**CONCLUSION**

**Return on Investment**

The deployment of a common collaborative site collection with sub-sites featuring shared users yielded greatly reduced administrative overhead – new and changed users now require minimal configuration. Active Directory enabled site collections to use AD groups, allowing easily propagated user changes through central administration. Backup and restoration of site collections and list/library migration avoided costly custom re-designs, ensured operational integrity throughout the project, and reduced overtime and off-hours work. The use of custom configurations with changeable variables in sub-site collections resulted in the elimination of duplicated work and a substantial reduction in developer hours.

**Lessons Learned:**

1. Ensure site collections are designed around collaboration, authentication, and business function rather than departments and offices.
2. Coordinate re-design efforts with individual offices to minimize disruption and ensure operational integrity of existing sites.
3. Identify in advance customization requirements that can benefit the entire organization.

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**Figure 3 - Application Deployment**

DSA has provided information technology solutions to the Defense and Intelligence communities and civilian agencies for over 45 years. As a proven leader in identity management, cyber security, network engineering, and program management, we enable our customers to collect, organize, search, share and protect their mission critical information, securely.
SITUATION

A U.S. Department of Defense (DoD) client with substantial security restrictions had previously deployed SharePoint in support of thousands of global users in multiple Active Directory domains with a wide range of authentication mechanisms (including Unix-based). The rush to implement the solution, combined with the customer’s highly restrictive server-side and client-side security requirements resulted in a poor user experience and limited productivity gains. The original design used Active Directory Federated Services (ADFS) to enable Unix and Active Directory authentication from un-trusted domains, but suffered from severe administrative overhead (user management was accomplished with SharePoint groups, requiring modification to 24 separate site collections each time a group’s composition changed) and no Microsoft Office integration, severely limiting SharePoint’s native capabilities. (Figure 1)

DSA’s project team planned and executed a full re-design, substantially improving system performance and the user experience. The re-design focused on four goals:

1. Reconfiguring site collections to separate Active Directory from non-AD authenticated users, and restore Office Integration capabilities wherever possible
2. Providing common collaborative spaces for all users to simplify administrative overhead
3. Defining a method for developing customized lists and workflows easily re-deployed to multiple site collections with minimal reconfiguration to reduce development efforts
4. Ensuring all changes minimized disruption to the production environment.

SOLUTION

After evaluating the customer’s issues and developing a re-design plan, DSA’s team began execution by separating existing site collections. The team moved collaborative lists, libraries and other data to a separate site collection configured for multiple authentication mechanisms using Active Directory Federated Services, while configuring Active Directory and Office integration for the existing site collection. Collaborative space sub-site reconfiguration was essential to substantially reduce administrative overhead (Figure 2), while server-side changes and client-side patching restored Office integration to both environments. Unix authenticated users required a patched Vista (or greater) operating system running Office 2007 SP2. DSA approached data migration requirements in one of two ways: exporting lists to Excel and re-importing them to the new site, or backing up the existing site, restoring it under a new name, and removing the unneeded lists and libraries.

The team developed commonly customized solutions in separate sub-site collections and configured each with workflows and variables for easy modification. After thorough testing and validation, the team backed up these customized site collections, restored them to the individual department site collections where they would be used, and reconfigured each with custom fields and forms specific to the department (see Figure 3, next page). This allowed the efficient distribution of common features to multiple site collections and reduced development time.

By gathering detailed requirements from individual offices and coordinating migration dates and times, the team ensured minimal operational down time. The collaborative spaces became sub-sites in a newly deployed site collection linked to “internal” site collections comprised of the existing sites with full Office Integration. The user community received alerts via online banners deployed to sites under modification, with down-time limited to 4-hour windows during non-working hours.