

ARI Starts Major Migration from GCOS to Windows 2000 Datacenter

Automotive Resources International (ARI) of Mt. Laurel, New Jersey, a long-standing GCOS mainframe user, has embarked on a major migration of its remaining GCOS COBOL applications to a Windows 2000 Datacenter based environment.

Over the last few years, ARI has been gradually re-engineering their applications to a Windows NT/ORACLE environment. The forecast to complete this effort was many years, and ARI felt they needed to accelerate the pace of moving to this new environment in order to remain competitive.

At the beginning of the year, the Management Information Systems team completed two successful pilots of not only, moving existing GCOS applications to Windows NT, but also bridging them back to the remaining integrated applications still running on the GCOS mainframe. This was achieved through use of the EYESYS product that allowed the migrated COBOL application to simultaneously access data from files on the NT server and the GCOS mainframe. This mechanism has allowed ARI to effectively perform an incremental migration, and gradually move their programs and applications across to Windows NT a piece at a time.

By the beginning of September, ARI had successfully migrated over 300 programs and associated entities into production on Windows NT, which is about 20% of the total to be migrated.

The migration itself is being achieved using the GDT-TS migration toolset with MicroFocus Net Express COBOL. The target server platform is a Unisys ES 7000 server running Windows 2000 Datacenter. Load testing of ARI's batch environment has produced very impressive results. A batch job that currently takes 5 hours to run on the GCOS mainframe, ran in just 26 minutes on a Quad-Processor Unisys ES 5000 Windows 2000 server. Even more impressive was 6 instances of this batch job running together completed in just 62 minutes. That is only 20% of the run-time for a single instance on the Bull GCOS mainframe.

The re-engineering effort continues in parallel with the migration. This is being primarily conducted in Visual Basic/Active Server Pages against an ORACLE database.

Both the migrated COBOL and re-engineered ORACLE applications will run on the new ES 7000 server. ARI plans to migrate a total of 22 GCOS-based applications, while re-engineering 7 other GCOS applications by the end of 2002.

KEY SPECIFICS

- The second largest DPS 7000 customer in North America. Over 1,500 programs and 2 million lines of code.
- Batch jobs running over 10 times faster in new environment, despite having one of the most powerful DPS 7000 systems in North America.
- Using GDT-TS7 Thin Client with embedded emulator in web browser.
- Using GDT FILECNV2 to enable reverse file conversion and faster file conversion to enable incremental migration and some bridging.
- First two applications went live after 4 months. Have been running in production for over two years with daily file refreshes.
- Client performing much of the migration using their own staff. Recently decided to speed up parts of the migration by using InfoSol to perform all source and data migration tasks.
- Using SKEmatrix for automated job scheduling and operations.
- Using Sysload for server / application load and performance monitoring.
- Using GDT Load Tester for on-line stress testing.
- Migration due for completion in May 2004.
- Very complex operational environment in terms of printing, backups, remote communications. All issues addressed in project plan.
- Over 300 on-line users and 8 to 12 batch streams expected in final production environment.