Connectrix Mainframe Offering

Storage Networking and Professional Services for Mainframe environments

Modernize the FICON Network when you Modernize your Mainframe Storage

VMAX All Flash storage systems provide mainframe applications with fast and reliable access to data across the application environment. Today your storage network can run your business-critical mainframe FICON® applications at 32 Gigabits per second (Gb/s) and 16 Gb/s Fibre Channel (FC) speeds. 32Gb/s and 16Gb/s Fibre Channel products include inherent encoding enhancements that make them more efficient and they support new resilient features like Forward Error Correction (FEC) for mainframe systems.

Connectivity Matter for MainFrame

Connectrix® directors provide non-disruptive, and automatic failover through redundant components. Resident diagnostics quickly identify and pinpoint system anomalies. Connectrix directors support all the required IBM® zEnterprise® features for robust availability and security. All Connectrix products provide high integrity fabric support through Inter-switch Links (ISLs) and in-band management through Control Unit Port (CUP) and Fibre Channel Protocol (FCP) Intermix support. An automatic “phone-home” capability notifies Dell EMC’s Remote Support Facility and activates appropriate product support services, including dispatch of service personnel when necessary.

Dell EMC offers two mainframe storage networking product lines: the Connectrix B-Series and the Connectrix MDS Series. The mainframe offerings are described below.

Connectrix B-Series for Mainframe

The Connectrix B-Series director line includes includes four chassis models. The 32Gb/s ED-DCX6-8B supports eight switching modules for a maximum of 384 ports and the 32Gb/s ED-DCX6-4B supports four switching modules for a maximum of 192 ports. The ED-DCX8510-8B supports eight switching modules for a maximum of 512 16Gb/s ports and the ED-DCX8510-4B supports four switching modules for a maximum of 256 16Gb/s ports. Both the ED-DCX6 and ED-DCX8510 directors support switching modules for distance extension. Dell EMC port blade model PB-DCX6-SX6 is available for the ED-DCX6 Directors and model PB-DCX-FX8-24 supports the ED-DCX8510 chassis.

Unique to the Connectrix B-Series Directors, IBM supports Inter-Chassis Links (ICLs) for IBM z Systems™. For FICON, up to three
directors connected together through ICLs is supported. ICLs connect the backplanes of the directors together instead of using Inter-Switch Links which connects directors together port-to-port.

The Connectrix B-Series FICON products are managed by Connectrix Manager Converged Network Edition (CMCNE). CMCNE provides access to a suite of features known as Fabric Vision. In a mainframe environment, Fabric Vision provides resilient features through Monitoring and Alerting Policy Suite (MAPs) and Flow Vision. MAPs allows you to minimize downtime through automated pre-defined policies, rules and actions. Flow Vision provides the ability to automatically discover flows and non-disruptively manage flow performance.

In addition to directors, Dell EMC offers two FICON-qualified B-Series switches. The DS-6510B provides 24- to 48 16Gb ports. The DS-6510B is most often deployed with IBM’s new z13™ mid-range mainframe. The MP-7840B is the 16Gb Distance Extension model. The MP-7840B allows you to design better disaster recovery/business continuity solutions like SRDF, that allow business critical mainframe applications to maintain access to their critical business data.

Finally, Dell EMC embeds the Connectrix B-Series VDX-6740B in Dell EMC’s DLm for mainframe backup that allows you the ability to do both IP and Fibre Channel extension to replicate DLm data over distance in combination with the MP-7840B.

Connectrix MDS Series for Mainframe
The Connectrix MDS Series includes two director models and one multi-purpose switch model. The MDS-9710 director model supports up to eight switching modules for a maximum of 384 16Gb/s ports and the MDS-9706 director model supports up to four switching modules for a maximum of 192 16Gb/s ports. The MDS-9250i switch model provides distance extension with FCiP for mainframe environments. All three products support FICON.

The MDS Series also supports many FICON features including FICON Dynamic Routing, FICON Port Channels, full VSAN support and 10Gigabit Ethernet support for FCiP and distance extension.

Data Center Network Manager® (DCNM) the management tool for Connectrix MDS, optimizes the overall uptime and reliability of your data center infrastructure and helps improve business continuity. DCNM automates provisioning, monitors and detects degradation, and provides faster problem resolution.

Dell EMC Global Services – Mainframe Service Offerings
Dell EMC Global Services utilizes deep knowledge, best practices, and mainframe expertise to meet your technical and business requirements. Our 16,000+ services experts worldwide, plus global network of partners, deliver the skills, knowledge, and experience organizations need to get the maximum value from their EMC technology investments—with an unending commitment to an exceptional total customer experience through service excellence.
Our services for Connectrix mainframe environments include the following:

**Fibre Channel Infrastructure Assessment:** This service comprehensively reviews your current Fibre Channel network from a health and best-practices standpoint. It also provides the current-state status of your storage SAN infrastructure along with analysis and recommendations including remediation suggestions based on SAN best practices.

**Design and Implementation for Mainframe Connectivity:** This service provides a complete business solution that addresses your mainframe storage and connectivity requirements and the framework for implementing a FICON infrastructure.

**Implementation for VMAX for Mainframe:** This service provides for the physical installation and powering on of a new VMAX array in a mainframe environment and configuration of the array for online operation. It also allows for additional options, SRDF configuration, and TimeFinder configuration.

**SAN Migration for Connectrix:** This service provides the fastest and most reliable method to properly migrate existing Connectrix products (Brocade®, legacy McDATA and Cisco®) SAN infrastructures to a new SAN environment solution. It provides the expertise to perform the necessary data collection, planning, analysis, and implementation to carefully protect data center availability.

**SAN Optimization for Connectrix B-Series:** This service helps automate the proactive management of complex SAN environments. It prepares the SAN environment for the implementation of key Connectrix B-Series advancements such as Fabric Vision, MAPS, Dashboards, Clearlink Diagnostics, and Bottleneck Detection using Brocade Network Advisor (BNA)/Connectrix Manager Converged Network (CMCNE). The resulting SAN management infrastructure maximizes uptime, simplifies and automates SAN management, and provides heightened visibility into the network.

**FICON Extension Services for Connectrix B-Series:** These services provide SAN Experts to design and implement your SAN Extension switches and blades to interconnect data centers spanning separate physical locations.