

“Natixis is a banking leader with a worldwide presence. Natixis is a key player in the banking sector in France and Europe, offering services centered around five core businesses: corporate and investment banking, asset management, private equity and private banking, services and receivables management. Natixis also consolidates a proportion of the earnings of the retail banking activities of the Caisse d’Epargne Group and the Banque Populaire Group.”

THE ENVIRONMENT:

z/OS server (700MSU) with approx. 1.5 TB of DB2 and IMS production databases.

THE CHALLENGE:

To Monitor the utilisation of DASD space and the growth of the database to anticipate problems before they occur.

THE PROBLEM:

Using a VSAM reporting package, plus some in-house developed routines (REXX, DCOLLECT and TSO Clists), but these are inadequate, unreliable and costly to maintain.

THE SOLUTION:



FDREPORT

“If the production DB2 and IMS databases on our z/OS server are inaccessible, even for a short period of time, this can have a huge financial consequence. We must maintain a high level of service continuity at all times...”

Jean-Luc GANEM

DBA Project Manager, Natixis

Part of the Banque Populaire Group and Caisse d’Epargne Group, Natixis is currently running a 700 MSU z/OS server, hosted at the Natixis Altaïr data centre near Paris.

A large percentage of the production data is contained in databases under DB2 (1.5 TB) and IMS (.3 TB).

“We have about 40,000 DB2 files and 3,000 IMS files that we need to monitor. These databases are absolutely essential to our everyday business. If they are inaccessible, even for a short period of time, this has huge financial consequences.”

To ensure this service continuity, Natixis needs to constantly monitor the utilisation of DASD space allocated to its production databases.

“Our aim is to avoid any interruption to service by pre-empting problems and avoiding incidents that could cause disruption to the production services.”

So, as well as tracking the growth of its DB2 and IMS databases, Natixis also requires a solution that can monitor day-to-day activity, identify and anticipate problems, and then raise an alarm if certain conditions are reached.

“Unfortunately, neither of the solutions currently being used was providing us with the level of information that we required to carry out this essential monitoring and control...”

To carry out this essential monitoring, Natixis was using a combination of a VSAM reporting package, together with some in-house developed routines using REXX, DCOLLECT and TSO/CLISTS.

Unfortunately, neither of these solutions was providing Natixis with the level of information that it required to effectively monitor the growth and utilisation of its high-profile databases.

“The VSAM reporting package had not kept pace with our upgrades to MVS over the years, through OS/390 and then z/OS. It was also fairly limited in the type of VSAM-specific information that it could report on. It also offered us nothing for IMS reporting.”

The home-grown routines were also causing a problem—often requiring changes each time a new level of z/OS was installed.

“What we needed was a single solution. We wanted something that would expand our reporting capabilities, and at the same time remove the need for us to keep pace with changes to z/OS. That’s why we looked at FDREPORT...”

"The initial requirement for FDREPORT was identified by the DBA team...but other teams within the z/OS group are also now using it to satisfy their reporting needs."

FDREPORT was already in use at two other banks within the Banque Populaire Group.

"The product came with a good reputation. It is used in over 1000 sites worldwide, and the vendor has a 30-year history of supplying high-quality storage management products..."

Before looking at the reporting capabilities within FDREPORT, Natixis had some initial criteria that needed to be met:

- The product had to be easy to install, **easy-to-use**, and require minimal training.
- It had to run **efficiently**, with minimal utilisation of z/OS resources (CPU, EXCPs).
- It had to offer scope for **automation**.
- It would require minimum **support or maintenance** on the part of Natixis.

"We took advantage of Innovation's offer of a free, no-obligation trial. This allowed us to very quickly confirm that FDREPORT met our initial criteria..."

Aside from the product itself, Natixis was also impressed by the technical support that they received from Innovation during the trial.

After several weeks spent exploring FDREPORT's wide range of reporting criteria, it was clear that it was exactly what Natixis had been searching for.

Several high-profile problems had occurred with the production DB2 system before the FDREPORT trial:

- A production DB2 storage group ran out of space, preventing inserts for more than 1hr 30mins.
- Problems had been encountered with some DB2 backups, which were "known" to DB2, but which had become uncataloged to MVS.

"Both of these problems would have been avoided with FDREPORT."

Natixis has now implemented an extensive strategy of pro-active reporting (see side bar) which allows potential problems to be detected *before* they occur.

"It's great. Now we can do all our reporting and monitoring with a single solution. FDREPORT can report on all z/OS file types, and it also generates information for us at the application-level, as well as volumes and storage groups..."

Although the initial requirement for FDREPORT had been identified by Natixis' DBA team, other teams within the z/OS group are now starting to use it for their own reporting needs.

FDREPORT can report on data extracted from a wide range of sources, including:

- VTOC/VTOCIX
- Catalogs
- VVDS
- DFSMS
- DFHSM's MCDS/BCDS
- ABR Control Files

Natixis has used FDREPORT to implement a strategy of pro-active reporting, which allows potential problems to be detected before they occur.

Here is a selection of the reporting criteria being used.

All file types:

- Size
- No. of extents
- No. of volumes
- No. of index levels
- Blocksize
- Catalog status
- Last reference date
- Allocated/used space

VSAM:

- CI/CA sizes
- No. of splits
- No. of inserts, deletes etc.

Disk space usage by:

- Storage Group
- Application (via HLQ)
- File type
- DFSMS control files

TOP 10 Proactive Reporting:

- 10 largest VSAM files
- 10 most over-allocated
- 10 largest non-VSAM files
- 10 largest applications
- 10 fullest Volumes
- 10 most fragmented volumes

Other proactive Reporting:

- VTOC/VTOCIX status
- Catalog errors
- Uncataloged files
- Files ineligible for SMS

For More Information

Take advantage of a **FREE TRIAL** to see if FDREPORT can solve your Storage Management reporting problems.

If you'd like more information on FDREPORT, ask for a **FREE** copy of the **Concepts & Facilities Guide**, or visit our website <http://www.innovationdp.fdr.com>

