STORAGETEK

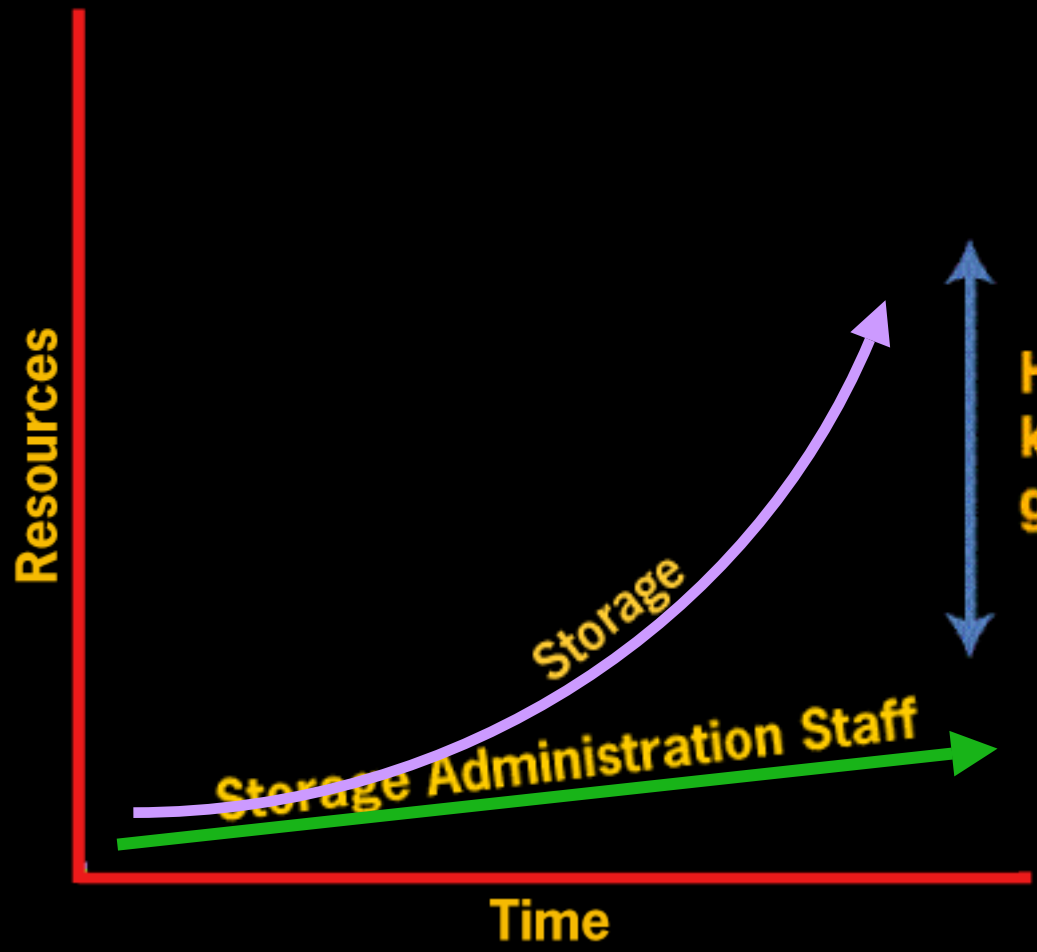
INFORMATION *made* POWERFUL

Backup/Restore Consolidation

Issues and Solutions

What are the issues driving our customers towards backup/restore consolidation?

Storage Growth & Too Few People



IDC reports that the storage growth rate is 80-150% a year!

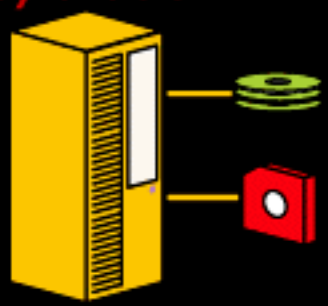
How do my people keep up with this growth rate?

Today's Datacenter Environment

The Solution Has Become the Problem

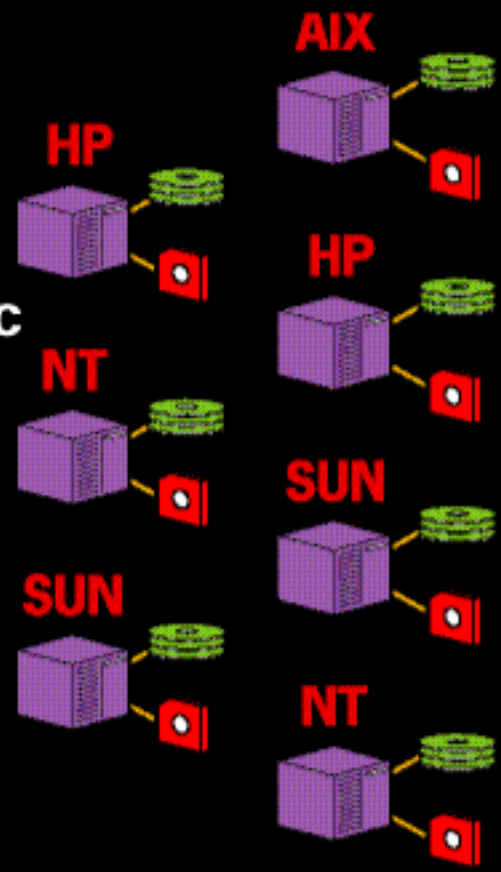
Mainframe

- Optimized for The Enterprise
- Manageable
- Automated
- Mature
- Single OS
- Reliable



Open Systems

- Designed as a point solution
- Application specific
- Business critical
- Exploding growth
- Unmanageable
- Expensive
- People intensive



Business Continuance Issues in Growing Open Systems Environments

Data Safety
- Is your important data safe?

Availability
- Is your data accessible by the right people at the right time?

Timeless Process
- Do you change your processes for equipment or business demands?

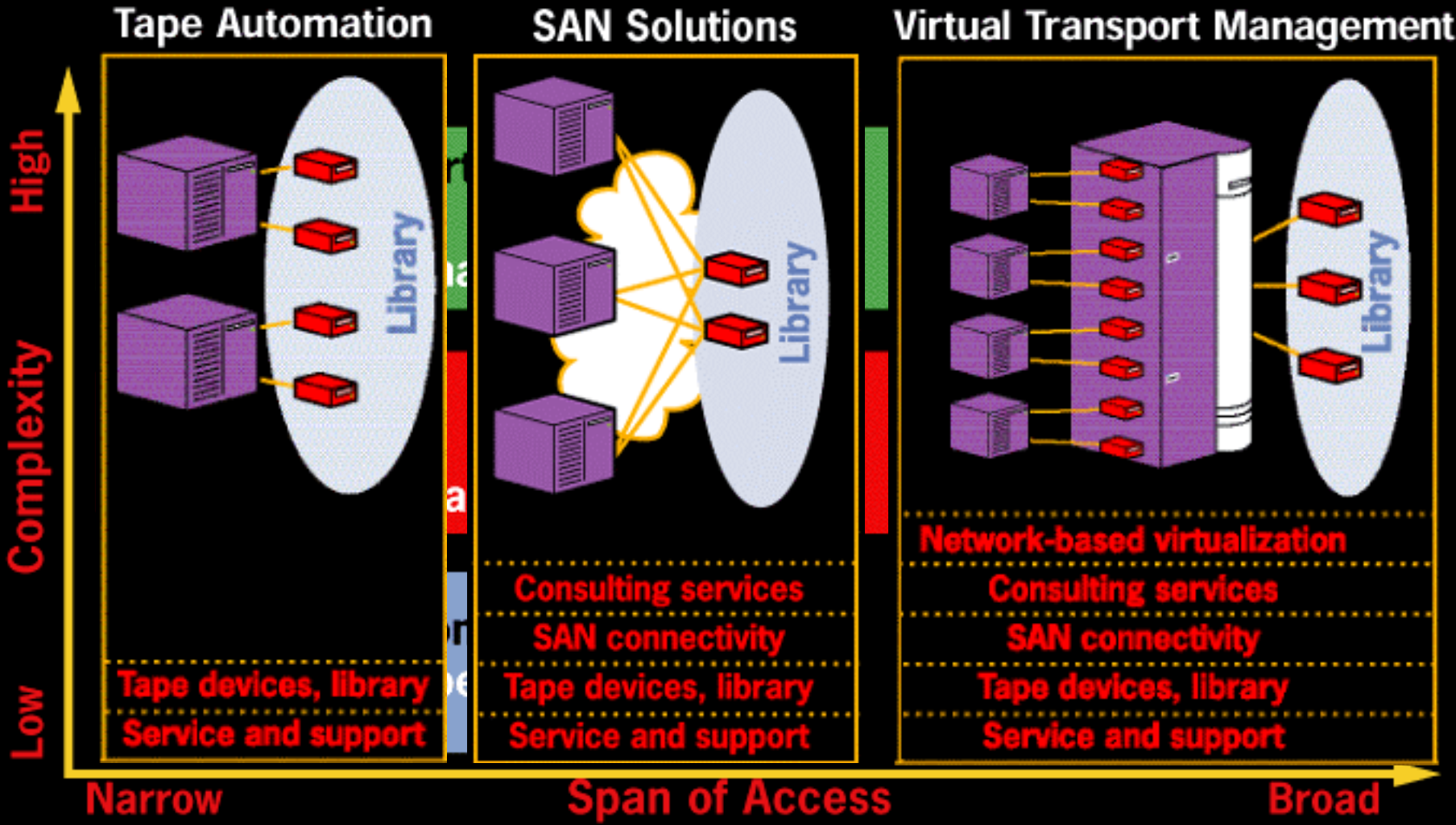
Responsiveness
- Can you react to growth and changing business requirements?

Performance
- Are you fully utilizing your environment?

Costs
- Is your data (and TCO) growing faster than your budget?

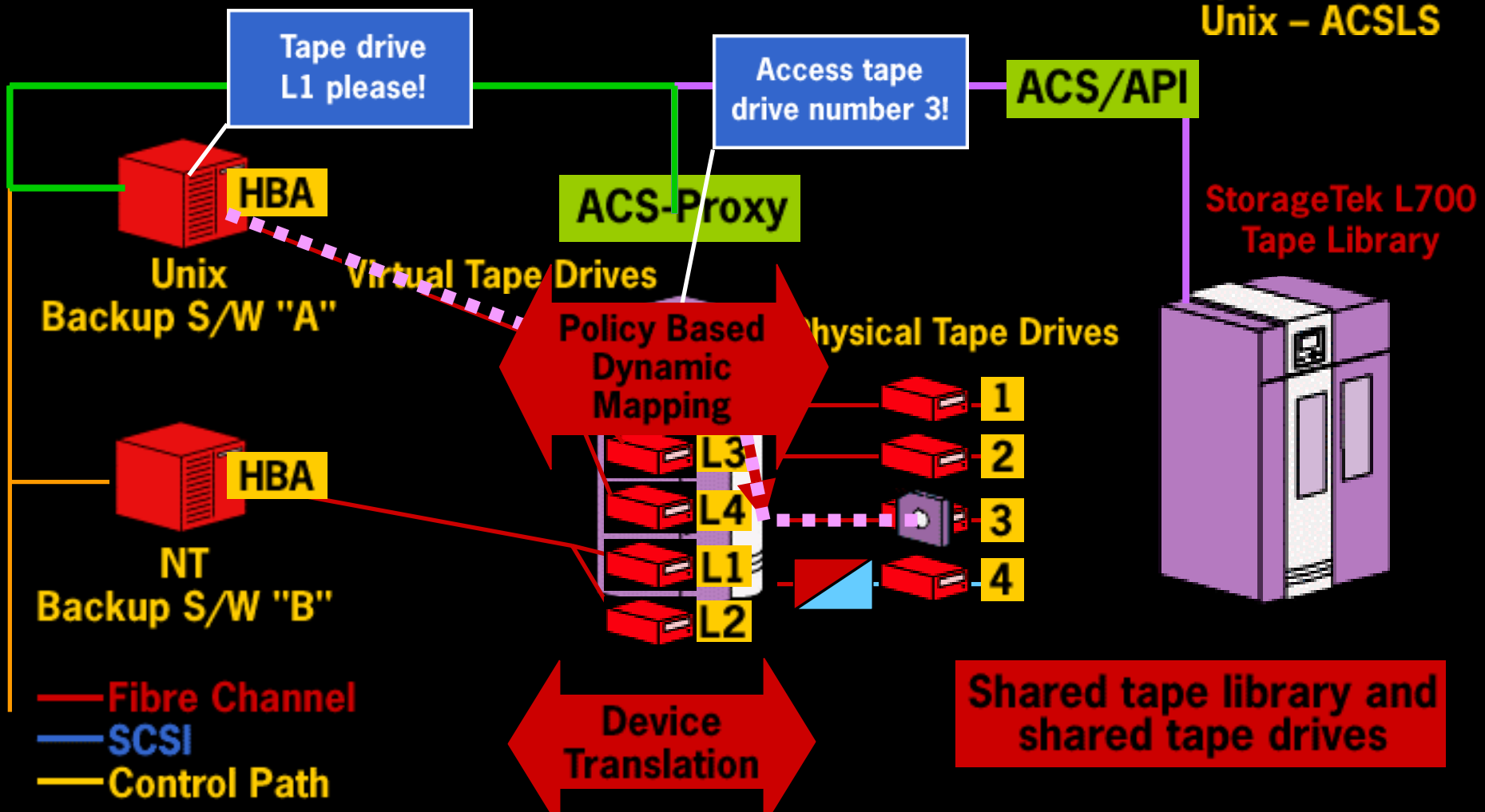
StorageTek Backup Consolidation Solutions

The right solution for varying requirements



SN6000 Backup Consolidation

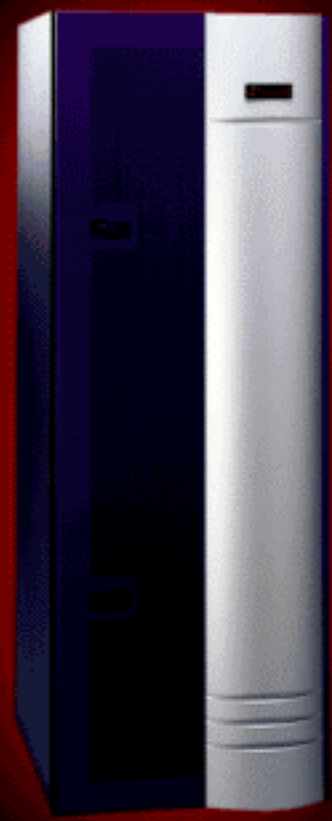
How It Works



SN6000 Product Details

Basic Chassis/Platform

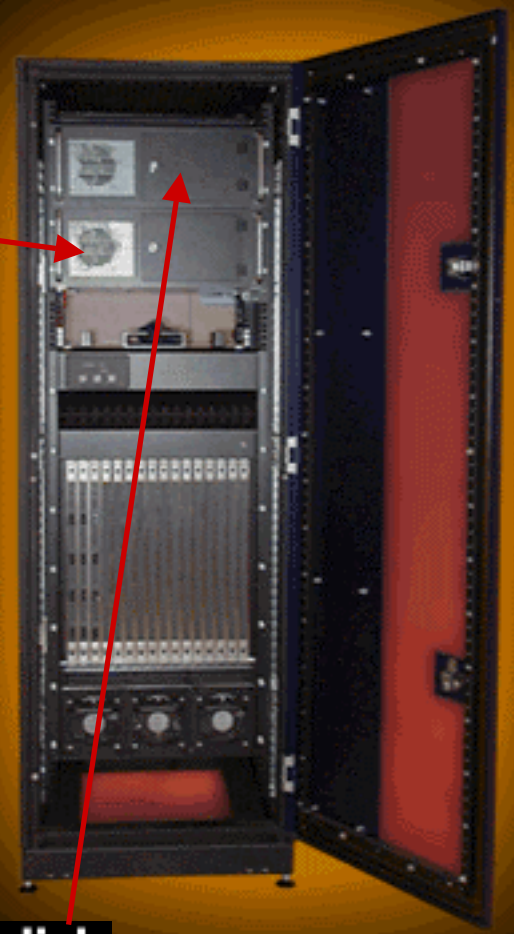
- 19" Rack Mount Cabinet
- Supports up to 16 interface boards, three power supplies, two fabric modules,and two management processors
- Includes fully integrated cable management system



SN6000 Product Details

Basic Chassis/Platform

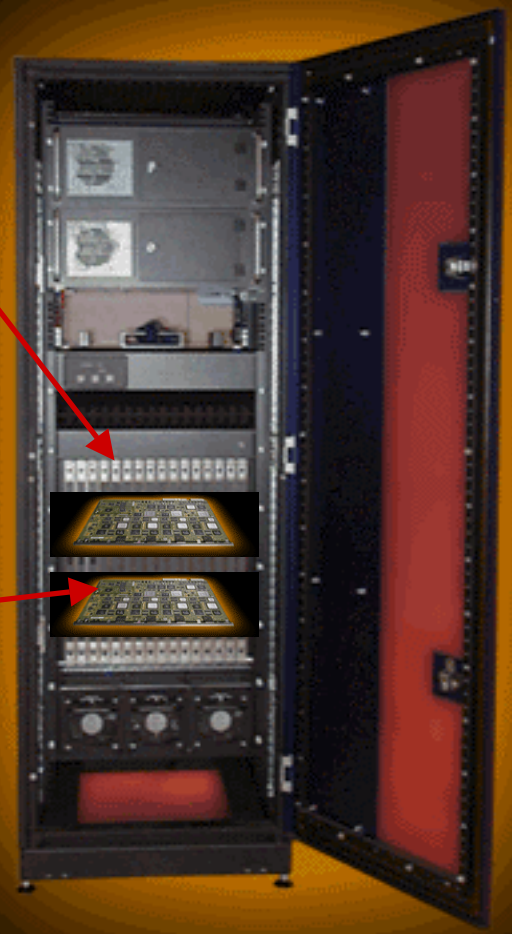
- 19" Rack Mount Cabinet
- Management Processor (1)
  - UNIX-based server providing control path services
    - Disk storage for Hw/Sw code loads
    - Configuration data, log information documentation
      - Supports features, such as:
        - Logical/physical device arbitration
        - ACS/API proxy
        - Future 3rd party software
      - Web-based GUI management tool
      - Phone home support via ServiceTek+
      - Optional redundant MP with mirrored disk



SN6000 Product Details

Basic Chassis/Platform

- 19" Rack Mount Cabinet
- Management Processor (1)
- Fabric Module + Chassis Support Board (1)
  - Crosspoint technology for any-to-any data path
  - Monitors physical and electrical aspects
  - Provides device mapping logic
  - Optional redundant Fabric Module/ Support Board –hot swappable



SN6000 Product Details

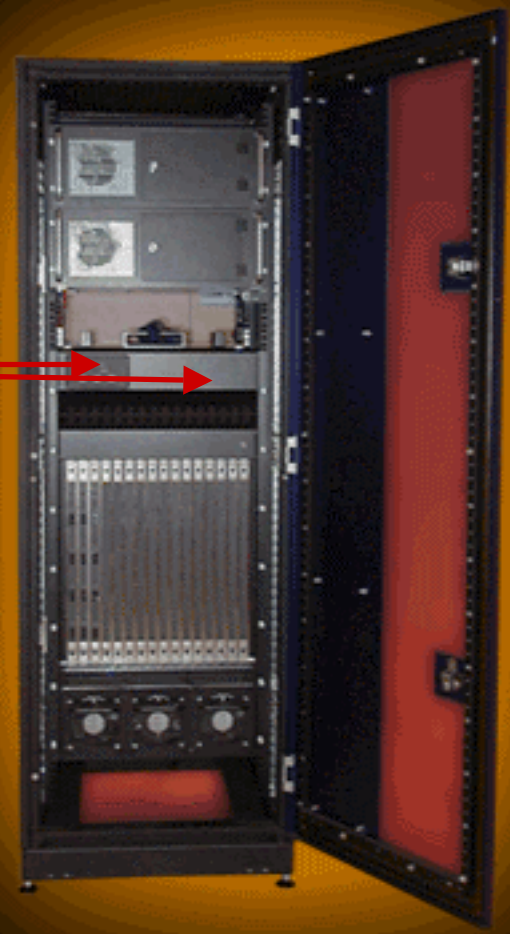
Basic Chassis/Platform

- 19" Rack Mount Cabinet
- Management Processor (1)
- Fabric Module + Chassis Support Board (1)
- Power Supplies (2)
  - Distributed power, current sharing
  - Optional redundant Power Supply is available
    - 2+1 sparing
    - Hot swappable

SN6000 Product Details

Basic Chassis/Platform

- 19" Rack Mount Cabinet
- Management Processor (1)
- Fabric Module + Chassis Support Board (1)
- Power Supplies (2)
- Cooling Fans (2)
  - Hot swappable

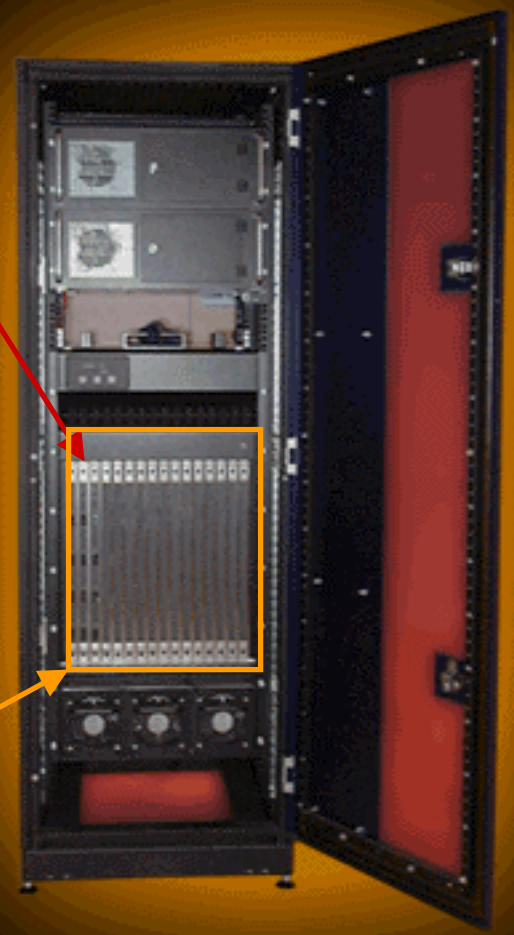


SN6000 Product Details

Fibre Channel Interface Boards

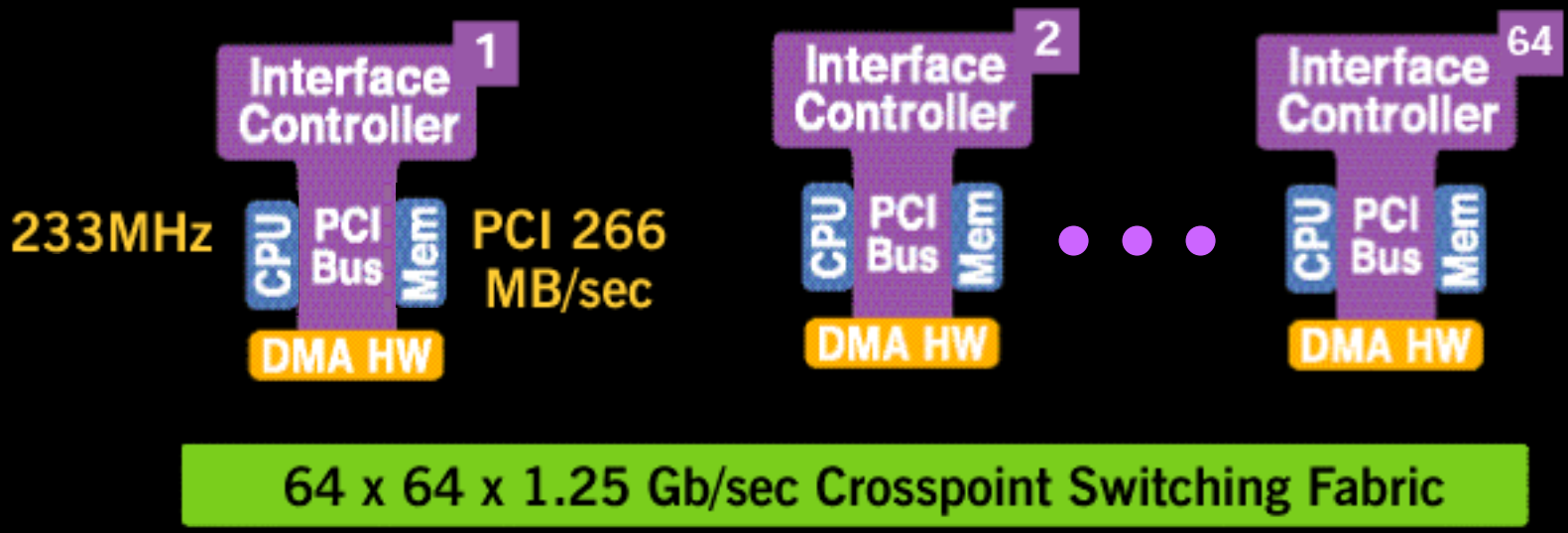
- 4-port FC interface boards supporting the following capabilities:
  - Connectivity to multimode or singlemode environments
  - NL_Port support (loop topologies)
  - Full speed FC operation (1.0625 Gb/s)
  - Built-in optical interfaces (no GBICs required)
  - SC connectors

Up to 16 interface boards (64 ports) can be configured into each SN6000



SN6000 Scalability

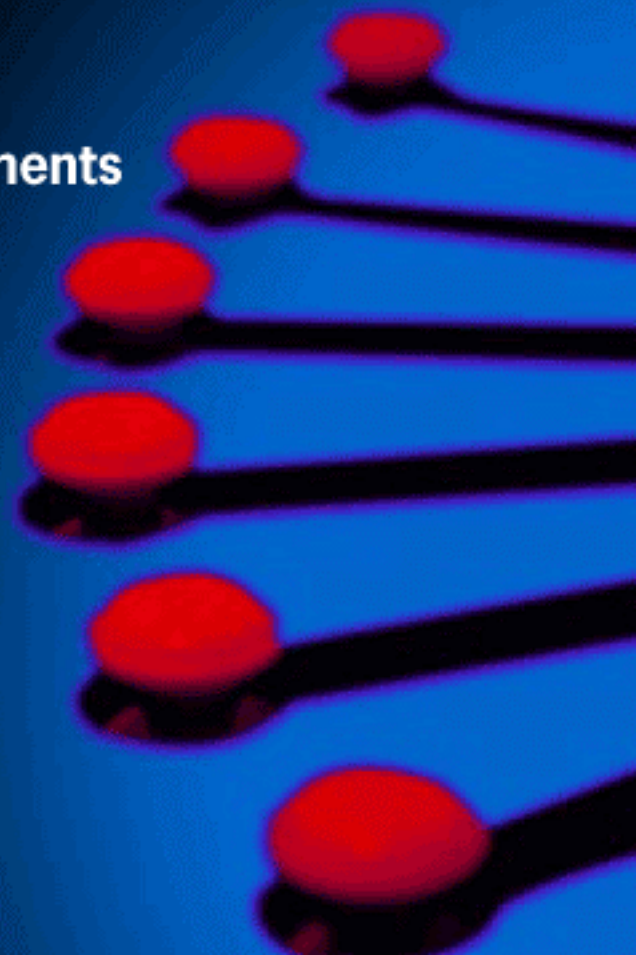
High capacity datapath architecture



SN6000 Product Details

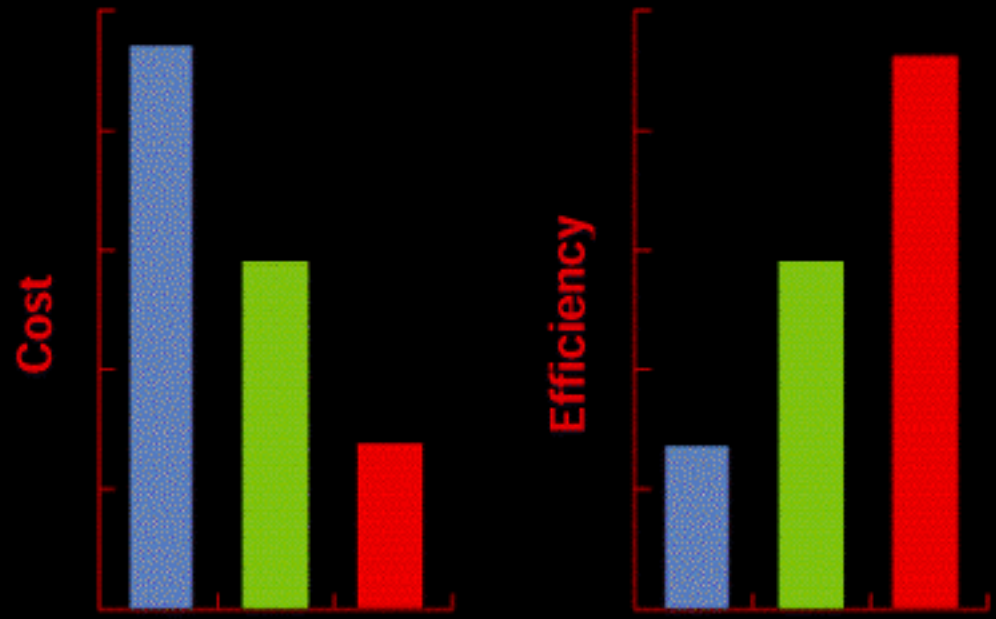
System Software

- Virtual Transport Manager
  - Provides virtual technology to share tape devices across Unix and NT environments
  - Software bundle includes:
    - ACS/LS proxy
    - Dynamic tape transport mapping
    - Virtual/physical arbitration software
    - Emulation of DLT and 9840 drives
    - Initiator support for DLT, 9840, TimberLine, and other ACS-managed tape transports
    - Device pool management

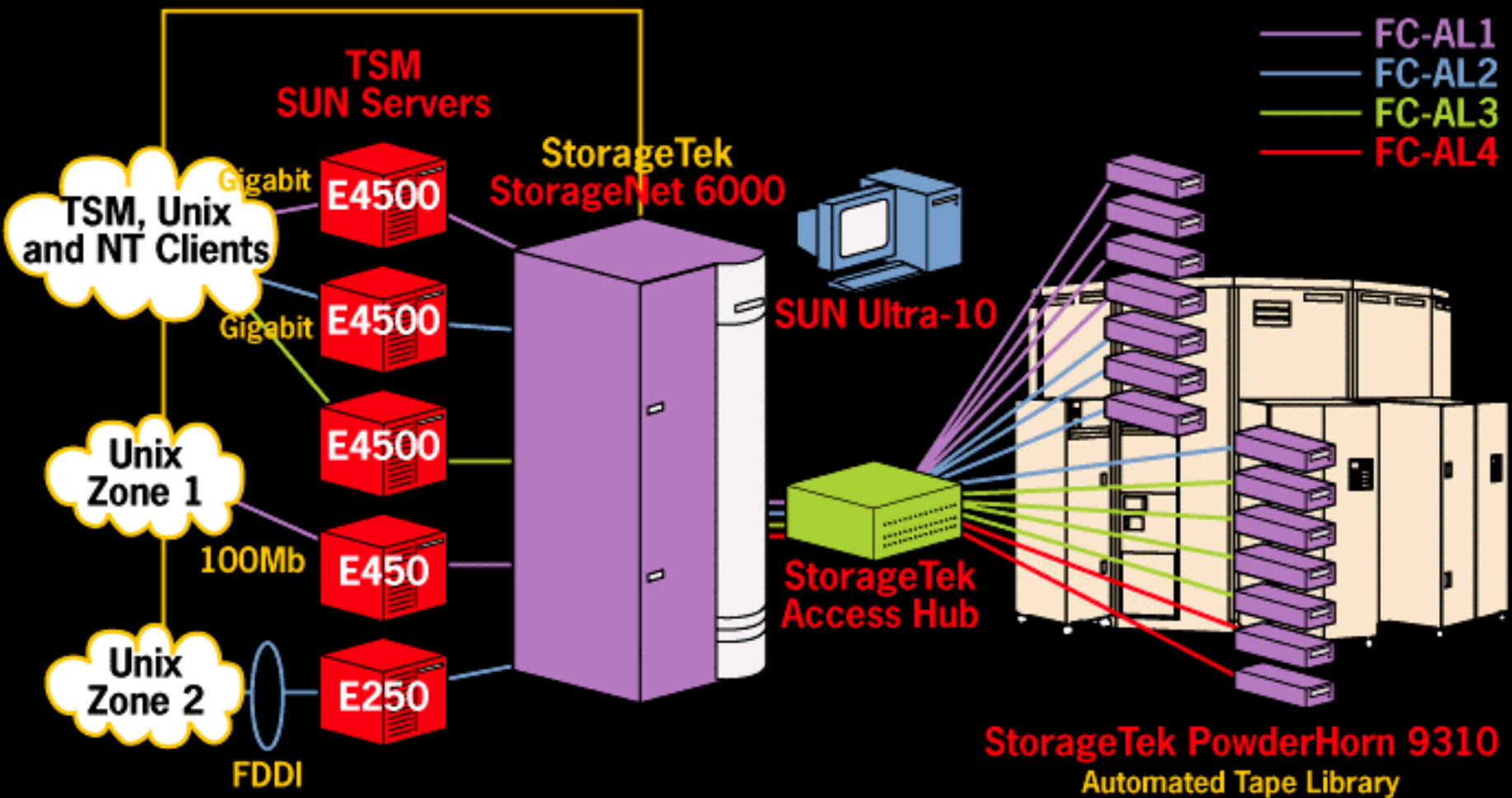


Backup Consolidation Total Cost of Ownership

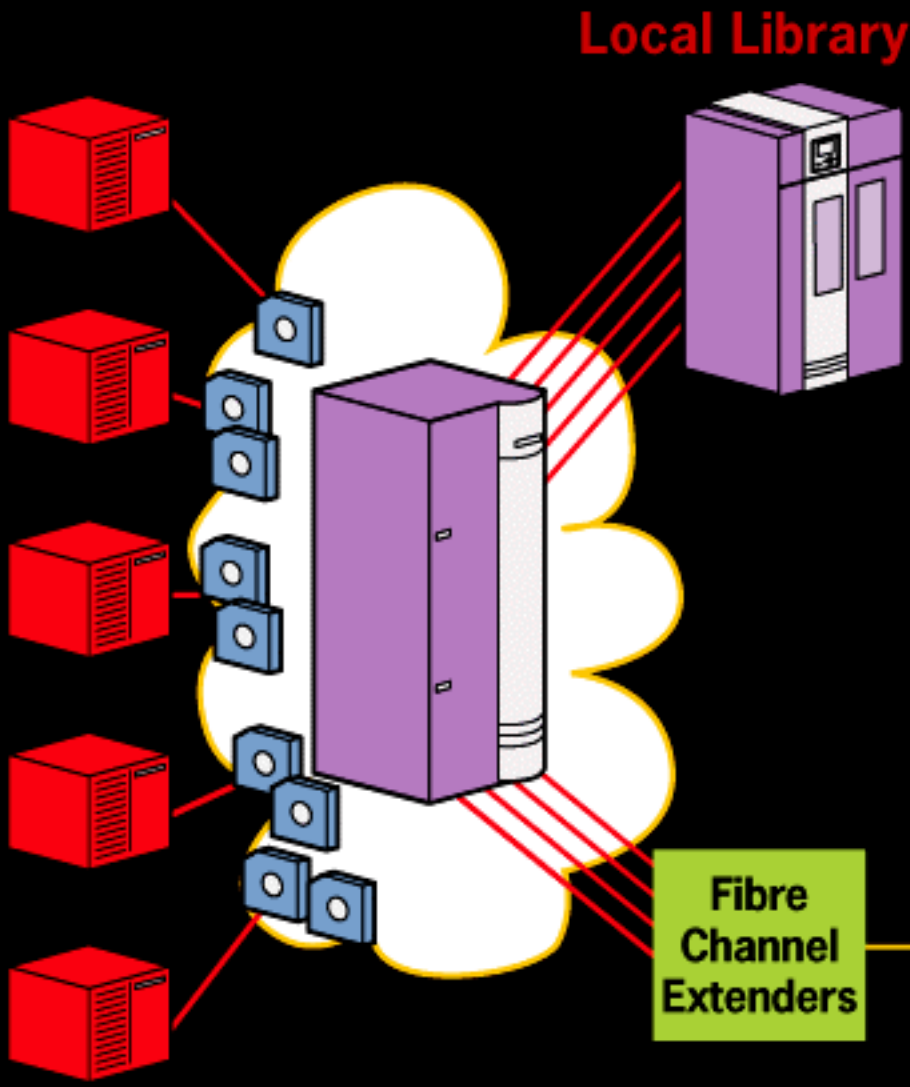
SN6000 *reduces costs and increases efficiency*



Customer Implementation Example



SN6000 Disaster Recovery Solutions



- **Single Library**
  - Duplicate/Copy backup data
  - Eject tapes for off-site storage
- **Remote Library**
  - Duplicate/Copy to remote library
  - Various extension options
- **Dual hot sites**
  - SN6000 at each site

StorageTek has the experience

StorageTek Virtualized Tape Solutions

Reducing the cost and complexity of managing your data

Illuminata

"StorageTek...has come forward with a particularly interesting, differentiated, and industrial-strength take on virtualizing that critical backup and archival resource, tape storage."