



# Competitive Test Report

## **RICOH** **Aficio MP C2500SPF**



***VERSUS***



**KONICA MINOLTA**

**bizhub C250**



***Performance Tested***

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# **Ricoh Aficio MP C2500SPF**

## **Versus**

# **Konica Minolta bizhub C250**

In an effort to determine the competitive performance of the Ricoh Aficio MP C2500SPF versus that of the Konica Minolta bizhub C250, Industry Analysts Inc.'s Technical Services Division (IATSD), an independent testing organization, ran a battery of tests on both units. The tests were designed to objectively evaluate the performance of the Ricoh Aficio MP C2500SPF versus that of the Konica Minolta bizhub C250.

IATSD's testing of the performance of these digital copier/printers included an evaluation of the following:

- Software installation
- Print-driver operability and functionality
- Software-utility operability and functionality
- Copier operability and functionality
- Printer and copier image quality
- Network Productivity
- Printer Productivity
- Copier Productivity
- Ease of operation
- Ease of maintenance

Both systems were fully configured, and tested using a dedicated local area network running Microsoft Windows 2000 Server Edition network operating system on the server, and Microsoft windows XP Professional on the client.

**"While testing, both systems were configured as closely as possible. Any differences in configuration had no effect on our performance testing or analysis of features and functionality.**

**In our evaluation, we were looking not only at the results of the tests we performed, but also at the impact of those results in terms of productivity, usability and marketability of these units."**

**Ted Needleman, Senior Director  
Industry Analysts, Inc. Technical Services Division**

## PRICING AND CONFIGURATION

In testing, the Ricoh Aficio MP C2500SPF and Konica Minolta bizhub C250 were configured as follows:



### **RICOH** **Aficio MP C2500SPF**

	List Price
Aficio MP C2500SPF*	\$11,873
Adobe PostScript 3 Option	\$1,260
1,000-sheet Finisher	\$1,606
<b>TOTAL</b>	<b>\$13,479</b>

\*Includes color copying, color network printing, ADF, stackless duplexing, Bypass Tray, Scan Print Kit, and Fax option.

### **KONICA MINOLTA** **bizhub C250**

	List Price
bizhub C250	\$9,995
ADF	\$1,465
Fax Kit	\$1,150
Automatic Duplex Unit	\$455
Staple Finisher	\$1,580
<b>TOTAL</b>	<b>\$14,645</b>



## COPIER PRODUCTIVITY

Copier productivity is calculated in copies per minute (cpm) when copying a monochrome 10-page document. Jobs were timed from the press of the “Start” button until the complete exit of the last copy into the output tray. Testing was performed using the document feeder and default settings. Duplex tests were made copying the same 10-page document, but printing on both sides of the output page (i.e.-simplex to duplex).

Monochrome	Ricoh Aficio MP C2500SPF SPF		Konica Minolta bizhub C250
Rated Copy Speed	25 cpm	--	25 cpm
Paper Source/Destination	Tray 1/Finisher	--	Tray 3/ Finisher
Paper Feed	Long-edge	--	Long-edge
		Advantage	
Simplex First Copy Out Time	13.1 seconds	✓	20.9 seconds*
1 Set Simplex	17.6 cpm	✓	14.1 cpm
3 Sets Simplex	22.2 cpm	✓	19.1 cpm
5 Sets Simplex	23.4 cpm	✓	20.5 cpm
10 Sets Simplex	24.9 cpm	✓	21.7 cpm
Duplex First Copy Out Time	24.8 seconds	✓	28.3 seconds
1 Set Duplex	13.0 cpm	✓	11.1 cpm
3 Sets Duplex	19.4 cpm	✓	17.1 cpm
5 Sets Duplex	21.4 cpm	✓	19.1 cpm
10 Sets Duplex	23.5 cpm	✓	21.0 cpm
Simplex Ranking**	1	--	2
Duplex Ranking**	1	--	2

\*Note that after producing approximately 125 pages, the Konica Minolta bizhub C250 pauses for approximately two minutes in order to recalibrate image quality. This is a severe disadvantage not only because it hampers productivity, but also during recalibration, the touch screen does not indicate what is occurring, so that the user may mistakenly assume “something is wrong,” and that their job is “lost.”

\*\*Ranked 1 or 2, with 1 being the best.

## IATSD “Snapshot” of Competitive Copier Productivity Test Results

In the chart below, we compare the Ricoh Aficio MP C2500SPF's *monochrome* copier productivity to that of the Konica Minolta bizhub C250.

Monochrome		Simplex Copies (cpm)					Duplex Copies (cpm)				
Vendor	Rated Copy Speed	FCOT*	1 Set	3 Sets	5 Sets	10 Sets	FCOT*	1 Set	3 Sets	5 Sets	10 Sets
Ricoh	25 cpm	13.0	17.6	22.2	23.4	24.9	24.8	13.0	19.4	21.4	23.5
Konica	25 cpm	20.9	14.1	13.1	20.5	21.7	28.30	11.1	12.1	19.1	21.0

\*FCOT = First Copy Out Time (seconds).

The chart below compares the Ricoh Aficio MP C2500SPF's *color* copier productivity to that of the Konica Minolta bizhub C250.

Color	Ricoh Aficio MP C2500SPF	Advantage		Konica Minolta bizhub C250
Rated Copy Speed	25 cpm			25 cpm
First Page Out Time	12.8 seconds	✓	--	43.2 seconds
1 Set Simplex	17.6 cpm	✓	--	13.9 ppm
Ranking*	1		--	2

\*Ranked 1 or 2, with 1 being the best.

**Analysis:** The Ricoh Aficio MP2500SPF appears to be somewhat inherently faster in the test task scenarios than the Minolta bizhub C250. This performance differential is exacerbated by the fact that bizhub pauses frequently for a several minute long image quality calibration. Not only does this have a large affect on the longer-run jobs, but users may also find this pause confusing, and assume that the print run has been aborted before completion.

## Network Printer Productivity (PCL):

Network Printer Productivity is calculated in pages per minute (ppm) using the PCL print driver to print a monochrome 10-page Microsoft Word text document. Tests were performed under controlled conditions using a client workstation running Microsoft Windows XP Professional. Each device's print drivers were installed on the PC running Windows 2000 Server Edition. Jobs were printed using the applicable Microsoft Office 2000 applications and the latest print drivers. They were sent over the network to an Ethernet printer port installed on the server. Jobs were timed from the "click of the mouse" until the complete exit of the last print into the output tray.

Monochrome (PCL)	Ricoh Aficio MP C2500SPF		Konica Minolta bizhub C250
PCL Level	6	--	6
Rated Print Speed	25 ppm	--	25 ppm
Paper Source/Destination	Tray 1/Finisher	--	Tray 3/Finisher
Paper Feed	Long-edge	--	Long-edge
		Advantage	
Simplex First Page Out Time	12.0 seconds	✓	16.4 seconds
1 Set Simplex	16.2 ppm	✓	15.4 ppm
3 Sets Simplex	21.4 ppm	✓	19.8 ppm
5 Sets Simplex	22.9 ppm	✓	21.0 ppm
10 Sets Simplex	24.5 ppm	✓	23.8 ppm
Duplex First Page Out Time	27.7 seconds		24.5 seconds
1 Set Duplex	14.0 ppm	✓	11.7 ppm
3 Sets Duplex	20.1 ppm	✓	17.8 ppm
5 Sets Duplex	21.9 ppm	✓	19.6 ppm
10 Sets Duplex	23.9 ppm	✓	22.9 ppm
Simplex Ranking*	1	--	2
Duplex Ranking*	1	--	2

\*Ranked 1 or 2, with 1 being the best.

## Network Printer Productivity (RPCS):

Network Printer Productivity is calculated in pages per minute (ppm) using the RPCS print driver with the Aficio MP C2500SPF and the PCL 6 driver with the bizhub C250. The test document was a monochrome 10-page Microsoft Word text document. Tests were performed under controlled conditions using a client workstation running Microsoft Windows XP Professional. Each device's print drivers were installed on the PC running Windows 2000 Server Edition. Jobs were printed using the applicable Microsoft Office 2000 applications and the latest print drivers. They were sent over the network to an Ethernet printer port installed on the server. Jobs were timed from the "click of the mouse" until the complete exit of the last print into the output tray.

Monochrome (PCL)	Ricoh Aficio MP C2500SPF		Konica Minolta bizhub C250
PCL Level	RPCS	--	6
Rated Print Speed	25 ppm	--	25 ppm
Paper Source/Destination	Tray 1/Finisher	--	Tray 3/Finisher
Paper Feed	Long-edge	--	Long-edge
		Advantage	
Simplex First Page Out Time	12.2 seconds	✓	16.4 seconds
1 Set Simplex	16.2 ppm	✓	15.4 ppm
3 Sets Simplex	21.4 ppm	✓	19.8 ppm
5 Sets Simplex	22.5 ppm	✓	21.0 ppm
10 Sets Simplex	24.0 ppm	✓	23.8 ppm
Duplex First Page Out Time	27.7 seconds		✓ 24.5 seconds
1 Set Duplex	14.1 ppm	✓	11.7 ppm
3 Sets Duplex	22.3 ppm	✓	17.8 ppm
5 Sets Duplex	21.9 ppm	✓	19.6 ppm
10 Sets Duplex	23.9 ppm	✓	22.9 ppm
Simplex Ranking*	1	--	2
Duplex Ranking*	1	--	2

\*Ranked 1 or 2, with 1 being the best.



## Microsoft PowerPoint Printer Productivity (PCL)

PowerPoint Printer Productivity is calculated in pages per minute (ppm) using the PCL print driver to print a color 10-page Microsoft PowerPoint document in grayscale mode. This document has a solid colored background, which provides a high pixel count and extensive page coverage. Tests were performed under controlled conditions using a client workstation running Microsoft Windows XP Professional. Each device's print drivers were installed on the PC running Windows 2000 Server Edition. Jobs were printed using Microsoft PowerPoint 2000 and the latest print drivers. They were sent over the network to an Ethernet printer port installed on the server. Jobs were timed from the "click of the mouse" until the complete exit of the last print into the output tray.

Grayscale	Ricoh Aficio MP C2500SPF	Advantage		Konica Minolta bizhub C250
Rated Print Speed	25 ppm			25 ppm
First Page Out Time	14.1 seconds	✓	--	17.2 seconds
1 Set Simplex	16.2 ppm	--	✓	20.5 ppm
Ranking*	--			--

\*Ranked 1 or 2, with 1 being the best.

## Large File Printer Productivity (PCL)

Large File Printer Productivity is calculated in pages per minute (ppm) using the PCL print driver to print a continuous-tone TIFF image (ANSI "Bicycle. Tests were performed under controlled conditions printing from a client workstation running Microsoft Windows XP Professional. A single page composite TIFF image (20.48 Mb) was printed in color using Imaging for Windows and the latest print drivers. It was sent over the network to an Ethernet printer port installed on the server. Jobs were timed from the "click of the mouse" until the complete exit of the last print into the output tray. Where multiple page times are given, they are for printing multiple copies of the single page file.

Color	Ricoh Aficio MP C2500SPF	Advantage		Konica Minolta bizhub C250
Rated Print Speed	25 ppm			25 ppm
1 Page	4.5 ppm	✓	--	2.1 ppm
3 Pages	10.0 ppm	✓	--	2.9 ppm
5 Pages	13.2 ppm	✓	--	3.8 ppm
Ranking*	1	--		2

\*Ranked 1 or 2, with 1 being the best.

## Software

The Chart below provides a feature and function analysis of the administration utilities, print drivers, and client software provided with each device.

Software	Ricoh Aficio MP C2500SPF	Advantage		Konica Minolta bizhub C250
Network Monitoring	Web SmartDeviceMonitor, Smart DeviceMonitor, Web Image Monitor	--	--	PageScope NetCare
Network Setup	NIB Setup Tool, SNMP Setup Tool	--	--	PageScope Network Setup
Tools for Automatic Deployment of Client Software	No	--	--	No
Web Browser-Based Client/Administrator Tool	Web SmartDeviceMonitor for Admin Web SmartDeviceMonitor for Client	--	--	PageScope Web Connection
Device-Resident Document Storage for Print-On-Demand	Yes	--	--	Electronic Mailboxes
Document-Management for Network Scanning	TWAIN driver is standard. Optional GlobalScan, ScanRouter, DocumentMall, and eCopy	✓	--	Optional PageScope Cabinet Pro, PageScope Router
Print Drivers	PCL 5c, PCL 6, Adobe PostScript 3, Refined Print Command Stream (RPCS)	✓	--	PCL 5c, PCL 6, Visual (PS 3 emulation)
Ranking:	1			2

**Analysis:** Both the Aficio and the bizhub have very similar suites of utilities. Ricoh's SmartDeviceMonitor and Minolta's PageScope utilities are evenly matched in capabilities with no clear leader. The Aficio provides only a TWAIN driver, but both vendors offer optional scanning and routing utilities.

The one area of utilities where Ricoh has a clear advantage is in the available print drivers. Ricoh not only offers genuine Adobe PostScript 3, but its own Refined Print Command Stream (RPCS) driver as well. The bizhub's PostScript is an emulation, not true Adobe PostScript. With an emulator, it is possible that the output might not exactly match that produced by Adobe PostScript. Whether or not this is a potential problem will depend on the applications from which files are being printed.

## USER INTERFACE

# RICOH



Figure 1 – The Ricoh Aficio MP C2500SPF's control panel.

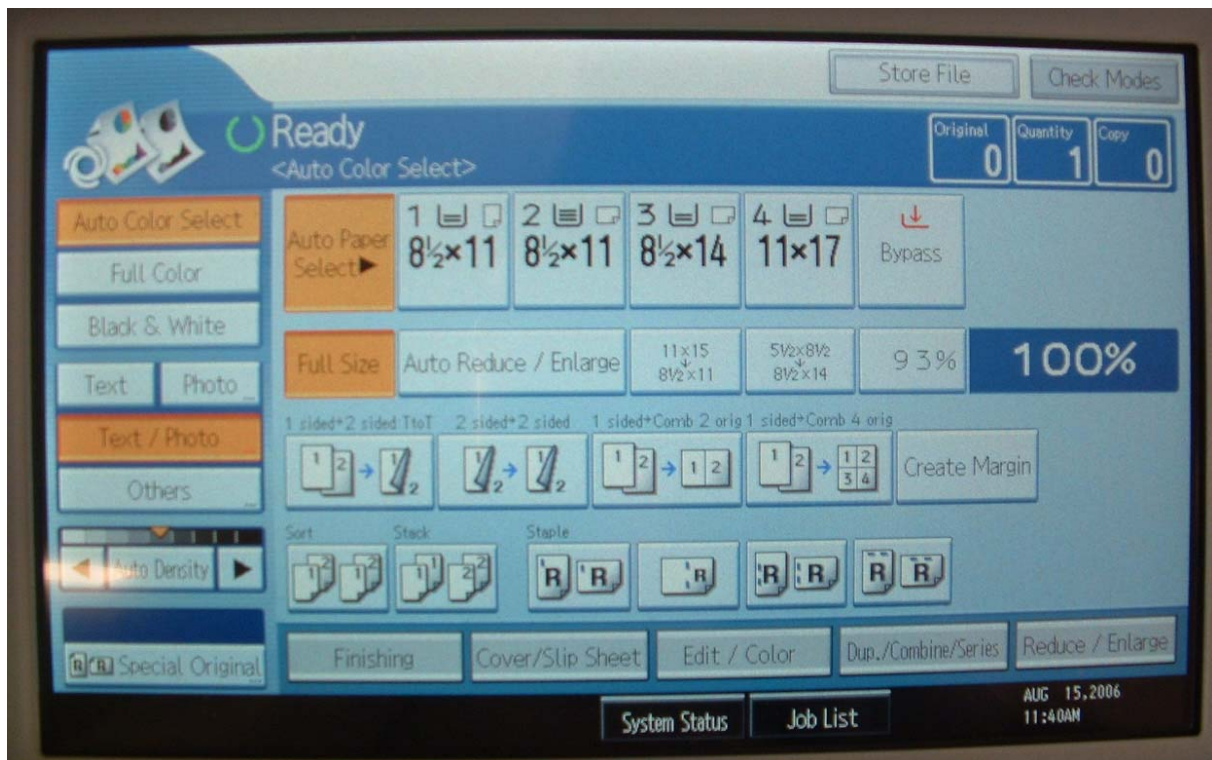


Figure 2 – The Ricoh Aficio MP C2500SPF's main touch screen.



Figure 3 – The Konica Minolta bizhub C250's control panel.

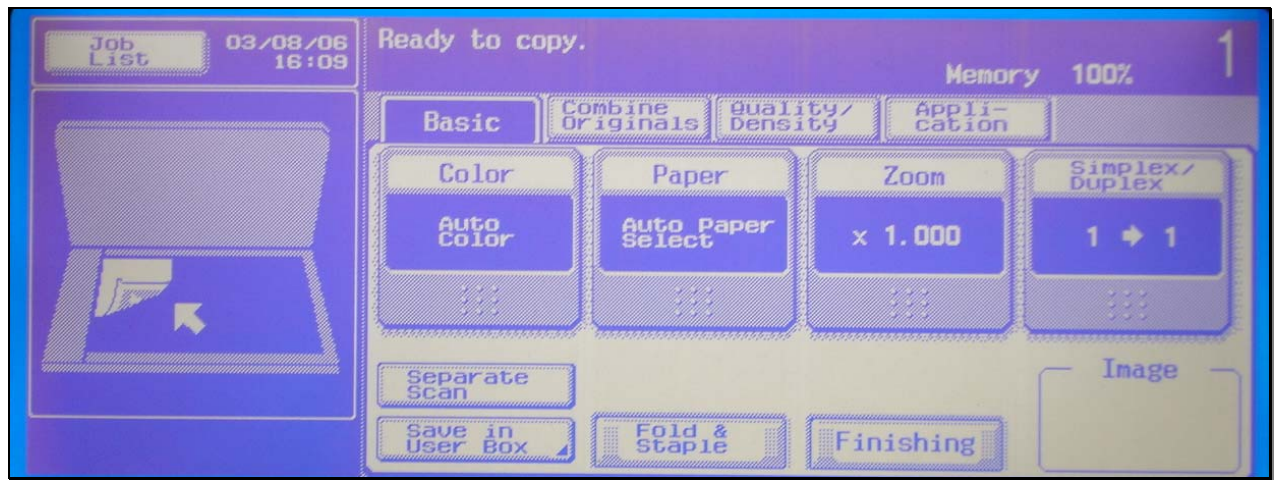


Figure 4 – The Konica Minolta bizhub C250's touch screen.

Touch Screen Considerations		
	Ricoh Aficio MP C2500SPF	Konica Minolta bizhub C250
Commonly Used Features on Main Screen	✓	✓
Low Reliance on Submenus	✓	✗
“QWERTY Style” Virtual Keyboard	✓	✓
Simplified Virtual Keyboard Available	✓	✗

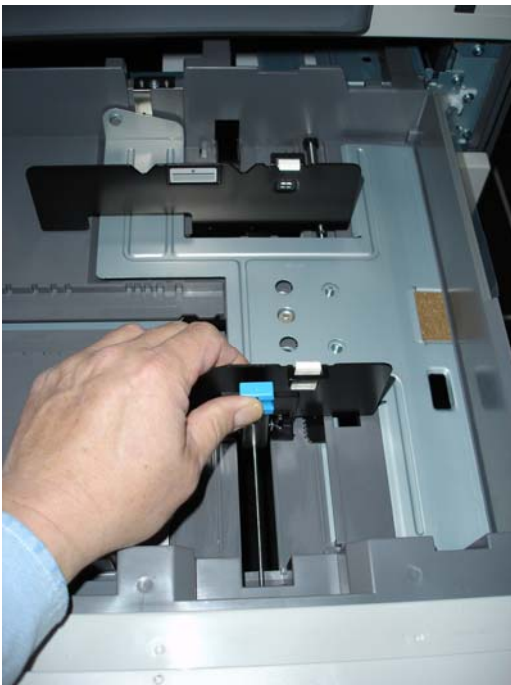


## SUPPLY MAINTENANCE

### Adding Paper



**Figures 5-6 – The Aficio’s four paper drawers are nicely aligned and pull out easily for adding paper. Build quality on the unit is excellent. When adding paper, guides slide smoothly to the required position. A paper guide lock in the drawer prevents the guides from moving after they have been adjusted. Paper size changes are detected and displayed automatically.**



**Figures 7-8 – On the left, the user is adjusting one of the Konica Minolta bizhub C250’s side paper-size guides; on the right, the user is adjusting the captured back paper-size guide. Note that the drawer has a spring-loaded ramp that must be locked down before paper can be added. When the paper size is changed, it is automatically reflected on the control panel and over the network.**

Paper Drawer Considerations		
	Ricoh Aficio MP C2500SPF	Konica Minolta bizhub C250
No Corner Separators in Paper Drawers	✓	✓
No Spring-Loaded Ramps in Paper Drawers	✓	✗*
No Captured Rear Guide in Paper Drawers	✓	✓
Paper-Size Changes Automatically Updated	✓	✓

\*Paper Drawer 1 does have a spring-loaded ramp.

**Analysis:** Both the Aficio MP C2500SPF and the Konica Minolta bizhub C250 have similar paper handling capabilities, and both have captured rear guides in the drawers, which make it easy to change paper sizes when necessary. The only difference between the two systems in the area of paper-drawer considerations is that the bizhub's paper drawer 1 does have a spring-loaded ramp which must be locked down to load paper. Some vendors claim that a spring-loaded drawer increases paper feed reliability, though we have not quantified this in our testing.

## Adding Toner



**Figures 9-10 – Replacing the Ricoh Aficio MP C2500SPF's four toner cartridges is a relatively easy and clean process. The user twists the round toner cartridge slightly to release it, and pulls it out of the machine. The new toner cartridge is then inserted all the way into the vacant opening, and given a quarter-turn twist to lock it. The unit utilizes four toner cartridges, one for each color (cyan, yellow, magenta and black).**



**Figure 11 -- In order to replace the Konica Minolta bizhub C250's four toner cartridges shown above (yellow, magenta, cyan and black), the users flips down the lever of the toner color that needs changing, removes the empty cartridge, slips the new cartridge in, and flips the lever back up until it locks into position. Also shown are the replaceable drum/developer units, one for each color of toner.**

Toner System Considerations		
	Ricoh Aficio MP C2500SPF	Konica Minolta bizhub C250
Bottle Toner	✓	✗
Cartridge Toner	✓	✓
Load While Running	✗	✗

**Analysis:** Both the Aficio and the bizhub use dry four-color process toner, as do other laser-based color printers/copiers. Toner cartridges are also ubiquitous in this type of device. The Aficio's toner cartridge is basically just a big bottle filled with toner powder.

The bizhub's toner cartridge is similar, though it is more a cartridge than a bottle. As with the Aficio, the bizhub separates the toner and the photocoductor drum/developer. The bizhub C250 uses four separate imaging units, accessed through the same front panel used to access the toner cartridges. Each of these units contains a separate drum and developer unit.

The Aficio uses a single drum unit and toner transfer belt. Neither of these approaches is inherently better. The Aficio's single drum has a longer projected lifespan, but is also more expensive than the separate drum/developer units that the bizhub uses.

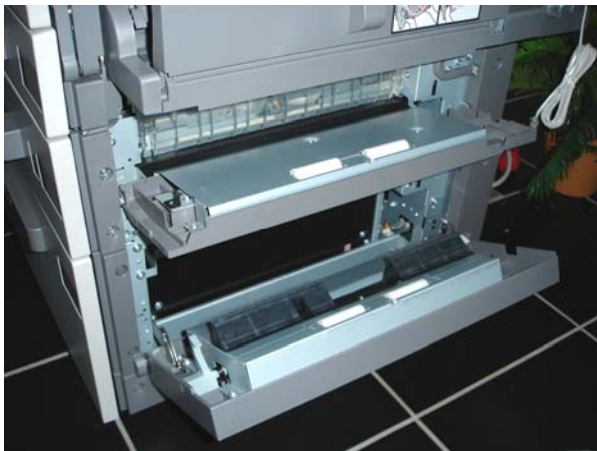
Both units also offer a positive cartridge locking system. The cartridges on the Aficio require a turn to lock them in, while the bizhub has locking bars which swing out of the way when cartridge replacement is necessary. Neither vendor has a clear advantage in this area.



## Removing Misfeeds



**Figure 12 –Ricoch Aficio MP C2500's right misfeed-access area.**



**Figures 13-14 - On the left is the Konica Minolta bizhub C250's left misfeed-access area, while on the right is the misfeed-access area for the finisher bridge.**

Misfeed Access Considerations		
	Ricoh Aficio MP C2500SPF	Konica Minolta bizhub C250
Number of Engine Access Panels	4	3
“Works in a Drawer” Misfeed Access	×	×

Space Requirement Considerations		
	Ricoh Aficio MP C2500SPF	Konica Minolta bizhub C250
Finisher Remains Stationary for Engine Misfeed Access	✓	×
LCT Remains Stationary for Engine Misfeed Access	✓*	N/A**
No Front Space Required for Misfeed Access	✓	✓
No Left Side Space Required for Misfeed Access	✓	×
No Right Side Space Required for Misfeed Access	×	×
No Finisher Bridge Misfeed Access	×	×

\*LCT was not installed in tested device.

\*\*In order to maintain a small footprint, the device is designed to be stacked on top of optional paper drawers.

**Analysis:** The Ricoh Aficio MP C2500SPF uses a toner transfer belt. The paper only touches this belt as it passes directly up from the paper drawer on the right side of the machine. Because of this very direct paper path there is no need for left or center misfeed access. This gives the Aficio a considerable advantage in this area of comparison.

## POINTS TO CONSIDER

Following are key points, both negative and positive, that you should know when you are competing against the Konica Minolta bizhub C250. (In the next section, *Points To Stress*, we consider some of the Konica Minolta bizhub C250's vulnerabilities when compared to the Ricoh Aficio MP C2500SPF.)

### STANDARD MEMORY

The Ricoh Aficio MP C2500SPF is equipped with 1GB of internal memory. The Konica Minolta bizhub C250 has 512MB of memory.

### PAPER HANDLING

Both the Konica Minolta bizhub C250 and the Ricoh Aficio MP C2500SPF can image a maximum original size of 11" x 17". Both machines can print on 12" x 18" paper in order to produce full-bleed tabloid size (11" x 17") images.

### MAXIMUM PAPER CAPACITY

The Konica Minolta bizhub C250 has a maximum paper capacity of 3,350 sheets while the Ricoh Aficio MP C2500SPF's maximum paper capacity is 3,100 sheets.

### DOCUMENT FINISHING

The Konica Minolta bizhub C250 offers a choice of a standard finisher with a 30-sheet stapler or a high-performance finisher that can staple up to 50 sheets as well as booklet bind sets of up to 15 sheets. The Ricoh Aficio MP C2500SPF offers a choice of a 500-sheet finisher or a 1,000 sheet finisher. Both of these have 50-sheet stapling capability.

### COPIER FEATURES

The Ricoh Aficio MP C2500SPF and the Konica Minolta bizhub C250 both provide additional copier features including image rotation, book copy, and job programs.

## POINTS TO STRESS

When you find yourself competing against the Konica Minolta bizhub C250, stress the following:

### PRICING

✓	While the Konica Minolta bizhub C250 base unit has a lower list price than the Ricoh MP C2500SPF, when configured identically, the bizhub and the Ricoh Aficio MP C2500SPF are priced almost identically.
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### PRODUCTIVITY

✓	In testing Copier Productivity, the Ricoh Aficio MP C2500SPF was consistently more productive than the Konica Minolta bizhub C250. It also had faster First Copy Out times.
✓	In testing Printer Productivity, the Ricoh Aficio MP C2500SPF was more productive than the Konica Minolta bizhub C250 in almost all of the PCL and PostScript network printer tests. It also had faster simplex First Page Out times.
✓	In testing Large File Printing Productivity, the Ricoh Aficio MP C2500SPF was consistently more productive than the Konica Minolta bizhub C250.
✓	In operating the Konica Mionolta bizhub C250, the printer's delays for image recalibration can fool a user into thinking that a print job has failed to complete.

**DOCUMENT FEEDER**

✓	Unlike most of the machines on the market, including the Konica Minolta bizhub C250, the Aficio MP C2500SPF does not need to position an original document being scanned from the ADF onto the glass platen. A separate scan head just for the ADF scans both sides of the original as it is being fed. Other machines, including the bizhub C250, need to feed the document, position it on the platen, scan the first side, flip the document and reposition it on the platen, then scan the second side. Obviously, the Aficio is much faster when it comes to duplex scanning.
✓	While Ricoh Aficio MP C2500SPF features a standard 50-sheet document feeder, the Konica Minolta bizhub C250's document feeder is an option that must be purchased and installed.

**CONTROL PANEL**

✓	<p>The Ricoh Aficio's control panel is easier to use. A user simply presses the displayed icon to select what kind of original is being copied, then selects what kind of copy is desired. This makes copying extremely easy, especially for casual operators who may not use the device on a daily basis. In contrast, the Konica Minolta bizhub C250's touch screen features a complicated system of sub-menus and icons that will take non-Konica Minolta users some time to decipher.</p> <p>Another big Aficio advantage is the Simplified Display button. This reduces the number of icons and operations displayed on the control panel, which makes operation of the machine less threatening to inexperienced users in all modes that the Aficio offers.</p>
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**DIRECT PDF PRINTING**

The Ricoh Aficio MP C2500SPF features direct PDF printing. This allows Adobe PDF files to be sent directly to the Aficio MP C2500SPF without using Adobe Acrobat or other reader/converter software. The Aficio MP C2500SPF directly renders PDF files into printed output, so that output from this type of file is much faster and productivity is improved. This process also minimizes the potential for conversion errors. With PDF rapidly becoming the de facto standard for file sharing formats, the Aficio's direct PDF printing is an especially advantageous capability. In contrast, the Konica Minolta bizhub C250 lacks direct PDF printing; instead, the unit must pre-process PDF files, which results in slower performance.

**SIMPLE PAPER PATH**

The Ricoh Aficio MP C2500SPF uses a toner transfer belt system to simplify the paper path. The paper feeds from one of the drawers and touches the transfer belt only in one specific spot. This direct paper path greatly cuts down on jams and the need to go through complicated misfeed operations.

**PICBRIDGE**

The Ricoh Aficio MP C2500SPF features PicBridge capability to print photos directly from a digital camera. This feature is not available at all on the Konica Minolta bizhub C250.

What Konica Minolta Will Talk About	What Konica Minolta <i>Won't</i> Talk About
<ul style="list-style-type: none"> <li>➤ <i>PageScope</i> can be used to monitor groups of printers and provides a job log that shows the status of print jobs.</li> </ul>	<ul style="list-style-type: none"> <li>➤ Ricoh's <i>SmartDeviceMonitor</i> provides essentially the same capabilities and is easily configured for client or administrator's workstations.</li> </ul>
<ul style="list-style-type: none"> <li>➤ The Konica Minolta bizhub C250 is an "nth" generation color product.</li> </ul>	<ul style="list-style-type: none"> <li>➤ "N" generations don't mean much if the product does not substantially improve between upgrade releases. Ricoh has also been in the business for several product generations, and the Aficio MP C2500SPF incorporates industry-leading features and performance.</li> </ul>
<ul style="list-style-type: none"> <li>➤ The Konica Minolta bizhub C250 is a "mature" product, and consequently, produces industry-leading color image quality.</li> </ul>	<ul style="list-style-type: none"> <li>➤ This wasn't evident from our testing. The Konica Minolta bizhub C250's output was actually average or below average quality in the majority of the Image Quality tests performed by IATSD.</li> </ul>
<ul style="list-style-type: none"> <li>➤ The Konica Minolta bizhub C250 is rated for a Maximum Monthly Volume of 75,000 pages verses the Aficio MP C2500SPF's 20,000 page rating.</li> </ul>	<ul style="list-style-type: none"> <li>➤ Maximum Monthly Volume has little grounding in reality. Each vendor determines this number themselves. With proper PM and service, the Ricoh Aficio MP C2500SPF is easily able to equal the monthly printing volume of any of its competitors.</li> </ul>

## FEATURES AND SPECIFICATIONS

	RICOH AFICIO MP C2500SPF	ADVANTAGE		KONICA MINOLTA BIZHUB C250
Maximum Monthly Volume	20,000 pages		✓	75,000 pages
Imaging Technology	Laser			Laser
Resolution	600 x 600 dpi			600x 600 dpi
Image Enhancement	Yes	✓		No
Gray Scale	265 shades	✓		265 shades
Standard Memory	1GB, 40 GB hard drive	✓		512 MB, 40 GB hard drive
Power Source	120V, 12A, 60Hz			120V, 11.5A, 60Hz
Dimensions (HxWxD)	29.1" x 25.6" x 25.9"	✓		30.25"x25.75"x29.75"
Weight	264.5 lb.		✓	207 lbs.
<b>SPEED</b>				
Rated First Copy Out Time	6.7 seconds monochrome/ 9.7 seconds color	✓		8.4 seconds monochrome/ 11.7 seconds color
Rated Copy/Print Speed	25 ppm monochrome and color			25 ppm monochrome and color
<b>ORIGINAL HANDLING</b>				
Original Input	Standard 50-sheet ARDF	✓		Opt. 100 page ARDF
Maximum Original Size	11" x 17"		✓	11" x 17"
Minimum/Maximum Copy Size	3.5" x 5.5" / 12" x 18"	✓		4"x 6" / 12" x 18"
Copy Quantity	1-999			1-999
<b>PAPER CAPACITY</b>				
Standard Paper Capacity	1,100 sheets	✓		850 sheets
Optional Paper Supply	2x500-sheet drawers; 2,000 sheet LCT		✓	500-sheet drawer; 2,500-sheet LCT; 2x500-sheet drawers
Paper Weight	14 lb. bond-140 lb. index (253 gms)	✓		10 lb. bond-58 lb. bond
Maximum Paper Capacity	3,100 sheets		✓	3,350 sheets
<b>REDUCTION/ENLARGMENT</b>				
Zoom %/Increments	25-400%/1%			25-400%/1%
<b>SADDLE-STITCH BOOKLET MAKER FINISHER</b>				
	1,000 sheets			Optional
Booklet Stapling Capacity	50 sheets		✓	15-sheet saddle-stitched booklets
<b>FINISHER</b>				
Total Capacity	2 Finishers: 500 sheets (50-sheet stapling); 1,000 sheets (50-sheet stapling)			Optional/Capacity data not available
<b>MAILBOX</b>				
	Standard electronic mailboxes			Standard electronic mailboxes
<b>NETWORK PRINTING</b>				
Standard or Optional	Standard			Standard
Image Processing	Direct PDF printing without the need for additional software or utilities.	✓		Requires image processing.
Network-Printer Management Software	Web SmartDeviceMonitor, SmartDevice Monitor for Admin, SmartDeviceMonitor for Client			PageScope Web Connection, PageScope Network Setup, PageScope Job Spooler
Network Interface	10BaseT/100BaseTX			10/100BaseTX
Proof/Secure/Store Printing	Yes			Yes
Automatic E-Mail Alerts	Yes			Yes
Wireless-printing Option	Yes	✓		No



	RICOH AFICIO MP C2500SPF	ADVANTAGE	KONICA MINOLTA BIZHUB C250
Job-Accounting Software	Optional		Optional
<b>NETWORK SCANNING</b>			
Standard or Optional	Standard		Standard
Color Scanning	Yes		Yes
Scan to e-Mail Addresses	Yes		Yes
Scan to Network Folders	Yes		Yes
Scan to FTP Sites	Yes		Yes
Scan to Fax	Yes		Yes
Scan to LAN Fax	Yes		Yes
Authentication	Yes		Yes
LDAP compatible	Yes		Yes
<b>FAX</b>			
	Standard in SPF models		Optional
<b>COPIER FEATURES</b>			
Auto Paper Select	Yes		Yes
Auto Reduce/Enlarge	Yes		Yes
Auto Start	Yes		Yes
Auto Tray Switching	Yes		Yes
Book Copy	Yes		Yes
Covers	Yes		Yes
Energy Save	Yes		Yes
Image Modes	Yes		Yes
Image Repeat	Yes		Yes
Image Rotation	Yes		Yes
Job Build	Yes		Yes
Job Programs	Yes		Yes
Mixed-Size Originals	Yes		Yes
Scan-Once-Print-Many	Yes		Yes
Stamping	Yes		Yes
<b>YIELDS</b>			
Drum Type/Yield	Four Separate Drums/80,000 pages		Four imaging units: cyan, yellow, magenta / 45,000 pages black / 70,000 pages
Toner Type/Yield	Four toner cartridges: cyan, yellow, magenta / 15,000 pages black / 20,000 pages	✓	Four toner cartridges: cyan, yellow, magenta / 12,000 pages black / 20,000
Developer Yield	160,000 pages		Included in imaging cartridge

\*Information not available.



## Competitive Test Report

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