

SUCCESS



COMPAREX Story

Customer

DEXIA

Subject

Storage Consolidation,
Storage Networking

07/01

The Dexia Group, headquartered in Brussels is one of Euroland's top banking groups. Dexia continues a long history of customer service since the Crédit Communal de Belgique (Dexia Bank Belgium) was founded in 1860. The 1996 merger with the Crédit Local de France created a truly European organisation. Today, Dexia operates not only across Europe but also in the US and is listed on the Paris, Brussels and Luxembourg stock exchanges. Dexia's strategic lines of business are public and project finance, retail financial services and investment management services. Dexia is world leader in public finance with a net income in the year 2000 in excess of €1000 m.

"A fast-growing company such as Dexia needs to harness the power of its information base and leverage the data to guarantee continued growth," Guy Gillis, IT Storage Manager at Dexia Bank.

As a fast-growth company, Dexia Bank needs to exploit its IT infrastructure to serve the requirements of its business processes. Demands on its IT systems are simple: high-

BANKING ON PARTNERSHIP: STORAGE CONSOLIDATION AND NETWORKING AT DEXIA BANK BELGIUM

performance, round-the-clock availability and the flexibility to deploy new applications and services rapidly. Easier said than done!

The first Decision:

Intensive Storage Consolidation

A prime initial objective Dexia Bank defined was to consolidate its storage assets to simplify and improve administration whilst benefitting from the by-product of reduced costs. A tender was issued and COMPAREX selected as the preferred partner. Dexia Bank and COMPAREX had already cooperated closely in the mainframe area and the expectation that COMPAREX, as a leading European systems integrator and specialist in storage networking, would add value to the project was justified.

Consolidation of the Open Systems storage environment was allocated highest priority as this was perceived as the most promising area. An analysis revealed that the installed Symmetrix® base, already in use for Open Systems storage, provided sufficient free or reconfigurable capacity to accommodate 60 NT servers. "We, Dexia Bank and COMPAREX,

reorganised the storage on our big central Symmetrix systems to accommodate our Open Systems servers. We did it, but my advice to anyone addressing this issue would be – if you can, start at zero, that is, use a storage system with a controller that is not in a real production environment yet!", Guy Gillis, IT Storage Manager at Dexia.

The second Decision:

Storage Networking

Modern storage subsystems, such as Symmetrix, provide for connectivity undreamt of a mere decade ago. They concurrently support a multitude of operating systems but still have their limitations and attaching 60 servers via SCSI cabling is a daunting task. Recent advances in technology enable the implementation of an "any-to-any" topology, whereby any server so authorised can address any storage device via fibre channel to create an independent storage area network (SAN). This was implemented with NT, Novell and AIX servers sharing the same storage device via a switched fabric with Connectrix directors at the heart of the fabric. Obviously a number of issues arose when



migrating from SCSI to Fibre Channel in a normal production environment, not the least of which was the migration of the Novell file servers attached to the Symmetrix system. Guy Gillis on this, "Moving from one technology to another is always a challenge, but we managed it successfully and surprisingly smoothly, thanks to the COMPAREX engineers." A proof of concept methodology ensured successful implementation – this combined with the fact that COMPAREX maintains its own lab for test and certification purposes. Only the Storage-Tek silos attach via SCSI-FC bridges, all other devices in the SAN have been integrated using native fibre channel. Experience with the SAN and the Connectrix switches has been extremely positive. The switches are robust, performance is good and overhead is negligible.

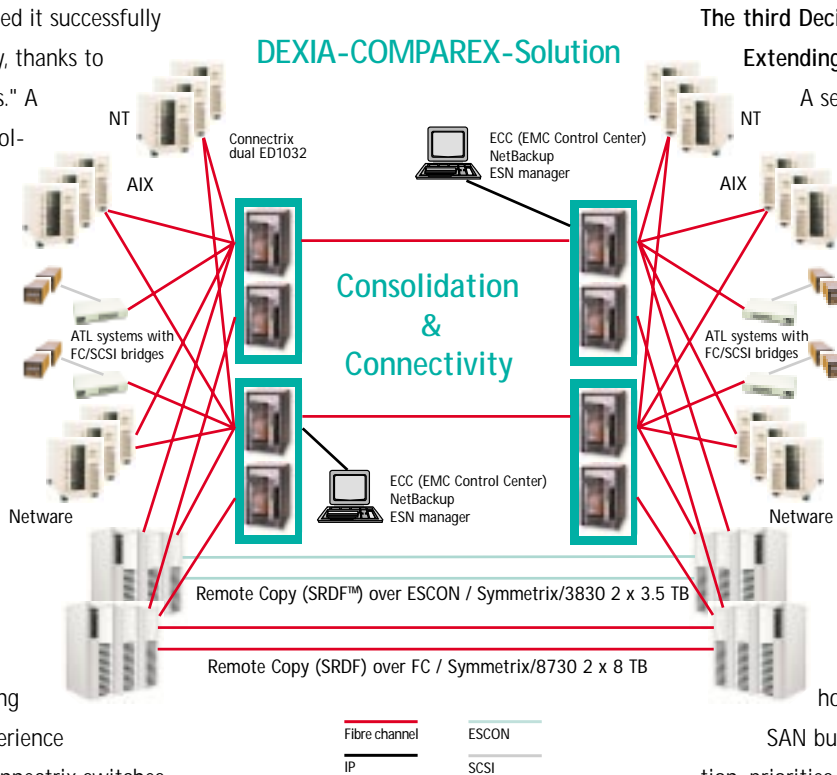
Protecting the base of the business:

Critical Data

As with all large enterprises, backup/recovery on the mainframe side has not been an issue for a number of years and the SAN implementation has also provided Dexia with a major factor towards providing enhanced protection for critical business data – SANs can be mirrored. Thus, unplanned outages can be resolved in a timely fashion. Disciplines developed in the mainframe area are applied to Open Systems

with data backed up fully on a weekly basis and incrementally on a daily basis. The Symmetrix subsystems also provide for enhanced protection of data via remote mirroring which can be achieved either via

production volumes can be made quickly at any time without impacting the application (e.g. Split Mirror for SAP R/3) for purposes such as backup, testing etc, thus providing a cure for the "backup window" headache.



direct ESCON or fibre channel links (both in production at Dexia) or, as Dexia intends, between systems across the Storage Network.

The Next Steps

Mainframe data growth is estimated at 25–30 % and Open Systems at 70–80 %. Normal growth rates in modern computing environments. Backups, however, can cripple a LAN. The new SAN topology will enable Dexia to transfer backup data from disk to tape across the SAN with no negative impact on the LAN. Also, using Symmetrix TimeFinder™ functionality, online copies of

The third Decision:

Extending the SAN

A second success has been decided in favour of COMPAREX with connectivity (128 ports) and storage extensions (16TB). Regular discussions are held at Dexia between IT services and the "owners" of the NT, AIX and Novell servers to define their needs. An intention in 2001 is to integrate SAP and data warehousing applications into the SAN but, as in any dynamic organisation, priorities change and further AIX applications will also be migrated. "A lesson we learnt is that planning disk capacity growth is not sufficient. Business processes are not static but grow, change, accelerate, etc.. So we also need to plan for connectivity and achieve a balance between the two." advises Guy Gillis, "Furthermore, as technologies advance. It is imperative that the skills and services of an experienced systems integrator like COMPAREX be exploited. An added value is that COMPAREX can provide both the hardware and the know-how making for a single point of contact and a good working relationship."

Symmetrix® is a registered trademark, TimeFinder™ and SRDF™ are trademarks of EMC Corporation.

CXAE/7004/07/01

