

ABOUT EMTEC®

Emtec is the right size provider of technology-empowered business solutions for world-class organizations. Our local offices, highly-skilled associates, and global delivery capabilities ensure the accessibility and scale to align your technology solutions with your business needs. Our collective focus is to continue to build clients for life: long-term enterprise relationships that deliver rapid, meaningful, and lasting business value.

INFRASTRUCTURE SERVICES

Emtec delivers comprehensive lifecycle Infrastructure Services – from requirements analysis, selection, planning, design, procurement and deployment, and technical support, to ongoing service management and outsourced managed services. From the desktop to the data center, our services include not only the procurement of hardware, but providing you with the tools and ability to efficiently provide support, security and effective use of internet computing assets.

- ITSM
- Data Center
- Business Application Infrastructure
- End User Computing
- Platforms

FIRM PROFILE

A New Jersey state government agency with over 7,000 users had operated as a subdomain in the parent network of the department it was associated with, but due to organization changes required a greater degree of IT autonomy within the state government hierarchy.

THE BUSINESS CHALLENGE

State government agencies naturally require a robust IT infrastructure in order to share data with other agencies, conduct mission-critical projects and provide better services to the public. In fact, state agencies are under near constant pressure to develop new programs and services that maximize the use of online resources in order to meet legislative requirements and citizen demand.

Officials with one large New Jersey state agency were prepared for a daunting experience when they embarked upon a substantial IT infrastructure upgrade. This agency needed its own network domain with a separate directory for system resources such as user desktop profiles, applications, printers and security information. However, the agency still needed to maintain a high level of interoperability with other agencies, so separate network domains had to be connected via trust relationships and permissions.

THE SOLUTION

Emtec engineers helped design, configure and implement the new network domain, which involved the migration of approximately 7,000 users from a workgroup environment to a separate Windows Active Directory domain. The project included building a test lab environment, creating a data center, developing a backup solution, deploying 12 domain controllers and 63 file/print servers, and reimaging and joining to the domain approximately 6,600 desktops.

The Emtec engineering team touched every PC on the network, installed new Dell servers and racks at each of their 63 offices throughout the state, set up Active Directory file structures, implemented WSUS (Windows Software Update Services), set up a Symantec backup solution, and implemented virus scanning and tighter log-on and authentication.

The most important portion of the project occurred before a single piece of hardware was actually deployed in the field. Emtec set up a test lab environment at the agency's central office in Trenton. The lab included test boxes for WSUS, VPN, antivirus and VMware, as well as servers to be used to test various applications. Working through all the potential hitches in this test environment helped ensure a smooth rollout.

In the rollout phase, the data center was set up in the agency's central office with two domain controllers, two file servers and additional Dell servers to host the Symantec Backup Exec application, WSUS and an EMC SAN. Ten additional domain controllers were then deployed at key office locations around the state. Once the domain was up and running, Dell 2900 file/print servers and Dell 24U racks were deployed to individual offices throughout the state. To accomplish this final portion of the project, Emtec created "north" and "south" teams to conduct daily installations in separate regions of the state.

“In the end Emtec brought the project in ahead of schedule and under budget and more than a year after the project’s completion, the agency has experienced virtually trouble-free operations.”

RESULTS

Agency representatives say the new network configuration provides numerous benefits that greatly improve workflow and efficiency. Administrators have much more control and independence due to a single point of access and a unified database for all system resources. The ability to manage policies or make changes to desktop and server images without having to go through a change request process has made operations more flexible and less complex. For example, large system patches or software updates can now be scheduled when end-users are less likely to be affected by network performance issues, rather than when convenient for users in a parent domain.

However, Emtec designed the new domain tree to remain a part of the parent group’s Active Directory forest, which ensures a trust relationship between the two domains. This means users at both agencies can still access resources in each other’s domain tree as long as their user accounts have been assigned the appropriate permissions to do so. Since the project was completed the agency has reported no significant issues in the year they’ve been operating under the new infrastructure. Emtec’s extensive expertise with similar projects — particularly for government customers — is a major reason for the smooth transition.

In the end, however, a team of engineers from Emtec, Inc., brought the project in ahead of schedule and under budget. Even better, more than a year after the project’s completion, the agency has experienced virtually trouble-free operations.