

VIFX Tiered Storage Design and Architecture

Today's Storage Challenges

- With today's unprecedented growth in data storage requirements and application demands, one of the most pressing issues facing organizations today is the need to reduce storage costs.
- Single vendor management tools making it difficult to share resources, improve operational efficiency and migrate online data.

Did you know?

- By implementing a virtualized tiered storage architecture, an IT organization can dramatically improve storage capacities and lower capital and operational expenses.



Service Description

Utilizing proprietary techniques and methodologies for data classification VIFX Consulting designs and builds out a fully developed and functional Tiered Storage Architecture that provides the right cost, performance, reliability and availability characteristics according to application requirements (table 1.). This empowers organizations to drive cost out of the infrastructure and align data with the right level of storage. In a tiered storage environment, VIFX helps IT organizations establish policies where only critical, frequently accessed data is stored on tier one, high-end enterprise-class storage. Older less frequently accessed data can be hosted on tier two storage, offering performance and availability slightly below tier one at a much lower cost. And archival data, the bulk of all storage, can be stored on cost-efficient midrange systems using SATA disk, offering online access but with lesser performance.

- Provide a framework for data lifecycle management
- Quickly assess organizational needs for access, retention and protection of data
- Evaluate patterns of access across the data's lifecycle
- Define common storage and applications management environment services
- Establish an optimized, cost-effective and long term reference architecture to meet the needs of your business

Outcomes and Benefits

VIFX Consulting professionals analyze and build your tiered storage strategy. Using our proprietary tools and methodology, Tiered storage can be scaled out using hardware appropriate to the tier. This dramatically simplifies storage provisioning and management and helps organizations achieve:

- Management simplicity through the use of common storage services throughout an entire heterogeneous storage infrastructure
- A radically more efficient IT environment that goes beyond consolidation into dynamically allocated tiered storage
- Improved utilization of existing physical assets

Table 1: Data Tiers

Mission Critical Data

- Most valuable to an enterprise, high access
- High performance, high availability, near zero downtime, highest cost

Business Critical Data

- Important to the enterprise, average cost
- Reasonable performance, good availability, less than eight hour recovery

Accessible Online Data

- Cost sensitive, low access, large volumes
- Online performance, high availability, less than eight hour recovery

Nearline Data

- Cost sensitive, low access, large volumes
- Less than one hour access time, automated retrieval

Offline Data

- Archived data, backup or compliance related
- Very cost sensitive, limited access, ~72-hour seek time

VIFX Professional Services

VIFX professional services combine exceptional strategic guidance together with unparalleled technology expertise to provide organizations the necessary ability to address business information and technological challenges and derive the greatest level of value from existing and/or newly purchased information assets and investments. Our entire organization is fully committed and dedicated to exceeding customer expectations, one project at a time, on every single engagement.