

# Rules-Based Printing

## Software solutions that leverage the network

by: Denine Phillips, Tech-Write LLC

The August *Office Technology* cover story, “Device Management: Providing remote MFP configuration and monitoring,” highlights how remote administration of network output devices (printers/MFPs) can save dealers and end users time and money. Indeed, device management (DM) solutions automate error-prone, manual tasks — meter collection, supply ordering, configuration and firmware upgrades — while also streamlining service dispatch and call resolution. To accomplish these tasks, DM solutions track:

- Monthly device utilization: both black-and-white and color volumes
- Service status: out-of-paper/toner, error conditions, etc.
- Device type: Ricoh, Xerox, Canon, HP, etc.

Many other metrics are tracked, providing valuable insight into fleet usage and trends. Based on this information, sales professionals can partner with decision makers (CIOs, CFOs, IT) in an ongoing dialog about ways to reduce waste or resource abuse. It may be suggested, for instance, that a centralized high-volume MFP replace costly desktop printers. Measurable cost savings can then be realized through the elimination of redundant devices in favor of lower cost-per-copy, energy-efficient MFPs.

Where does rules-based printing come in? “Rules-based printing is a common module within our suite of cost recovery solutions that can complement Ricoh’s @Remote Device Management offering,” says Craig Temple, output solutions manager at Ricoh Americas Corp. “So early in a customer engagement, the account rep assesses the customer’s print environment using @Remote or other assessment tools to track and collect raw data. @Remote Fleet Utilization and Green Reports, for example, uncover how many pages network devices are generating each month and may indicate that customers are printing a high volume of single-sided, color pages. In an effort to reduce those costs, a procedural change is instituted; users are asked to print



black-and-white, duplex (double-sided) pages. This lowers paper costs, saves trees and decreases carbon footprint — which supports cost reduction and green initiatives.”

Temple has found that over time, however, old habits resurface. “While procedural changes result in an initial decline in print costs, they eventually rise right back up to the same point or higher,” says Temple. “What ‘rules’ do is give customers the tools to ensure that savings are realized by redirecting print jobs to the most efficient devices and putting controls on printer usage and feature availability. Now, if you want users to print black-and-white, duplex pages, those rules are applied to users or groups on the network. So, if a user tries to print a 20-page report to his (or her) desktop printer, a pop-up message on the computer screen — customized within the admin module — might say, ‘It will cost the company \$4.80 to print to your personal printer. Please send jobs of more than 10 pages to the MFP down the hall instead.’ If human resources is printing résumés from an e-mail application, there is clearly no reason why they cannot print in black and white and duplex. But just making that suggestion to users is not enough. The instinct is to just hit the print button. Unless the driver defaults are set to duplex and black and white, you are

wasting valuable resources. With rules-based printing, the customer is leveraging software to realize actual savings, rather than relying on policy changes.”

“Before rules can be established, an assessment phase is needed to determine what controls are required,” explains Dewey Rodgers, worldwide solutions marketing manager at Xerox Corp. “Do they need to limit the use of

color? Do they want to track usage to an individual or department? Do they want to route those users to a more productive printer? It is not uncommon to find that a printer or MFP keeps breaking down because too many people are printing to that device, which is not rated for that volume of use. This helps customers understand which MFP they need for a particular department. Then they can narrow down, from a rules-based standpoint, if a department is printing too many color pages. The administrator can then set a rule for an individual or group that says, ‘You need to direct this print job to the copy center.’”

You may also ask the customer if they have a green initiative. Rules can be created that say, “You are increasing CO2 emissions by printing to your desktop printer,” or “Duplexing saves X trees.” So it may be a cost reduction, color restriction and/or green initiative that drives rules-based printing, and these rules can be applied to a device, user or group. Since the rules reside on a server, the administrator typically constructs the rules using a wizard-type interface. The rule is saved under a name and then the admin picks the target for that particular rule. The rule can then be applied to everyone, just User A, or an entire department.

The principle behind Canon’s uniFLOW’s rules-based printing is essentially the same. As Shalin Shah, lead technical marketing analyst at Canon U.S.A., explains: “uniFLOW enables the administrator to define the print job variables to be monitored, like the number of pages, user ID, color or black-and-white jobs, and more. Those rules are then applied to a user or group. For example, if a user sends a print job of more than 10 pages to a desktop printer, the job can be automatically routed to an MFP. uniFLOW can also change print job properties based on defined rules. A rule may say that any color print job of more than 50 pages should automatically be printed in black and white. Similarly, any print job of more than 100 pages should be automatically duplexed.”

Rules-based printing is not limited to just print workflow. Ricoh, Xerox and Canon solutions support walk-up rules at

Rules-based printing is a proven way to leverage the network to deliver significant cost savings, perhaps leading to MPS engagements ...

the MFP control panel.

■ Ricoh PCS Director is an optional embedded application that enables the user to log in and then it tracks everything the user does. At the same time, the administrator can apply rules. If a user walks up and tries to make 200 color copies, a screen pops up saying, “I’m sorry. You must use a different device. This device is limited to 20 color copies.”

■ Using the Xerox Secure Access Unified ID System, the user can authenticate at the device using a proximity card (swiped on a card reader attached to the MFP). PIN code authentication is also supported. The caveat: In order to apply rules or reroute documents, the device has to know who you are.

■ Using Canon’s uniFLOW, the administrator defines ‘access levels’ at the uniFLOW server. Based on a user’s access level, he is either allowed to use certain functions or is denied access entirely.

The common thread among these solutions: Only after a user is authenticated on the network can the server apply rules to the logged-in user.

Is there a specific target market for rules-based printing? “When rules-based printing appeared five years ago or so, very large corporations were the early adopters,” says Dewey. “Today it runs the gamut from small law firms to major accounts.”

Shah also considers the market wide open, with potential targets including any customer seeking to maximize office efficiency and control the total cost of printing. Temple drills down further, identifying any environment with five or more connected devices as a “definite prospect.”

Rules-based printing is a proven way to leverage the network to deliver significant cost savings, perhaps leading to MPS engagements and further driving down the cost of doing business. A compelling sales opportunity, reps interested in pursuing this type of solution sale need not go it alone. The manufacturers’ support engineers will assist in analyzing the environment to determine exact needs. Though the sales cycle may be extended, there is a huge upside: Customers that deploy your DM and cost-recovery software also buy your hardware. ■

*Denine Phillips of Tech-Write LLC specializes in the development of marketing collaterals, technical manuals and training materials for the office technology industry. She can be reached at [denine.phillips@comcast.net](mailto:denine.phillips@comcast.net). Visit [www.tech-write.biz](http://www.tech-write.biz).*

