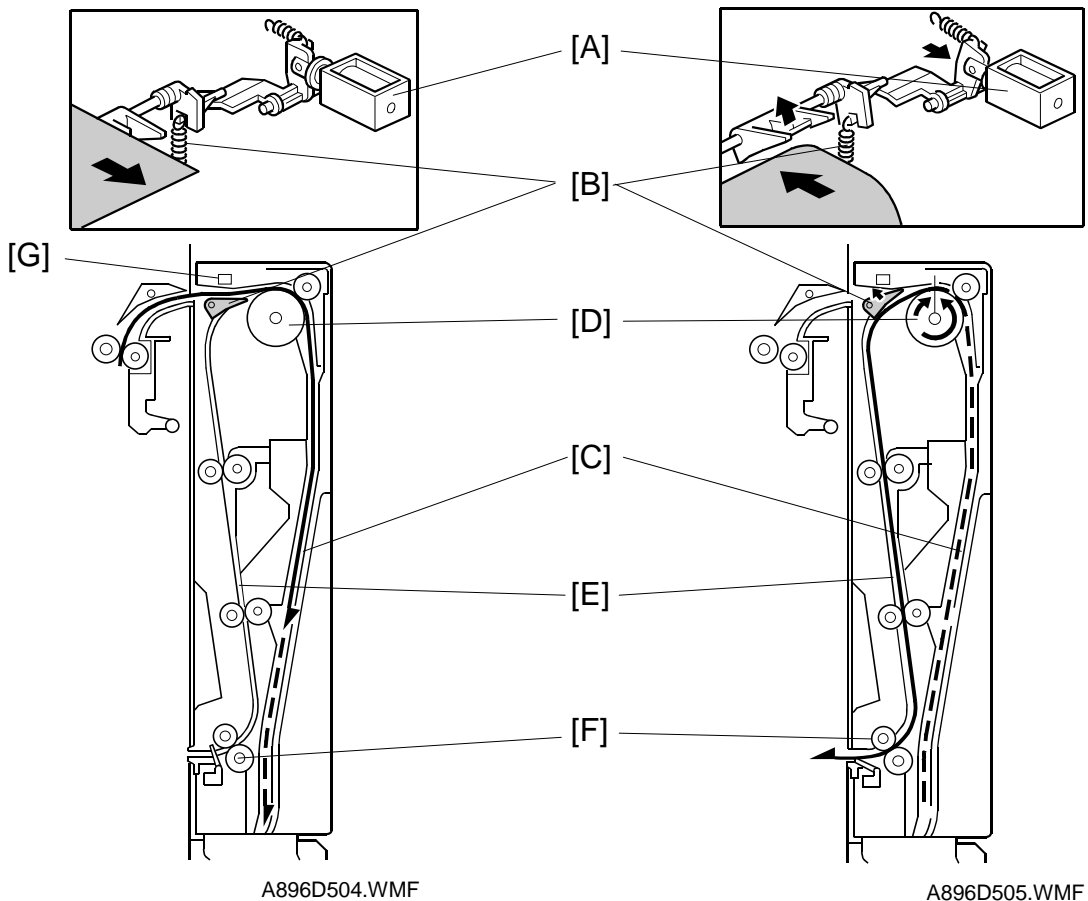


A267D517.WMF

Options



## 2.2 FEED IN AND EXIT MECHANISM



### ***When paper is fed into duplex unit:***

As soon as the paper arrives from the interchange unit, it is sent to the inverter section [C] (the inverter gate solenoid [A] remains off during this process).

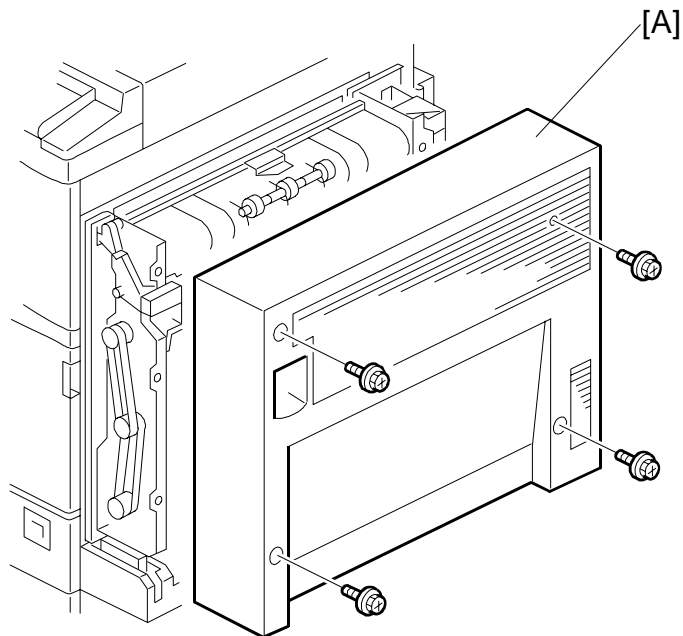
The inverter section can hold a sheet of paper up to A3 size. Because of this, the cover guide used in the previous model has become obsolete and has been eliminated from the design.

### ***Inversion and Exit:***

Shortly after the trailing edge of the paper passes the entrance sensor [G], the inverter gate solenoid [A] switches on and the inverter gate [B] switches over to direct the paper to the exit path [E]. The inverter roller [D] then changes its rotation direction and the paper goes to the exit transport area [F]. The paper is then sent to the registration rollers in the main copier via the transport rollers.

## 3. REPLACEMENT AND ADJUSTMENT

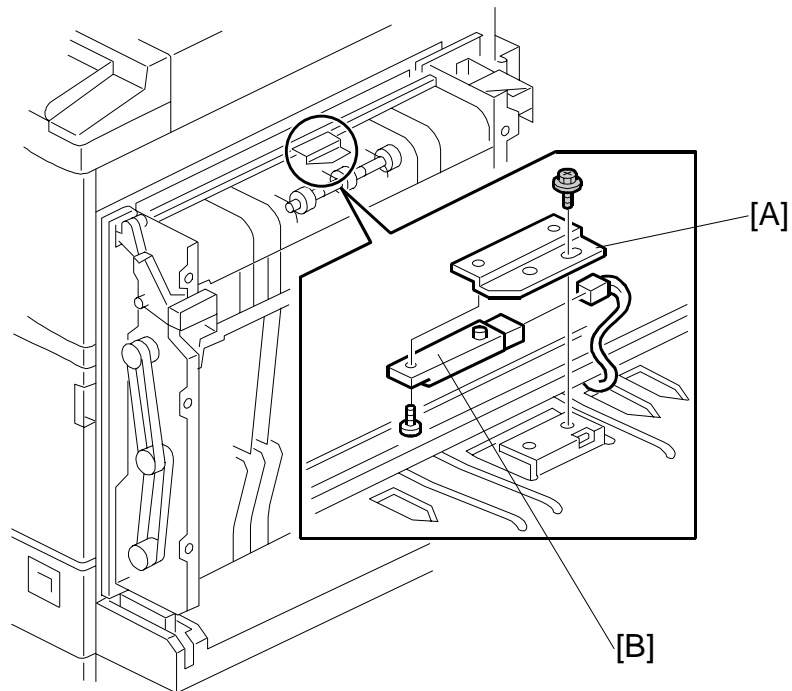
### 3.1 COVER REMOVAL



A896R501.WMF

1. Remove the duplex unit cover [A] (4 screws).

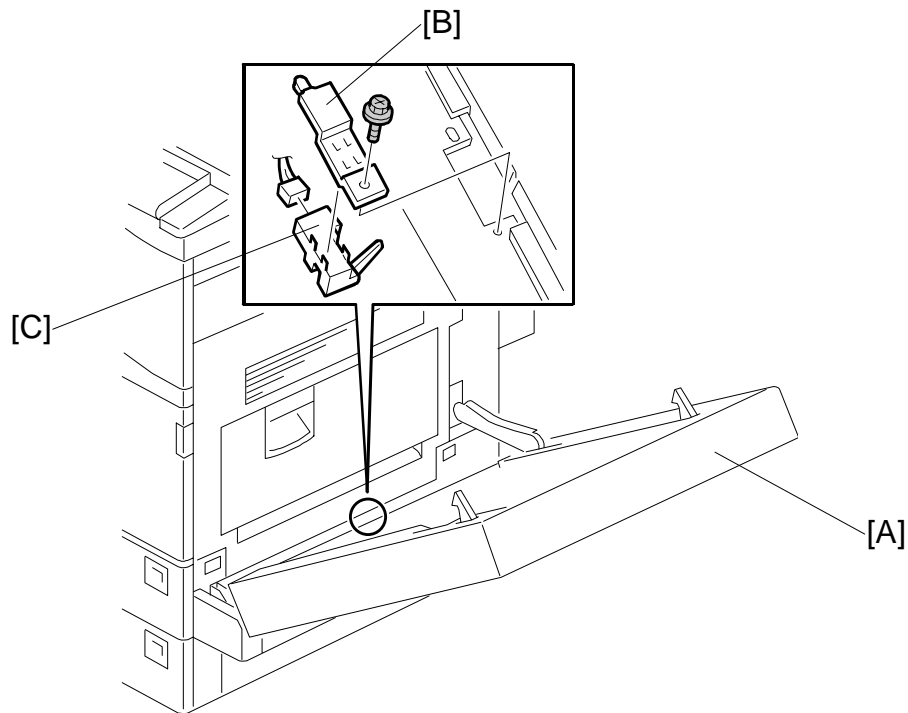
### 3.2 ENTRANCE SENSOR REPLACEMENT



A896R502.WMF

1. Remove the duplex unit cover. (Refer to section 3.1.)
2. Remove the sensor holder [A] (1 screw).
3. Replace the entrance sensor [B] (1 connector, 1 screw).

### 3.3 EXIT SENSOR REPLACEMENT



A896R503.WMF

1. Open the duplex unit [A].
2. Remove the sensor bracket [B] (1 screw).
3. Replace the exit sensor [C] (1 connector).