SOUTHERN UNIVERSITY AT SHREVEPORT

FIVE-YEAR INFORMATION TECHNOLOGY STRATEGIC PLAN

2007-2011

TABLE OF CONTENTS

| INTRODUCTION | . 3 |
|--|-----|
| TECHNOLOGY STRATEGIC PLAN | . 3 |
| Banner Student Information Systems | . 3 |
| SUSLA Website and Web-Based Services | .4 |
| Campus Technology Upgrade/Replacement Program | .4 |
| Electronic Classrooms and Smart-Media Technology | .4 |
| User Support Services | .4 |
| Business Survivability and Disaster Recovery Readiness | .4 |
| Campus Security and Emergency Preparedness | . 5 |
| Technology Support Personnel Requirements | . 5 |
| In-Service Computer Literacy Trainings | . 5 |
| Technology Support Personnel Development | . 6 |
| STRATEGIC GOAL and OBJECTIVES | . 7 |
| | |

INTRODUCTION

The University activity referred herein as **INFORMATION TECHNOLOGY (IT)** provides support services through a centralized operation, focusing on activities related to technology implementation, applications computing, network-telecommunications, and inservice support to facilitate incorporation and use of technology. Information Technology Center (ITC) is directly responsible for technology implementations and computer-related services to support academic, administrative, managerial, and operational functions of the university. The unit develops strategic initiatives and systemic approaches to integration and use of technology, and measures and leverages the University's investment in technology. ITC provides technical services to support client-server computing needs of end-users on the main campus and the two ancillary sites at Downtown Metro and Airport locations. The unit assists user departments in acquiring hardware and software to ensure upward compatibility with existing infrastructure; and provides in-service training to assist faculty, staff, and students in using technology to facilitate the teaching-learning processes. The overall functions of the IT unit are essential to the University's development and fulfillment of its mission to prepare students for a good education, and a competitive edge in today's economy that is increasingly driven by technology.

TECHNOLOGY STRATEGIC PLAN

The ITC unit actively supports the University mission through expansion of technology services to support instruction and the SUSLA community. Specific activities to be pursued in the 2007-2011 funding cycle are in conjunction with the university technology strategic plan which is enumerated herein. It should be noted, however, that the completion of many of these tasks will be contingent upon adequate funding.

Banner Student Information Systems

The Banner Student Information Systems (SIS) applications offer a variety of webbased benefits to support academic and administrative functions of the university. The continued implementation of Banner will provide for greater efficiency and end-to-end integration of academic and functional processes within the university community (Academic, Fiscal Affairs, Financial Aid, etc.). Students will be able to apply for admissions and register online; add and drop classes; view grades, transcripts, and financial-aid information; and conduct variety of transactions over the Internet. Faculty will have the capabilities to advise students online and post grades via the web.

• SUSLA Website and Web-Based Services

The SUSLA home page has been in place since 2003 and needs to be redesigned. The proposed facelift will reflect current standards in webpage design and allow for easier navigation. Faculty, students, prospective students, and clients will be able to access web-based resources more readily. It is important that SUSLA provide improved services via enhanced web presence and optimum support for Blackboard and similar web-based applications.

• Campus Technology Upgrade/Replacement Program

Technology must remain relatively current in order to be effective. There are many areas of existing infrastructures that would be assessed and replaced on a regular basis to ensure the University is current in technology. The servers running enterprise applications (Banner, Oracle, BlackBoard, eMail, etc.) are more than five years old, more than the industry rule-of-thumb of three (3) years average. Aging network-telecommunications backbone gears interconnecting several buildings and facilities will have to be phased out and replaced. ITC suggests a separate line item in the budget for the purpose of retiring equipment in a three-year cycle.

• Electronic Classrooms and Smart-Media Technology

Even though remote learning is becoming more prevalent today, it is still important to make optimal use of the rooms themselves. It is likely that the future will demand that all teaching and learning is done through technology-enabled methodology. ITC will continue to equip an increasing number of classrooms for multimedia presentation and access to the campus network to allow for technology-enabled instruction.

• User Support Services

ITC will establish Technical Service-Desk to provide "first responder" troubleshooting assistance to various end-users problems. The Technical Service-Desk staff will provide Just-In-Time (JIT) technical services, create trouble tickets, proactively monitor service tickets, escalate tickets as needed, and ensure tickets and service calls are handled within appropriate service level timeframes. This will result in improved deliverable support services campus-wide.

Business Survivability and Disaster Recovery Readiness

The past several years have been remarkable across the nation for the increase in the number of earthquakes, hurricanes, floods, terrorist attacks, fiber cuts, and power outages that have disrupted services. It is imperative that a disaster recovery plan for network-telecommunications and computing infrastructure is in place to ensure

business continuity, in times of unforeseen "Acts of God" such as hurricane Katrina. ITC will embark on creating a remote hot-site facility to host enterprise database and applications.

• Campus Security and Emergency Preparedness

Besides support for teaching and learning, there are urgent needs for technology to accommodate increasing security concerns on campuses across America, especially in the light of the recent massacre at Virginia Tech University. Moreover, in the aftermath of hurricane Katrina, rapid dissemination of vital information is akin to the university constituents safety, well-being, and in support of the State of Louisiana initiative on post-Katrina Disaster Readiness and Emergency Preparedness. ITC plans to expand the university networked video surveillance systems, as well as the Axis-TV Multi-Digital Messaging System to enable dissemination of critical and general services information instantly on multiple display panels across the three campus locations. Instant messaging push technology will need to be implemented to enable essential information to be simulcast in real-time and on multiple platforms to constituents in case of emergencies.

• Technology Support Personnel Requirements

The explosion of LANs, desktop computers, file servers, and the use of networks have caught many organizations off-guard in dedicating the necessary support to keep networked resources available. Staffing for this level of support is both difficult and costly. An industry rule of thumb is one full-time equivalent (FTE) support person for every 40 to 50 workstations, where it is generally assumed that each user has his/her own dedicated desktop computer. This rule can be further broken down into approximately one full-time equivalent LAN administrator to every 100 workstations for the connectivity infrastructure (e.g. wiring hubs, bridges, routers, and gateways). With only one FTE support person, this level of support will require an increase in staffing in the Information Technology Center to meet the industry standard and increasing workloads.

• In-Service Computer Literacy Trainings

ITC will continue to provide technology-training workshops and faculty development services in order to improve effectiveness in the classroom. The in-service support will greatly promote the use of technology. The following is a list of planned trainings to position faculty, staff, and students to become familiar with common software and classroom technologies:

- > Banner Web and Internet-Native Banner (INB) Navigation
- BlackBoard Learning Systems
- Operating Systems (Windows Vista/XP)
- > Word processing (Microsoft Word, MS Works, WordPerfect)
- Presentation software (MS PowerPoint)
- Spreadsheet (Microsoft Excel, Lotus)
- E-mail (Microsoft Outlook)
- Internet/Web browser (Internet Explorer, Netscape)
- Web publishing

• Technology Support Personnel Development

Just as important as providing training for faculty is the need for appropriate and purposeful training of the technology support staff. Technology tasks such as database programming and computer networking are so critical and complex that the University could face delays and wasted effort while support staff attempt to solve problems that they are unequipped to address. ITC will require in-service development of Support personnel via professional conferences and trainings, in order to remain technically vital to support the university technology infrastructures.

A summative analysis of the university strategic technology plan indicates the needs for continued advances in the upcoming 2007-2011 funding cycle to support the university operations. Besides support for teaching and learning, technology infrastructure will have to be upgraded to accommodate increasing security concerns on campuses across America and unforeseen "Acts of God" in the aftermath of hurricane Katrina. Major technology activities will include enhancements and expansion of the university network-telecommunications infrastructures, Client-Server computing, and continued implementation of Banner Student Information Systems (SIS) applications for greater efficiency and end-to-end integration of academic and functional processes within the university community (Academic, Fiscal Affairs, Financial Aid, etc.). Students, faculty, and staff will use combinations of these technologies for university-level coursework, interact with each other, access and receive vital information, and learn anywhere anytime.

Moreover, ITC will continue to provide technology-training and faculty development services in order to improve effectiveness in the classroom. The in-service support for faculty will greatly promote the use of technology, since teachers are charged with the responsibility of expanding students' knowledge and improving their educational experiences.

STRATEGIC GOAL and OBJECTIVES

The Information Technology Plan shall be guided by the following goal, objectives, and strategies:

- Provide latest technology advancements to support administrative and academic functions of the University. The realization of this goal will encompass the following specific objectives:
 - 1.1. Develop and implement Enterprise Resource Planning (ERP) applications and Database solutions for greater efficiency and integration of institutional processes. Specific tasks will include:
 - 1.1.1. Continued implementation of SunGard Higher-Education (SGHE) Banner ERP Component Systems applications
 - 1.1.2. Continued implementation of Oracle Enterprise Relational Database Management Systems (RDBMS) to support Banner ERP Systems applications

1.2. Enhance and extend technology infrastructures to support the instructional, research and learning activities of faculty, staff, and students. Specific tasks will include:

- 1.2.1. Implementation of digital Voice-Over-IP (VoIP) telephony services to provide enhanced communications to the university community
- 1.2.2. Implementation of Louisiana Optical Network Initiative (LONI) to provide students and staff high-speed access to the Internet
- 1.2.3. Implementation of Metro-Ethernet (ME) network to interconnect the main campus and the ancillary sites Downtown Metro and AeroSpace Centers
- 1.2.4. Implementation of Secure Wireless LAN (wLAN) services to facilitate access to online resources and the Internet
- 1.2.5. Expand networked Security Camera Surveillance System and the Axis-TV Multi-Digital Messaging System to facilitate campus security and emergency preparedness
- 1.2.6. Upgrade classrooms with Instructional Smart-Media technology and access to the Internet

1.3. Develop and implement Business Survivability and Disaster Recovery **Process (DRP) to ensure continuous operation.** Specific tasks will include:

- 1.3.1. Establish an off-campus DRP Data Center at a remote location
- 1.3.2. Enhance contingency backup procedures for critical databases and applications

1.4. Develop and implement a comprehensive master plan to address infrastructure maintenance and improvements. Specific tasks will include:

- 1.4.1. Revise and implement process for personal computer purchases, upgrade, and replacement
- 1.4.2. Revise and implement process for infrastructure equipment (servers, network-telecommunications, telephony, video-conferencing etc) acquisition, upgrade and decommissioning to ensure efficient operations
- 1.4.3. Establish adequate maintenance service contracts for technology infrastructure
- **1.5.** Provide in-service technology support to increase opportunities for student access and success. Tasks will include:
 - 1.5.1. Develop and provide in-service technology workshops for faculty, staff, and students
 - 1.5.2. Establish Technical Service-Desk to facilitate user support services

1.6. Ensure quality and accountability in technical service delivery, performance, personnel, and results. Specific tasks will include:

- 1.6.1. Attend professional conferences and workshop trainings to upgrade technical skills and remain abreast of changes in technology
- 1.6.2. Implement an incremental equity compensation based on SREB/CUPA averages to improve staff retention
- 1.6.3. Increase technical staff workforce to meet workload
- 1.6.4. Conduct annual Performance-Based Evaluation for technical staff