

Southwest Minnesota State University

Information Technology Services July 2013 – June 2016 Strategic Plan

Introduction

There is little dispute that information technology has become an integral aspect of higher education. In many ways it is transforming the core activities of colleges and universities. SMSU is no different than any other academic institution in this regard. As a result, it is imperative that sound strategic planning for how information technology resources will be developed and deployed is essential for the long-term success of the University. This need is exceedingly important in an era of limited financial resources that are available for public higher education institutions. Information technology resources are critical for such areas as innovation in instruction, business process enhancement, data-driven decision making and enhanced communications services among others.

To support the information technology services strategic plan development, SMSU's Information Technology Services (SMSU ITS) department engaged in a multi-year process focused on obtaining input from across the University community. The local feedback has been supplemented by extensive efforts among SMSU ITS staff to assess the general state of information technology trends and directions—specifically those trends and directions within higher education.

Planning Process

Specific activities that were used to drive the development of this strategic plan began in earnest in the Spring of 2011. There were several key activities included in the process. First, as part of a broader Presidential Transition Report development process initiated by MnSCU, there was a site visit by the Chief Information Officer from Minnesota State University, Mankato and a team of his senior leadership in the Spring of 2011 to meet with various constituent groups on campus regarding the state of information technology services at SMSU. At his invitation, the SMSU Chief Information Officer participated in these sessions. SMSU ITS staff also met as a group and individually with the Minnesota State University, Mankato team. Second, there were "Listening Sessions" with various campus constituency representatives conducted by the SMSU Chief Information Officer in the Spring of 2011 and the Fall of 2011. Third, a Fall 2012 site visit was conducted by MnSCU System Office Information Technology Services staff at the invitation of the Chief Information Officer.

The results of these activities were summarized and reviewed with SMSU ITS staff and the University Technology Advisory Committee as permitted. As a result of this review, the CIO worked with the University Technology Advisory Committee (UTAC) during the 2011-2012 academic year on the development of four strategic directions for a university-wide focus. Following the development of the strategic directions, the CIO worked to develop a series of specific goals and objectives within each of the strategic directions. A series of drafts of the strategic plan including goals and objectives were reviewed with the UTAC during the 2012-2013 academic year. The most recent review was conducted in April 2013. Following the UTAC's last review, an additional draft was developed and circulated for review among SMSU ITS staff and the President's Cabinet. This later draft included proposed new vision and mission statements for SMSU ITS.

Note: The Presidential Transition Report itself is considered a confidential document pursuant to Minnesota Statute 13.392 and thus was not distributed.

As a next step, SMSU ITS will be engaged in the development and implementation of a tactical plan to accomplish the varied goals and objectives outlined for the three year period beginning July 1, 2013. It is anticipated that the tactical plan will need to be dynamic in light of factors that will be outside of SMSU ITS's direct control including budgetary and staffing resources available and/or new University or MnSCU initiatives that may require a shift in priorities.

SMSU ITS will incorporate an ongoing assessment and evaluation of its performance in meeting the goals and objectives identified into currently existing processes. These processes include reports provided to the University Technology Advisory Committee, the President's Cabinet and performance reviews.

Planning Factors & Assumptions

It is important to note that the strategic plan outlined in this document incorporates the fact that SMSU's information technology environment is not, nor will be, a stand-alone environment. As a member of the MnSCU System, SMSU is reliant upon core administrative software applications managed by the System Office's Information Technology Services division. These applications include the Integrated Student Records Systems (ISRS), Degree Audit Reporting (DARS) and Hyperion Brio. In addition, the System Office manages a system wide implementation of course management software-- Desire2Learn (D2L). Also, the System Office is in the process of implementing a system wide deployment of Event Management Systems—a classroom and event management & resource scheduling software—and StarID—an identity management service. The System Office also provides leadership and support in the area of wide area networks and information security.

In addition to the System Office, SMSU is a member of the Southwest/West Central Higher Education Organization for Telecommunications & Technology (SHOT)—one of six regional consortia that comprise the Learning Network of Minnesota. SHOT supports several communications systems and services (e.g., video conferencing, web conferencing, online media management and telephony) that are critical to University operations. Another key external partner for SMSU is Minnesota State University, Mankato (MSUM). MSUM manages a systemwide deployment of Image Now—a document management system. The Image Now deployment is an example of an emerging trend among MnSCU institutions to develop shared services to support critical information technology operations across the system. SMSU also has key relationships with vendors to support applications utilized on campus. These include “on-premise” systems such as the Blackboard Campus Card service and “cloud-based” constituent relationship management (CRM) systems like Hobson's Connect and Retain.

Other factors and assumptions incorporated into this strategic plan are as follows:

1. The level of staffing available for SMSU ITS will not change significantly during the next three years.
2. Budgetary resources available to SMSU ITS will not change significantly during the next three years.

3. Demands for new information technology resources and tools, in addition to support for existing services, will continue to grow from within the University community.
4. Factors such as the increased consumerization of technology and the growth of mobile devices will continue at an exponential pace.

SMSU Information Technology Services Vision

We will be both a proactive and responsive service organization that fully supports the University community in the innovative utilization of information technology resources to make SMSU a university of choice.

SMSU Information Technology Services Mission

It is our mission to provide a wide spectrum of quality information technology services and support that meet the requirements of the entire University community.

Governance and SMSU ITS Organizational Overview

SMSU ITS is part of the Academic and Student Affairs division at SMSU. The Chief Information Officer (CIO) reports to the Provost. The CIO is also on the President's Cabinet.

SMSU has several standing technology services related committees that serve to provide input into SMSU ITS services. These committees include: 1) University Technology Advisory Committee; 2) Student Technology Fee Committee; 3) SMSUFA Academic Technology Committee; and 4) the Information Security Team. Also, on an as needed basis, ad hoc committees or task forces are created to develop recommendations for addressing specific issues. A recent example of such an ad hoc group was the Technology Accessibility Task Force (TATF) that met during the Fall of 2012. The TATF developed recommendations for the University to pursue to address the issue of providing technology enabled services that meet accessibility targets for persons with disabilities.

As a unit, SMSU ITS is unique in its organizational structure compared to other universities and colleges within MnSCU and elsewhere in the nation. The CIO position also serves as the Executive Director for two regional organizations in southwestern/west central Minnesota. These organizations are SHOT and Minnesota Tele-Media (MTM). SHOT is one of six regional consortia that make up the Learning Network of Minnesota. As an organization, SHOT focuses on providing network communications services to its member institutions. SHOT staff are housed at SMSU and SHOT core infrastructure is located in the SMSU Data Center. MTM is a cooperative organization that involves SMSU, two other regional higher education institutions and the SW/WC Service Cooperative—a regional K-12 service organization. MTM provides research, planning, funding assistance, implementation and organization of telecommunications services for its members.

SMSU ITS is a relatively flat organization. There are four service bureaus within SMSU ITS. These service bureaus are Data Management and Institutional Research Services, the Technology Resource Center, Electronic Media Services and Data Center/Network Services. With the exception of Electronic Media

Services staff, all SMSU ITS staff report directly to the CIO. Including the CIO, there are 13 employees comprising 11.92 FTE. There are also two Graduate Assistant positions funded. One of these positions primarily supports Technology Resource Center operations. The other position primarily focused on providing instructional technology support. There is also a cadre of 20-30 student workers each year that work in the Technology Resource Center and Student Computer Labs.

Including the CIO, SHOT has 4 employees comprising 3.0 FTE. The Director of Institutional Research Services reports to the Provost.

SMSU ITS does not manage the University's web site. The Web Services Office is part of the Office of Communications and Marketing under the Vice President for Advancement. SMSU ITS staff work closely with the Web Services Office and have staff located in that office.

The SMSU ITS organization chart is attached as Exhibit 1.

STRATEGIC DIRECTIONS

- 1. A highly technologically literate and informed campus community.**
Services and activities will be performed which meet the needs of faculty, staff and students seeking to thrive in today's rapidly evolving technology-enabled learning environments and workplaces.
- 2. A reliable, accessible, secure and advanced technology infrastructure.**
On an ongoing basis, ensure that the information technology based tools deployed for the SMSU community's use meet these criteria to the fullest extent possible.
- 3. A clearly understood, customer-service oriented and agile information technology services organization.**
ITS will continue to pursue strategies and steps that are customer-service focused, ensure responsiveness to University needs, and successful completion of projects. Special emphasis will be given to making ITS more transparent to the University community.
- 4. Support for tools and processes that enable increased efficiency and innovation across all areas of the University.**
As higher education faces the dual challenges of increasing competition and increased demands for accountability and efficiency, the SMSU community will need access to resources and expertise that support individual and collective efforts that make the University more effective in meeting strategic priorities.

Goals & Objectives

Strategic Direction #1 -- A highly technologically literate and informed campus community.

Services and activities will be performed which meet the needs of faculty, staff and students seeking to thrive in today's rapidly evolving technology-enabled learning environments and workplaces.

Goal 1: Expand the scope of information technology-related training activities and support for faculty and staff on deployed and planned technologies.

Objective 1: Complete the two-year pilot initiative begun in FY 2013 in conjunction with the Student Technology Fee Committee that funds a Graduate Assistant position focused on providing instructional technology support assistance for faculty. Assistance provided includes such methods as direct phone support, group presentations, and scheduled consulting visitations. Collect data to evaluate the effectiveness of the initiative. Based on pilot results, formulate a recommendation to the Provost regarding continuation of the Graduate Assistant approach vis-à-vis other staffing support solutions.

A new GA (Maria Kalyvaki) was hired for this position for the 2013-14 academic year as the first GA (Sapana Joshi) graduated. Data collected by the GA's demonstrated a significant increase in contact time with faculty and staff. Contact time includes a variety of methods. Pursuant to a review of the data, the Student Technology Fee Committee recommended funding for the Graduate Assistant position to continue for the 2014-15 academic year. To support the GA's, the CIO pulled together a subset of ITS staff for monthly meetings to assess ongoing needs pertaining to instructional technology support and develop action plans. Discussions on how instructional technology support can be increased in conjunction with University wide strategic plan development are ongoing.

Objective 2: Expand D2L Users Group concept into other technology tools (e.g., Adobe Connect, Image Now) user groups including the potential for broader academic technology and administrative technology tools user groups.

ITS staff are exploring expansion of the Users Group concept with other tools. A Fall 2014 survey to be conducted among faculty/staff will be used to assess which technology tools have most potential for vibrant user groups.

Objective 3: Develop a centralized "technology resource library", including links to readily available online resources for faculty and staff to access on a just-in-time basis.

ITS staff explored the possibility of developing a contract with Lynda.Com during the past year after an initiative undertaken by the MnSCU Campus Service Cooperative to negotiate a system wide contract was unsuccessful. The negotiations were unsuccessful as Lynda.Com required all MnSCU institutions to purchase the service. Terms provided to SMSU for an individual institutional contract were not equivalent to those offered as part of a systemwide agreement. Given that several University constituencies have expressed skepticism about the value of services like Lynda.Com, such a service has not been funded through such avenues as the Student Technology Fee and other available funding. ITS is continuing to explore options for providing just-in time resources for the University community.

Objective 4: Investigate the use of social media and/or collaboration tools to enhance the value of the User Groups contemplated (see Objective #2).

Per status of Objective #2, limited investigation into the use of social media and/or collaboration tools to support User Groups has been initiated. ITS has opened up a twitter account for use with important technology related announcements for the University and is also testing collaboration tools internally that may have value for User Groups.

Objective 5: Initiate routine “Tech Tips” sessions for faculty and staff regarding select technologies in broad use (or viable for broader use) across campus.

Planning for routine sessions is still in progress. Some small trainings during the lunch hour on topics such as “smart board tools” have been initiated. However, these trainings have only been periodic to date.

Objective 6: Utilize the SMSU ITS web site as a dynamic information sharing site including such elements routine blogs, video tutorials, etc. from SMSU ITS staff regarding new features or advancements in specific tools.

As a precursor to a broad incorporation of the various elements described above, ITS is rebuilding the departmental web site in Summer 2014 to make it more user friendly and easier to maintain. In the interim some use of tools like Camtasia video/lecture capture were implemented for video tutorials including a tutorial on how to activate a StarID. The use of other tools such as the Kaltura media management tool to post tutorials are under investigation.

Objective 7: As part of a broader departmental level consulting process (See Strategic Direction 4, Goal 1, Objective 1), continuously assess technology training needs in conjunction with academic department chairs and administrative department directors.

Limited progress has been made with the Departmental Consulting program to date. Program initiation is a focus for FY 15. However, it is important to note that an example of this program was initiated with the Administrative Assistants group in FY 14. ITS staff attended several Administrative Assistants group meetings during the year. This participation led to the development of some targeted training activities by ITS staff on using Microsoft Excel software to work with and interpret student data available from Data Management. Also, a specialized smartboard training was provided for the English Department. It is anticipated that the ITS Services Awareness Survey previously identified will be a useful instrument to support the program including the identification of training needs.

Objective 8: Utilize and actively promote tools such as the SMSU ITS web site and the Manage Engine Service Desk (helpdesk ticketing, etc.) software to provide “self-service” resources that can be useful in resolving common issues incurred.

As indicated above (see Objective #6), ITS is rebuilding its web site. Among the goals for the web site rebuild is to provide more access to the University community on “self-service” resources. In addition, ITS is examining the potential to make the Manage Engine Service Desk tool a more effective self-service resource base for the University community. Another potential tool under examination is the development of an ITS service catalog that can have links to self-service resources. Finally, SMSU ITS is monitoring an initiative as the MnSCU system level

to adopt a new service management tool that could also be utilized by individual institutions. A RFP has been issued by the system for potential products.

Goal 2: Enhance current services and/or develop new services that support high levels of student information technology literacy.

Objective 1: Roll out the newly developed "Orientation to D2L" short-course for students seeking to enhance their skills with D2L.

The short-course was completed prior to Fall 2013 semester. Plans exist to continually update the course to be consistent with D2L version updates.

Objective 2: Engage the Academic Technology Committee (Faculty Technology Committee) in a "strategies to enhance student information technology literacy at SMSU" discussion.

The topic was raised at the initial Fall 2013 semester ATC meeting. Discussion at the meeting centered on the need for an "Introduction to Online Education" course modeled after the "Orientation to D2L" course. Initial discussion was held at a Provost's staff meeting regarding the potential scope of such a course. In the interim, at the request of the faculty association, a forum is scheduled on the topic of online education as part of the August Faculty Development Day.

Objective 3: Participate with appropriate departments (e.g., Student Services, Residential Life, Library) to promote the importance of such items as maintaining good data privacy practices and compliance with anti-piracy laws.

No ITS action to date. However, as part of Fall 2013 Orientation, a session on Internet Piracy was held for incoming freshman by the Residential Life program.

Objective 4: Partner with appropriate departments (e.g., Student Services, Admissions) to ensure students have a detailed understanding of how to access and fully utilize the technology tools available to them as SMSU students. Such tools include on-campus data storage, printing services, campus networks, Office 365 tools, campus labs, and StarAlert.

ITS continues to participate in such events as Registration Days Parent Panels to share information regarding the scope of ITS services. However, partnerships with those departments that are interacting frequently with incoming and new students are still somewhat ad hoc. Jointly developed comprehensive strategies on how to ensure students know where to access information on critical technology services are still needed.

Goal 3: Promote the use of tools and practices that can lead to an accessible technology environment for persons with disabilities at SMSU pursuant to the FY 2013 Technology Accessibility Task Force's recommendations.

Objective 1: Develop a University wide awareness campaign that highlights the importance of technology accessibility and highlights key practices that address common accessibility issues.

ITS staff have made a concerted effort to educate the University community regarding technology accessibility needs. Among the specific activities included a brief presentation regarding the Technology Accessibility Task Force's recommendations at the Summer 2013 Staff Development Day. A brief overview was also provided at a 2013-14 D2L Users Group meeting. In addition, in conjunction with the Student Technology Fee Committee/Student Senate, ITS is purchasing a University-wide license for Adobe Creative Cloud (ACC) services beginning August 2014. Among the benefits of this service will widely available tools such as Adobe Acrobat to support the development of accessible documents by faculty and staff. Awareness sessions regarding the pending service were held during the Summer 2014 Staff Development Day. Future focused workshops on specific tools within the ACC are planned for the future as the service gets deployed.

Objective 2: Develop specific presentations outlining best practices and techniques for creating accessible technology-enabled programs and resources. Make the presentations available in multiple mediums including live and recorded sessions.

Workshops on the use of Adobe Acrobat and creating accessible forms were held for faculty and staff during the 2013-14 academic year. The presentations were recorded using Adobe Connect—a web conferencing tool that enables session archiving. As noted above, workshops on the tools available in Adobe Creative Cloud including Adobe Acrobat are planned for the future.

Goal 4: Promote technological tools as a means for enhancing sustainability practices on campus.

Objective 1: Develop an awareness campaign focused on informing the University community of best practices for the use of technology to improve sustainability efforts.

While a specific awareness campaign to promote sustainability practices has not yet been started, several initiatives have been undertaken which will help establish the framework for such a campaign. Previous initiatives include the Student Government requested Student Print Quota which included moving student use printers to a managed print service from Marco. Implemented in 2011, the Quota has served to significantly reduce printing costs. In addition, many administrative and academic departments have transitioned their "printer only" devices to Marco's managed print services. Current initiatives include the University-wide Adobe Creative Cloud license and an investigation underway to move all University printing systems to Marco's managed print service.

Strategic Direction #2 -- A reliable, accessible, secure and advanced technology infrastructure.
On an ongoing basis, ensure that the information technology based tools deployed for the SMSU community's use meet these criteria to the fullest extent possible.

Goal 1: Implement a process that ensures SMSU's core technology services infrastructure, including underlying systems and end user tools and services, can be routinely evaluated in light of the University community's service needs.

Objective 1: In conjunction with the development of a SMSU ITS Services Catalog (Strategic Direction 3, Goal 1, Objective 2), develop a Core Applications & Systems Inventory that clearly identifies the relationship of applications & systems and service solutions in use to services supported.

Formal development of the Inventory has not yet been initiated.

Objective 2: Develop lifecycle review plans for all applications, systems, and service solutions in use to ensure that future investments to be made meet the needs of the University community.

Formal development of lifecycle review plans has not yet been initiated.

Objective 3: Develop an assessment instrument to establish benchmark adoption rates for various technology tools across the institution by faculty and staff. In addition, implement a process to continually assess adoption rates and to determine reasons for high or low adoption rates and whether or not further action is warranted from SMSU ITS to stimulate use and/or whether support for certain tools should be phased out.

A SMSU ITS Services Awareness Survey is in development that among other goals will seek to identify adoption rates for available services among faculty and staff. An initial attempt at determining reasons for various service adoption rates may also be incorporated.

Objective 4: Develop a process to identify service gaps between SMSU ITS services and University community needs. Such a process could include survey instruments, existing technology committees, departmental consultations and involvement in external higher education technology communities.

In conceptual stage. Will likely need to involve multiple strategies as noted above.

Objective 5: Develop a framework that is inclusive of the University community for assessing (and potentially choosing) new approaches and innovations to delivering needed services (either current or new) to the University community.

While a formal framework has not been adopted, a model for such a framework could be the Digital Signage of the Future Task Force approach. This task force was formed among interested constituencies to review requirements and options for Digital Signage at the University. Attention will be needed to providing opportunities for all potential interested parties in such task forces.

Goal 2: Implement internal departmental procedures for services development, deployment, maintenance & updates, upgrades & enhancements, and expansions that emphasize providing reliable and consistent production services to the University community.

Objective 1: Develop standard templates and approaches that support sound change management and enable peer review of plans and steps.

During FY 14, ITS worked to develop 1) a “systems documentation” template and 2) a “quick project vetting template”. In addition, an internal ticketing system pilot was implemented in support of web services and applications development projects. To further support change management and peer review of plans and steps, weekly 30-45 minute web conference meetings among systems administrators and other ITS staff were implemented in order to collectively update each other and seek feedback on projects and initiatives. Departmental reorganization efforts described elsewhere in this status report are also focused on enhancing change management and peer review processes.

Objective 2: As funding permits, develop test or development environments for SMSU ITS managed server-based services (e.g., University web site, Mustang Card) deemed mission critical by the University community.

While test/development environments are limited, an important test environment was developed for the StarID and Active Directory project completed in FY 14. Plans exist to develop a development/test environment for the University’s web services infrastructure during FY 15.

Objective 3: Develop tools that can be used to track critical information on production services such as software license renewal dates, technical specifications, vendor support contact information, purchase date of hardware utilized, service history (e.g., date of software updates), and projected replacement dates.

Development of several databases are in progress to track critical information. Priority databases include software licenses and “Cloud Service” contracts. It is anticipated that these databases will be part of a large resource collection that will provide significant support for University processes.

Objective 4: Where viable, expand the use of automated approaches to deploying routine updates and patches to systems that support critical services.

Significant progress has been made in the deployment of automated approaches for routine updates and third-party patches. A key component of this progress has been the full implementation of Microsoft’s System Center Configuration Manager (SCCM) product.

Goal 3: Continue efforts to enhance the SMSU Data Center’s operations and reliability.

Objective 1: Update plans for enhancing physical infrastructure such as electrical, air conditioning and security systems that can be implemented in phases as funding permits.

Planning for electrical system upgrade for Data Center is ongoing. Electrical system upgrade will need to occur in phases and is pending available funding from ITS operating funds and other sources where possible. Additional air conditioning system upgrades are currently less of a priority. Physical security upgrades for Data Center may become a need pending future systemwide information security assessments.

Objective 2: Continue migration of physical server environment to the virtual server environment.

Significant new virtual server capacity was added during FY 14. In addition, more capacity was purchased to support the Active Directory migration/StarID and Exchange upgrade projects. This capacity will be transitioned into core Data Center operations during FY 15.

Objective 3: Enhance systems that support key services such as data back-up and data storage. Planning and implementation will consider a mix of in-house and off-site systems.

A new back-up appliance (Data Protection Manager) was purchased and installed during FY 14. Most servers are being backed up with the new appliance. Optimization efforts are in progress. Most servers are now backing-up to the system.

The NetApp storage system that was initially implemented in FY 13 was expanded in FY 14. Additional capacity expansion plans are in progress.

Goal 4: Develop strategies and funding mechanisms to ensure that SMSU campus network infrastructure, including wireless capacity, is a “state-of-art” system that meets the needs of the SMSU community and campus guests within the security policies, procedures and guidelines adopted by MnSCU.

Objective 1: Complete a wireless site survey to identify gaps in current wireless capacity vis-à-vis anticipated growth in demand for wireless network bandwidth on campus in the next 3-5 years.

A wireless site survey was conducted in Summer 2013.

Objective 2: Develop a plan for wired and wireless network infrastructure upgrades across campus that will be necessary over the next 3-5 years.

Plans for various aspects of campus network upgrades are in place. Funding for many of these projects have been secured through a combination of resources. These resources include Student Technology Fee, Housing and ITS funds. Projects in progress include 1) “Core Switch Infrastructure” upgrades, 2) Residential Hall switch upgrades, 3) Non-Residential Hall wireless access point upgrades, and 4) the Network Access Control system upgrade.

Objective 3: Develop funding mechanisms to support ongoing network enhancements in partnership with key constituencies on campus including Housing and the Student Senate.

As stated above under Objective 2, funding has been secured to support various network enhancement projects.

Objective 4: Continue investigation and deployment of tools that enable robust network access at appropriate security levels to SMSU's network for members of the University community and guests.

Significant research into network access tools was conducted during FY 14. As a result, several projects are underway to transition network access services to new systems during FY 15 that will enhance the experience for all University constituencies and University guests.

Goal 5: Implement MnSCU StarID to be utilized as a single identifier for enabling University community access to most services hosted by SMSU.

Objective 1: Engage an external consultant to conduct an assessment of SMSU's active directory infrastructure.

An assessment of SMSU's Active Directory infrastructure in light of needs for the migration to the StarID system was completed by NowMicro in Summer 2013.

Objective 2: Implement necessary changes to the active directory infrastructure which support an effective StarID implementation and enhance other technology services.

ITS worked with NowMicro and the MnSCU Enterprise Access Management Team over the course of FY 14 to develop project plans for the active directory infrastructure changes and StarID implementation. The projects were conducted in parallel in May. Staff are currently involved in working through the issues associated with a project of this scope to ensure smooth campus IT operations.

Objective 3: Work with the MnSCU StarID deployment team to successfully implement StarID as the primary identifier for campus hosted applications and services.

As noted above under Objective 2, StarID has been implemented as the primary identifier for campus hosted applications and services. Efforts to optimize StarID as it relates to such items as account management and third-party services are underway.

Goal 6: Develop a comprehensive information security plan that takes into account such factors as: a) MnSCU information security policies, procedures and guidelines; b) FERPA & HIPAA regulations; c) Payment Card Industry (PCI) requirements and d) results of the MnSCU Information Security Assessment Program conducted in 2007-2008 and the 2013 MnSCU Vulnerability Management Initiative.

Development of the comprehensive plan is in a conceptual stage. In the interim, compliance efforts with the numerous federal, state and MnSCU system requirements, policies, procedures

and guidelines are ongoing. Significant efforts were conducted during FY 14 to comply with requirements from the MnSCU Vulnerability Management Initiative.

Goal 7: Formalize Disaster Recovery & Business Continuity processes

Objective 1: Initiate a series of discussions among SMSU ITS staff to identify potential scenarios (e.g., weather events, pandemic) that could negatively impact ITS operations and current gaps in SMSU ITS's ability to maintain services.

Discussions contemplated have not been formally initiated. However, steps previously taken (i.e., shared generator project) have proven to limit impact on ITS operations of weather events that impact campus electrical outages and even planned outages.

Objective 2: As a result of the scenario Identification and subsequent gap analysis, develop specific action plans to mitigate gaps in ability to recover from disasters and/or maintain business continuity.

Pending Objective 1.

Strategic Direction #3 -- A clearly understood, customer-service oriented and agile information technology services organization.

SMSU ITS will continue to pursue strategies and steps that are customer-service focused, ensure responsiveness to University needs, and successful completion of projects. Special emphasis will be given to making SMSU ITS more transparent to the University community.

Goal 1: Implement strategies that enhance the transparency and visibility of SMSU ITS organization and services.

Objective 1: Develop and make available documentation, including organization charts and workflow diagrams, which guide the University community on steps and processes to follow for such items as using specific services, getting the quickest support on specific services and how to initiate project requests.

Some progress has been made toward this objective. Examples include posting of the Strategic Plan and the ITS organizational chart on the ITS web site. A new ITS organizational structure was also implemented July 2014 to assist with transparency. The ITS web site is also undergoing a major restructuring to ease access to information regarding ITS services. Efforts conducted over the years to publicize the Technology Resource Center as the "front door" to ITS has largely been successful. Items such as workflow diagrams and project request processes are still in conceptual stages.

Objective 2: Develop a SMSU ITS Services Catalog.

In conceptual stage. An ITS Services Awareness Survey is in development as a steppingstone to a full catalog.

Objective 3: Develop, publicize and conduct SMSU ITS services awareness programs for interested constituencies. Consider utilizing the “speed dating” model utilized for Faculty Development Day in August 2012. Potentially incorporate into the Departmental Consulting Program (See Strategic Direction 4, Goal 1, Objective 1).

In conceptual stage.

Objective 4: Continue to use the SMSU ITS web site, and additional tools highlighted under Strategic Direction 1 Goals, to promote and publicize ITS services, policies and operational procedures.

ITS has been more aggressive about using its web site as a news site for ITS services/updates. Also, a twitter account has been created for posting information.

Objective 5: Develop and publicize an SMSU ITS Help Desk “priorities statement”.

In conceptual stage.

Objective 6: Investigate the feasibility of implementing tools (e.g., dashboards) that can be utilized to provide clients updates on the status of SMSU ITS projects and initiatives.

In conceptual stage.

Goal 2: Enhance agility of SMSU ITS to meet continuously changing client needs and enhance customer service for the SMSU community.

Objective 1: Develop survey instruments to assess current and ongoing levels of customer satisfaction with SMSU ITS services. Levels of customer satisfaction identified shall include satisfaction with current services and identification of any gaps among services provided and services desired.

As indicated above, an “ITS Services Awareness Survey” is in development for a planned Fall 2014 release. A further objective of this survey is to gauge levels of customer satisfaction. Initial focus will be on faculty/staff. A later survey for students is also planned. A review of other tools that can be used for longer term satisfaction survey instruments such as the Tech Qual survey tool or potential MnSCU systemwide products will also be conducted.

Objective 2: Review results of assessments and implement initial steps (e.g. analysis of new service options, professional development plans for staff) focused on addressing any areas of concerns that are highlighted.

Pending completion of Objective 1 above.

Objective 3: Research the practicality and viability of using “service level agreements” to support specific services in place for individual constituencies and departments.

Under review. Examples that could be followed are SLAs implemented by SHOT for networking services and MSU, Mankato’s Image Now services SLA.

Objective 4: Investigate the value of implementing extended hours for SMSU ITS support beyond current levels in light of budgetary restrictions.

No action at this time. Limited demand to date.

Objective 5: Research strategies and implement activities (e.g., routine discussion sessions with full-time staff, specific training programs) that improve the technology and customer services skills of SMSU ITS student workers.

The Technology Resource Center Manager holds routine meetings with student workers to update them on support techniques for new services (e.g., Office365 Pro Plus) and changes to new services. In addition, specific trainings on new tools/techniques are conducted by other staff (e.g., workstation deployment in SCCM environment). Plans exist to enhance frequency of sessions between IT student workers and full-time staff to focus on key issues resolution.

Objective 6: Evaluate the value of adopting widespread IT service management strategies (e.g., ITIL) within SMSU ITS.

ITS participated in a MnSCU wide survey of institutional IT department service management requirements. The survey results were used to develop a MnSCU system RFP for qualified Information Technology Services Management (ITSM) products for adoption by MnSCU ITS and individual institutions if desired. Such a potential systemwide service will support shared services among institutions.

Objective 7: Continue existing internal departmental initiative to fully adopt Kablink as a multi-purpose tool to support such key operations needs as documentation management, project management, and change management.

Kablink has been adopted as the repository for internal documentation management. Its use for project management and change management is evolving. To date, the service has been used to support a limited number of projects.

Objective 8: Implement a process to annually review SMSU ITS staff position descriptions and update the position descriptions to the extent possible to help support addressing unmet needs.

The process is in place in conjunction with the Annual Performance Review process. In FY 2014, three position descriptions were rewritten. One new position description was written pursuant to a retirement. Several other positions have been identified as targets for revision in FY 15. Two PDs have been identified as priorities.

Strategic Direction #4 -- Support for tools and processes that enable increased efficiency and innovation across all areas of the University.

As higher education faces the dual challenges of increasing competition and increased demands for accountability and efficiency, the SMSU community will need access to resources and expertise that support individual and collective efforts that make the University more effective in meeting strategic priorities.

Goal 1: Expand scope of existing feedback channels to ensure that as wide as a net is cast to identify the University community's service needs and business process enhancement opportunities.

Objective 1: Develop a Departmental Consulting program that includes routine meetings with academic and administrative departments. These meetings would be focused on identifying 1) training & support needs for existing services, 2) satisfaction with current SMSU ITS services, 3) currently available solutions that can meet needs, and 4) gaps between desired and existing services.

Limited progress has been made with the Departmental Consulting program to date. Program initiation is a focus for FY 15. However, it is important to note that an example of this program was initiated with the Administrative Assistants group in FY 14. ITS staff attended several Administrative Assistants group meetings during the year. This participation led to the development of some targeted training activities by ITS staff on using Microsoft Excel software to work with and interpret student data available from Data Management. Also, a specialized smartboard training was provided for the English Department. It is anticipated that the ITS Services Awareness Survey previously identified will be a useful instrument to support the program.

Objective 2: Promote the availability of SMSU ITS staff to participate in constituent group meetings on campus technology services and needs.

As indicated above, some progress in this area has been made. However, further promotion is needed through available channels.

Goal 2: Develop and implement strategies that enhance the SMSU community's ability to fully utilize mobile devices in teaching, learning, work and recreational activities.

Objective 1: Develop a "Mobility Lab" that supports faculty desiring access to the tools that can support integrating mobile devices into teaching and learning.

The Mobility Lab was implemented during FY 2014. It is located in IL 218. The Lab is fitted with an iPad cart, 15 iPads, an Apple TV system and a projector/smartboard. ITS staff worked with faculty to acquire an initial set of "desired apps". Heaviest use of the Lab has been by the Education faculty and their "pre-service" students. The Lab was also used to support a training session of regional K-12 and post-secondary educators in June 2014.

Objective 2: Perform an assessment of existing capacity, current plans and future needs for the University's wireless network infrastructure to ensure that the University community's needs for wireless capacity are met for the foreseeable future (See Strategic Direction 2, Goal 4). Options for future infrastructure enhancements that should be considered include partnerships with wireless network service providers.

As indicated under the Strategic Direction 2, Goal 4 status notes, significant work has happened in regards to the University's wireless network infrastructure. These activities have included a wireless site survey and the securing of funding for numerous network projects.

Objective 3: Initiate discussions with appropriate service units (e.g., Business Services, Web Services) to identify service strategies, policies and procedures that position the University to be a "mobile device friendly" institution.

ITS continues to support Web Services (Communications & Marketing) in its efforts to make the SMSU web site mobile friendly. Limited development of unique SMSU web apps has occurred to date—in part due to an unfilled vacancy in Web Services for much of FY 14 (a new Web Designer started in April). Several external initiatives in this area are being monitored including 1) an initiative by the SMSU Computer Science Department to support a mobile app development service and 2) MnSCU efforts to develop e-services mobile apps.

Goal 3: Build the capacity to effectively support the ability to provide systems and tools which can lead to enhanced business processes across the University.

Objective 1: Research methods utilized by peer institution ITS departments to provide a framework for building systems and tools (e.g., e-forms, automated workflows, collaboration tools, web applications) that support enhanced business processes at their institutions.

Formal research of framework options not initiated to date.

Objective 2: Determine an optimal technical direction for SMSU to pursue as its framework technology(s) for supporting development of business process enhancement tools that takes into account factors unique to SMSU such as tools and services already in use (e.g., ISRS, Image Now).

Pending Objective #1

Objective 3: Identify new staffing needs and/or training needs for existing staff to address existing gaps between SMSU ITS staff capabilities and the University's business process enhancement needs.

Pending other Goals/Objectives. However, previously identified staffing needs generally continue to be valid. Staff training continues per internally determined requirements to support effective ITS operations.

Objective 4: Contingent upon completion of Objectives 2 and 3, develop a plan and budget for securing the capacity (e.g., hardware, software, staffing, skills, vendor partnerships) needed.

Pending completion of above objectives.

Objective 5: Begin implementation of capacity development.

Pending completion of above objectives.

Goal 4: Investigate the expanded use of vendor provided “cloud based” services or emerging “MnSCU wide shared services” for University community utilization.

Objective 1: Complete migration of e-mail, calendaring, collaboration and storage services for students from the Microsoft Live@Edu platform to Office 365.

Completed in early FY 2014. Service has since been expanded to include the Office 365 ProPlus service which provides currently enrolled students access to free Microsoft Office products.

Objective 2: Develop a recommendation, pursuant to Attorney General’s Office action, regarding transitioning faculty and staff to Office 365 as soon as summer 2014 for a similar scope of services.

During FY 14, the MnSCU Office of General Counsel authorized use of Office 365 e-mail and calendaring services for faculty and staff provided certain provisions were adhered to (e.g., legal hold capabilities). However, ITS determined to upgrade current SMSU ITS hosted e-mail & calendaring services in May rather than initiate Office 365 e-mail & calendaring services at this time. In the meantime, ITS will monitor initial deployments among other MnSCU institutions and MnSCU system office plans to implement Office 365 e-mail & calendaring services as part of future planning. Research has shown that steps taken by SMSU ITS in May would be a required precursor to an Office 365 deployment for faculty and staff.

Objective 3: Develop a recommendation on whether or not to pursue “software as a service” options available for students, faculty and staff made available as part of expanded Office 365 options.

As indicated above, SMSU ITS has made the free Office 365 Pro Plus program for students in the past year. SMSU ITS is currently evaluating whether or not the University should purchase Office 365 licenses for faculty and staff for software products such as Microsoft Office independent of a decision to use Office 365 for faculty/staff e-mail & calendaring services.

Objective 4: Explore options for unique cloud based services that departments can utilize modeled on the “off-site back-up” solution used by Communications & Marketing for the “Photo Server”.

ITS has supported several departments in their adoption of cloud-based services during the past year. This process has included the start of an initiative to conduct legal reviews of proposed

contracts or terms of service agreements in order to ensure that Minnesota statutes, MnSCU policies and FERPA rules and regulations are addressed. This process includes legal counsel from the Minnesota Attorney General's Office or the MnSCU Office of General Counsel.

Objective 5: Continue full participation in "MnSCU Shared Services" discussion underway among the MnSCU ITS community.

Until it was sunset in the middle of FY 14, the CIO was a full participant in the MnSCU ITS Shared Services Delivery Strategy Workgroup. Participation in individual shared services conversations continues including initiatives with systemwide focus (e.g., service management platforms) or groups of institutions.

Goal 5: In conjunction with the Departmental Consulting Program (Strategic Direction 4, Goal 1, Objective 1), conduct routine evaluations of core business processes used across the University to identify areas for innovation & efficiency, including campus wide collaborations. Examples of recent initiatives include the common Multi-Functional Device program and the expansion of a student worker time clock management solution.

Generally in conceptual stage. However, opportunities that arise (e.g., Marco Managed Print Services) are evaluated and pursued if deemed worth pursuing by multiple departments.

Goal 6: In conjunction with Web Services, investigate the feasibility and value of implementing a robust single sign on Web Portal as core platform for university-wide e-tools and e-processes.

Objective 1: Assess the marketplace of web portal solutions commonly in use across higher education.

Not initiated. Currently continue to use homegrown Southwest Net as a limited portal.

Objective 2: Identify staffing and other technical expertise needed to effectively implement and maintain a robust web portal.

Per Objective 1 above--not initiated.

Goal 7: Develop a Business Intelligence test environment that can be used to enhance access for administrators, faculty and staff to actionable information to support decision-making processes.

Objective 1: Develop the technical infrastructure that can be used to support BI testing.

Discussions continue among staff on infrastructure considerations that could enhance readily available access to information that supports decision-making processes. Such a new

infrastructure would build upon current systems in place such as ISRS and the “super tables” developed by Data Management/IR staff. In addition, evaluations of such tools as the Blackboard BI service implemented by MSU, Moorhead and internally developed systems in place at St. Cloud State and Winona State continues.

Objective 2: Provide training for key SMSU ITS staff on such concepts as data warehouse development, database administration and reporting tools and services.

During FY 14, ITS data management staff attended trainings on data warehouse development, reporting tools and services and SQL programming. Plans for database administration skills training are in progress.

Goal 8: Continue to leverage the University’s membership in SHOT to deploy communications tools that can enhance instruction and productivity.

Faculty and staff continue to increase their use of SHOT’s web conferencing service—Adobe Connect. Use of the joint MnSCU/SHOT online media management tool—Kaltura is also growing. The Jabber desktop video service has had some limited adoption. Another service in pilot stage—Acano Video Meeting Rooms—is also getting some use.