BCCS Pulse Newsletter

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2010 NASCIO
Award Recipient

This issue

Data Center Server Consolidation and Virtualization Project

- Reduction of **22,800 sq. ft. of data center floor space resulting in a $4,3000,000 savings** in annual operating costs by eliminating leased space and required facility upgrade costs.

- Server **processor utilization has increased by over 700%** on average. This has allowed BCCS to allocate resources more efficiently and lower the overall cost.

- Server virtualization and blade server technology have **reduced power consumption by 77%**.

- Return on Investment (ROI) totaling over **$10,798,000** between July 2006 and May of 2010.

CMS-BCCS Data Center Virtualized Blade Servers

CMS-BCCS was honored at the National Association of State Chief Information Officers (NASCIO) **Annual Recognition Awards** for Outstanding Achievement in the Field of Information Technology in State Government.

In 2003, the State of Illinois faced a $5 billion budget deficit and searched for opportunities to reduce costs. Legislation was written and passed by the General Assembly with a goal of creating efficiency and reducing costs through the use of shared services.

The Bureau of Communication and Computer Services (BCCS) within the Illinois Department of Central Management Services (CMS) conducted an analysis to determine several potential areas of cost savings and efficiencies. The state discovered that duplicate efforts throughout the agencies could be eliminated and savings realized by sharing and consolidating IT services. Data center operation and server management were identified as areas for significant potential savings.

The goal of the data center consolidation was to physically consolidate servers into two primary data centers: Springfield and Chicago. Begun in 2006, the project resulted in the decommissioning of 22 substandard data center/computer rooms and a reduction of 22,800 square feet of data center floor space. The move resulted in a significant cost reduction, improved service and availability, and significantly better operational efficiencies.

Server virtualization began in January 2008 after the initial physical consolidations were completed in the primary data center in Springfield. Most of the servers were more than 10 years old and in desperate need of upgrades. There was also a need to better utilize power, cooling, and floor space. A decision was made to install redundant/clustered virtualized server systems utilizing blade server technology, SAN attached storage and water-cooled racks.

The project resulted in the virtualization of 854 aging physical servers and the installation of 190 new virtual servers for a total of 1,044 virtual servers managed today. The project also resulted in more efficient operations at a reduced cost. Server uptime has increased and server/storage provisioning times have decreased. Completion of the project has resulted in an ROI totaling more than $10,798,000 between July 2006 and May 2010.

The State of Illinois recently participated in the **Digital States Survey**. Illinois earned an overall "B" grade on the survey, and received a 3rd place award among all states in the Enterprise Information Technology and Communication (ITC) section of the survey.

Link to **www.govtech.com** for further information on the Digital States Survey.

IBOP-EC

- CMS was awarded $62 million to deploy a high speed fiber network across a 55-county region in Illinois.

- The project will construct more than 1,000 miles of new fiber and upgrade over 1,000 miles of existing fiber.

- More than 400 community anchor institutions will be directly connected via fiber including 23 community colleges.

- Residential broadband service providers will be able to use the fiber infrastructure to affordably extend their services into unserved or underserved communities.

Print Center Relocation

Hours of operation for print output pick up: 6:30 a.m. to 3:30 p.m., Monday through Friday.

Contact Jeff Copelin at 217.785.6749 for pick up outside of those hours.

Address e-mail correspondence to: Rev.Opsup@illinois.gov

Illinois Broadband Opportunity Partnership East Central

"The project will construct more than 1,000 miles of new fiber and upgrade over 1,000 miles of existing fiber."

**Lori Sorenson
BCCS Chief Operating Officer**

Central Management Services was awarded $62 million to deploy a high-speed fiber network across a 55-county region of northeastern, central, and eastern Illinois. The network will address a lack of suitable broadband access for community anchor institutions in many of the region's rural and economically distressed counties.

The Illinois Broadband Opportunity Partnership – East Central (IBOP-EC) is a collaboration between the Illinois Century Network (ICN), Illinois State University and more than 40 public and private sector partners.

The project will construct more than 1,000 miles of new fiber and upgrade over 1,000 miles of existing fiber. More than 400 community anchor institutions will be directly connected via fiber; including 23 community colleges. The new fiber backbone will support speeds of up to 1.6 terabits per second - hundreds of times faster than the current network and user speeds ranging from 10 megabits to 10 gigabits per second - more than six-times the current speed of the majority of the community anchor institutions. Residential broadband service providers will be able to use the fiber infrastructure to affordably extend their services into unserved or underserved communities with a potential to reach an additional 5,861 community anchors, 285,410 businesses and 3,931,975 households.

The U.S. Department of Commerce awarded $62 million in competitive federal funds for the project. State and private sources, including $26 million from the *Illinois Jobs Now!* capital program*,* make up more than $34 million of the total budget.

While the project focuses on 55 counties in central and eastern Illinois, the ICN is partnering with other broadband infrastructure awardees to enhance network and Internet access for constituents throughout the state. ICN, as a member driven organization, has always believed that communication with its constituents is important, and with this project will provide monthly updates to keep customers informed and to help facilitate connections to the new infrastructure. For more information: www.illinois.net/IBOP.

In our continuing efforts towards IT efficiency and consolidation, management of the Print Center will be moving from the Department of Central Management Services to the Department of Revenue. The CMS Print Center has been relocated from the Harris Building to the Willard Ice Building (WIB). With the exception of the Departments of Human Services and Health and Family Services, all reports will continue to be picked up at the Harris building until November 19th.

Reports for DHS and HFS will continue to print at both locations during the transition. All other print customers can start picking up their reports beginning at 6:30 am on November 19th at WIB. Many of the same staff will continue to provide the same print service that you receive today and phone numbers are being transferred. Please note, however, that phone lines will be in and out of service during the transition. Management of print scheduling and billing will remain with CMS/BCCS. For more information, contact the Department of Revenue at 217-782-3804.

BCCS FY11 Telecom Order Deadlines

"In setting these dates, the CSC has considered the time needed for processing requests, procuring hardware, and billing."

Theresa Starling
CSC Manager

Plan now to make sure your projects are completed on time. Telecom projects take time and planning, especially if you want them completed in the fiscal year for which you have budgeted. As the BCCS Customer Service Center (CSC) continues to standardize telecommunication services for our customers, we have established deadlines for processing FY11 telecommunications orders.

In order for the CSC to assist all agencies with planning and completing projects throughout the coming year, the CSC is providing all agencies with advance notification of cutoff dates for all FY11 Telecommunications Service Orders (TSRs), Cellular Service Orders (TSRs), Paging Service Orders (PSRs), Wireless/IWIN Service Orders (WSRs), and Telecommunications Data Orders (TDRs), including large projects. In setting these dates, the CSC has considered the time needed for processing requests, procuring hardware, and billing.

The advance customer notification will allow your agency time to plan requests for projects. Adherence to these dates will allow sufficient lead time for proper review and processing of requests.

Please notify your staff of the FY11 cutoff dates:

- **12/27/2010 -** Non-routine data orders for fiber-based service, including GigaMAN, OptEMAN, and orders requiring installation of new facilities.

- **02/28/2011 -** Data orders for T1s, T3s, OCs, analog service, office moves or new locations under 150 stations, and non-contract items for all types of service and equipment.

- **05/02/2011 -** Routine voice/data orders for move, add, and change (MAC) work, and routine orders for paging and cellular/wireless services and equipment.

If the CSC receives your request on or before the designated date and work is completed by June 30, 2011, the order will be processed and billed in FY11. Service Orders must clearly state that the work should be billed in FY11.

If you have questions or are aware of FY11 projects that may be problematic, please contact the CSC at 217-524-4784 or 1-800-366-8768.

Mail all original service orders to:
CMS Customer Service Center
Attn: Provisioning
120 West Jefferson Street – 2nd Floor
Springfield, IL 62702-5103

How Do You Choose a Good Password?

Passwords are a common form of authentication and are often the only barrier between a user and his/her personal information.

There are several programs attackers can use to help guess or "crack" passwords, but by choosing good passwords and keeping them confidential, you can make it more difficult for an unauthorized person to access your information.

Here is a review of tactics to use when choosing a password:

- Don't use passwords that are based on personal information.

- Don't use words that can be found in any dictionary of any language.

- Use both lowercase and capital letters.

- Use a combination of letters, numbers, and special characters.

- Use passphrases when you can.

- Use different passwords on different systems.

BCCS Green Initiatives

- BCCS implemented a printer optimization in Springfield reducing its Imaging Device total by **38%** sending **77 devices** to Surplus for re-use.

- Electronic Pay Stub System (EPASS) has been deployed to **12 agencies** including more than **10,600 employees** or approximately one-fifth of our state employee workforce.

- BCCS plans on incorporating the Electronic Product Environmental Assessment Tool (EPEAT) in future procurements.

- Following EPEAT standards typically results in significant solid waste reduction, toxic waste reduction, packaging and post-use recycling.

- EPEAT registered products must also meet the Energy Star efficiency specifications. These products should consume less energy throughout their useful lives.

Cyber Storm III (CSIII)

"The goal of the exercise was to examine global cyber preparedness and response capabilities and identify improvement areas."

Rafael Diaz
BCCS Chief Information Security Officer

Illinois recently participated in the global cyber-attack exercise "Cyber Storm III" (CSIII). CSIII simulated a sophisticated, large-scale cyber attack targeting multiple and geographically disbursed critical infrastructures. The U.S. Department of Homeland Security (DHS) coordinated the exercise with participants spanning the globe. Countries participating included Australia, Canada, France, Germany, Hungry, Italy, Japan, the Netherlands, New Zealand, Sweden, Switzerland, the United Kingdom, and the United States. U.S. participants included seven White House Cabinet-level departments, 11 states, and 60 private sector companies. Organizational participants that were represented during the exercise included government, military, law enforcement, FBI, Secret Service, public works (water) and private sector industries such as voice and wireless communication, chemical, nuclear, finance/banking, and transportation.

The goal of the exercise was to examine global cyber preparedness and response capabilities and identify improvement areas thus meeting a Congressional mandate of strengthening public and private sector cyber security preparedness. The exercise achieved its goal and provided participants the opportunity to strengthen cyber defenses thus reducing risks to the nation as a whole.

For more information on Cyber Storm III:
Please visit: www.dhs.gov/files/training/gc_1204738275985.shtm

Additionally, Illinois has been awarded a DHS grant that will strengthen cyber defenses at the local community level. The grant will help in the development of a Community Cyber Security Maturity Model which can assist any Illinois local government in strengthening their cyber defense strategy. Pilot communities selected for an initial trial include Springfield and Chicago.

Microsoft WORD Keyboard Shortcuts

- To format a word without selecting it, click the word and apply the formatting that you want. For example, press **CTRL+B** to apply bold formatting.
- To select a word, double-click it.
- To select a sentence, press **CTRL** and click in the sentence.
- To select a paragraph, triple-click in the paragraph.
- To select an entire document, press **CTRL+A.**
- To paste only text and not formatting, paste the text, click Paste Options, and then select Keep Text Only.
- To preserve formatting when you move or copy a paragraph, include the paragraph mark.
- To center, left-align, or right-align a selected paragraph, press **CTRL+E, CTRL+L, or CTRL+R.**
- To create a line, press the hyphen key three or more times, and then press **ENTER**. To create a thicker line, hold the **SHIFT** key down and press the hyphen key three or more times, and then press **ENTER**.
- To make text larger or smaller, select the text, and then press **CTRL+SHIFT+]** or **CTRL+SHIFT+[.**

BCCS Personal Trainer