SUCCESS STORY

Customer: Mercury Insurance Co. Brea, CA

Contacts: Jerry Pham, R&D/Applications Development Manager

Guy Plouffe, system analyst, Xerox Corp.

Environment: Mercury's main data center processing nationwide account information on a system of 12 interconnected HP3000s. Three dedicated exclusively to underwriting document applications. Database-generated California auto insurance policyholder documents data-streamed to a mix of 20 network laser printers, operating full-time from 11:00 P.M. through 5:00 A.M. System stretched to 100,000 documents/day. Post production staff of eight manually collating the documents for afternoon mailings.

Primary Solution Sought: Achieve optimum daily mail fulfillment requirements that maximize systems efficiency, effectively manage costs, and provide detailed audit trails of the policy assembly process.

Secondary Concerns: Automate collation, eliminate, labor and expense of manual collation, reduce errors in insurance policy documents prepared for mailing. Reduce expenses associated with the network printer upkeep and maintenance. Design system capabilities to also incorporate automated, bar-coded instructions for document folding and envelope stuffing in the future. Accommodate projected increases in print production volume. Incorporate disaster recovery options into overall system plan. Migrate solution to many other Mercury Insurance document production applications.

Requirements: Decompose/recompose PCL data streams so printers could print all documents related to a specific account in sequence, providing automated collating and debugging of existing database.

Options: 1. Find turnkey PCL data stream parsing product from a reliable vendor. 2. Re-code PCL data streams for all existing document output and re-write HP3000 application software. 3. Hire an outside print production service for off-site mail fulfillment. 4. Implement the HostServe *Weaver* a windows based server solution from *American PrintWare*.

Solution: Implement American PrintWare solution to commingle and weave printer code for sequential output to automate collating six document files, including migration path to include automated document folding, envelope insertion of existing auto policy requirements and expand to other Mercury printing applications in the future.

Results: APWI's HostServe with *Weave, a* Windows-based server, PCL data stream re-parsing system feeds data with pre-collated documents to three Xerox 180 ppm production printers. Substantial reduction in labor, cost and time involved to manually collate policy documents. Presently, Mercury is realizing a savings in labor costs, 75% shorter turn-around times and better integrity of data (logs and audit trails now provided). Network laser printers re-deployed throughout the office for desktop jobs (and on standby for emergency disaster recover, if necessary). Present printing system can now grow to handle a million or more documents per day.

American PrintWare HostServe Weaver Success Story
Mercury Insurance Group

Auto Insurance Documents-Mail Fulfillment Solutions

California-headquartered Mercury Insurance Group had its "hands" full just collating policy paperwork for mailing. 100,000-plus documents per day, four to six documents per policy, and a 3:00 P.M. Post Office deadline required four full-time people sorting, stacking, folding and stuffing.

Several million California drivers depend on Mercury Insurance's Brea, CA data center for the timely processing of their policyholder information. For Jerry Pham, Mercury's R&D/Applications Development Manager, that includes the timely processing of policy billing, proof of insurance, riders, declarations.

notices and other documents, and then seeing that those documents reach policyholders promptly by mail.

Mercury's nationwide operations rely on a sophisticated network of 12 interwoven HP3000's to process the paperwork and a technologically innovative software/server-based solution from print code conversion experts, American PrintWare of San Juan Capistrano, CA. A newly installed system now delegates and manages the critical and previously time-consuming and labor-intensive task of sorting and collating more than 100,000 pieces a day.

Twenty Network Laser printers, a full time crew on an eight-hour shift!

PCL-encoded data files were being sent to 20 Network printers. Before the American PrintWare *HostServe* solution, the printers produced unsorted, uncollated documents. To meet the 3 P.M. afternoon mailing deadlines, documents were printed all evening, from 11 P.M. until 5 A.M. Workers spent the day sorting, collating, folding and stuffing by hand. Every day Pham faced weary employees, endless maintenance on all those slower laser printers, upkeep, jams, all the usual things for a high-volume printing environment.

Pham searched for a way to replace the growing cluster of low-end laser printers with some high-performance, production Xerox PCL printers, and a way to automate the document-handling end of the job. Though the documents carried printer coding in the PC and network-friendly PCL codes, the codes were embedded in the mainframe document database. Re-writing all the policy document generation codes translated to a programming task Pham was hesitant to embark on-he just didn't have the resources, programming manpower, nor the wherewithal to dissect such an enormous database merely to alter a few lines of PCL print code so documents could come out woven into a printer-friendly, and policyholder friendly package.

Pham posed his situation to Xerox's analyst Guy Plouffe; together they sought a solution. Plouffe recommended three high-speed Xerox DP180 PCL printers to streamline the output situation, reduce printer maintenance and slash overhead costs. Automating the collation requirements, plus the folding and envelope stuffing. Can we break the code of the collation logiam?

Finding a vendor with the software package necessary to decompose PCL spool files, recompose them, so the parsed codes could be grouped for automated collating was the challenge. Jerry and Guy attended the Xplore conference. They encountered a few vendors who claimed to have a software conversion solution. It turned out, however, that the products were not fully developed and couldn't handle the HP3000 application-generated PCL data streams effectively. Nor could they deal with the variety of fonts, subdirectories and macros unique to the Mercury application.

Fortunately, on the last day of the convention, Plouffe visited American PrintWare's exhibit. APWI was well known and regarded in Xerox circles for converting Xerox mainframe code to PCL and PostScript applications. He was curious to learn if they had the expertise to decompose, and then recompose existing PCL data streams to accommodate the requirements at Mercury. Nevertheless, he asked APWI's Art Wilkes about the situation at Mercury. Wilkes, who's spent a lifetime writing, analyzing and converting printer code, recommended "weaving" certain data strings together with APWI's *HostServe*, a server-based product designed specifically to organized data stream output to printers.

Virtually 45 years of printer code development experience at APWI.

PCL data files streaming off the HP 3000 were directed to an APWI **HostSserve** s *Weaver*, a Windows Server for decomposing and reassembly and then sent out to the network laser printers. One of Mercury's criteria asked that the PCL re-parsing be developed using Mercury's existing installed network printers. If the application could run on the laser printers, he would then consider transporting it to a new cluster of high-volume Xerox printers. Reasonable enough, responded APWI; once the solution rearranged and

could be sent in sequence.

During the configuration and installation of HostServe, APWI discovered some inherent problems inside and specific to Mercury's database that weren't counted upon. Rather than have the problems stall the successful implementation, APWI took a look at database code and unraveled the snags as they were encountered. An impressed Pham claims that database-related activity was above and beyond the call of duty, yet indispensable and exceedingly valuable to the overall efficiency of Mercury's data center mail fulfillment obligations. Mainly, to eliminate hand collating of policy documents. Of secondary concern was to engineer the software to also instruct folding and envelope stuffing equipment to mate documents with pre-addressed or prepared-to-be-addressed envelopes.

APWI eliminates the hand-to-hand collation!

My initial concerns," says Jerry Pham, "were to address an increasingly frustrating mail-fulfillment requirement. "American PrintWare had *HostServe* installed and running so that documents were being printing in sequence and collated correctly."

Pham says moving the application from the laser printer to three high-speed 180-ppm Xerox printers made perfect sense." Just in terms of supplies cost and reliability. More importantly, the new Xerox printers have the capacity to increase our volume to up to a million documents a day at minimal additional expense."

"HostServe's Weaver is really an excellent software for Mercury." Pham explains. "It enabled us to circumvent the needs of having our programming team re-engineer the form creation software on the midranger servers. When all the features of the programming are done to HostServe, we can move ahead with realizing the savings on all of our hardware and software investments. HostServe is one of three pieces to the overall puzzle to help us automate the mail fulfillment business. For Mercury, it was the most important piece and, basically, drives the decision for implementing the other pieces. Technologically, HostServe incorporates some very advanced and useful features (collating based on index info, file matching, viewing and reprinting, and audit trail logging)."

American APWI saves the day.

What about those 20 Network laser printers? "They've lots of life left in them," says Pham, "and this is a big, growing operation. We've been able to distribute them to desktops where they provide even more efficiency to our operations. Under normal volume situations at the desktop and networked level, those printers have plenty of miles left on them. Plus, our staff is more productive because of it. People are more motivated when the resources are close by. Not only that, these printers are there in the event of disaster recovery or emergency backup."

Pham says the application is now entering the next phase-bar coding documents so that automated folding and envelope-stuffing equipment can be employed. That will eliminate more time, labor and expense in the mail fulfillment process. "Rather than bar coding information on all documents, it may be more cost-effective to develop a policy-related cover sheet with the bar code instructions for the equipment."

Guy Plouffe gives American PrintWare high marks. Not only in data conversion expertise, but true business acumen on the nature of partnerships. Though they could have easily said, "here, we've solved our end of the problem, APWI emphasized the benefits of greater productivity and efficiencies that would be obtained by quickly implementing the Xerox printers to complete the solution package. "Sometimes, with certain vendors, it doesn't always work that way," Plouffe notes.