PROJECT SUMMARY

Overview

Overall, Texas A&M University has processes and controls in place over the University Libraries to provide reasonable assurance that resources are used efficiently and effectively and in compliance with laws, policies, regulations, and University rules. There are opportunities to improve controls over information technology and Cushing Library collections. Conducting building evacuation drills and student worker evaluations are additional areas with opportunities for improvement.

University Libraries is comprised of five libraries that house over four million books, 238,000 maps, 87,000 journals, and 826 databases. The University Libraries’ budget is approximately $31 million.

Summary of Management’s Response

Libraries management agrees with the recommendations included in the audit report. Efforts are currently underway to implement the recommendations.

Scope

The review of the University Libraries focused on the areas of financial operations, inventory, information technology, and human resources. Activities related to these areas were reviewed for the period of September 2008 to February 2010. Fieldwork was conducted from November 2009 to February 2010.
OBSERVATIONS, RECOMMENDATIONS, AND RESPONSES

1. Disaster Recovery Plan Testing

Observation

Testing of the University Libraries’ disaster recovery plan is not taking place on a regular, scheduled basis. Disaster recovery plan testing is important to validate that the disaster recovery plan will work to limit disruptions and ensure availability of library information resources for the University.

Under a memorandum of understanding agreement, the Computing and Information Services (CIS) department is responsible for the University Libraries’ server hosting and backup of data services. However, the agreement does not specify roles and responsibilities for disaster recovery testing. The agreement also does not include metrics such as expected recovery time or prioritization of recovering the University Libraries’ information systems with other information systems within the CIS machine room.

Texas A&M University Standard Administrative Procedure (SAP) 29.01.M1.32, Information Resources - Disaster Recovery Planning, requires disaster recovery plan testing on an annual basis.

Recommendation

Conduct scheduled testing of the University Libraries’ disaster recovery plan. Document the results in accordance with University SAP 29.01.M1.32. If relying on CIS for this service then develop and coordinate with CIS disaster recovery plan testing which specifies roles and responsibilities including expected recovery time objectives.

Management’s Response

Working in conjunction with CIS, Evans Library will update its disaster recovery plan to include newly deployed services in accordance with the recommendation. The updated plan will include a schedule for regular tests of the plan as well as clearly identifying roles and responsibilities for personnel responsible for executing the plan. All updates will be completed by the end of the first quarter, fiscal year 2011.
2. Administration of Server Patches and Passwords

Observation

In our review of two of the 27 servers at the University Libraries, we noted some opportunities to enhance security over the servers. The tool used for server security patch management on the Solaris server that we tested was not configured to update patches on a timely basis. As a result, two of 14 security patches reviewed were not installed. Unpatched vulnerabilities could allow for a penetration vector that a malicious person, virus, or worm could take advantage of and thereby compromise the system. The Solaris server also did not have appropriate local password rule enforcement mechanisms in place to enforce expected passwords rules in accordance with the departmental policy.

University SAP 29.01.99.M1.20, Information Resources – Server Hardening, states that system administrators shall ensure that vendor supplied patches are routinely acquired, systematically tested, and installed promptly based on risk management decisions.

University 29.01.99.M1.14 Information Resources - Password/Authentication, states that strong passwords must be used on servers that are mission-critical and/or maintain mission-critical information.

Recommendation

Strengthen server patch management by developing, documenting, and implementing a process to regularly verify installed package revisions versus what is available (e.g. at least vetting installed package versions against those that address published vulnerabilities).

Strengthen server password security by enforcing password rules that meet or exceed appropriate organizational policy criteria across all systems and periodically testing for compliance where password rule enforcement mechanisms are available.

Management’s Response

The Libraries employs automated patch management software. This software was updated and now provides weekly notices of patches and updates. Staff will review these updates, plan, act and note accordingly.
2. Administration of Server Patches and Passwords (cont.)

A review of all passwords used in systems administration has been completed with all passwords being changed to strong passwords as specified by University SAPs. Additionally, these applications are being migrated to the Active Directory domain where group policies enforce password management that complies with all aspects of the University SAP. Completion is expected by the end of the fourth quarter, fiscal year 2010.

3. Monitoring Software for Unauthorized Use

Observation

Software at the Medical Sciences Library is not being monitored for unauthorized use.

The installation of software is controlled within the University Libraries by limiting user rights for all units except the Medical Sciences Library (MSL). The 48 users at the MSL have administrative rights to install software on their computers without supervisory oversight, such as prior approval or other monitoring controls, which increases the risk of unauthorized software on MSL workstations. A&M System Regulation 29.01.02, Use of Licensed Commercial Software, states that only appropriately licensed software may be placed on computing resources.

Recommendation

Strengthen the controls over software installation at the MSL to ensure that only authorized software is installed on computers. Evaluate the use of administrative user accounts at the MSL based on prudent information security management decisions.

Management’s Response

Systems in use in MSL will be managed like all other machines in the Libraries. As a rule, administrative privileges will be removed and granted only to personnel with a demonstrated need to have such privileges. For units that will have the elevated privileges, regular reviews will be conducted to ensure all installed software is appropriate for the system and is properly installed and licensed. These changes are being implemented as part of the transition to Active Directory and will be completed by the end of the fourth quarter, fiscal year 2010.
4. Accounting for Cushing Library Collections

Observation

Accounting for the Cushing Library collections is not consistent with accounting standards and other requirements.

Procedures in effect for the accounting of the Cushing Library’s collections are not consistent with accounting standards and other requirements regarding inventory, asset valuation, and recording in official accounting records.

The Cushing Library currently does not certify its inventory on an annual or other regular basis in accordance with University and System Property Management requirements. State Property Accounting Policies N.005 and System Regulation 21.99.05 Fixed Asset Management, both require an annual inventory of capitalized assets. The Cushing Library has limited personnel to physically verify inventory on an annual basis.

There is a lack of documented inventory procedures and inventory records for the Cushing Library’s rare book collections which had a recent appraised value of $27.6 million. Not having documented procedures may result in loss, damage or theft of items without timely detection.

Twenty of 30 major Cushing Library collections are not captured on official accounting records in the Financial Accounting Management System (FAMIS) as capital assets. These collections were acquired over an extended period of time and the value of many collections was unknown when acquired and were not entered in the official accounting records as capital assets. Governmental Accounting Standards Board Statement (GASB) 34 states governments should capitalize works of art, historical treasures, and similar assets at their historical cost or fair value at the date of donation (estimated if necessary) whether they are held as individual items or in a collection.

Also, while the physical security of the collections is strong with respect to protection from outside patrons, approximately nine staff and faculty members have 24-hour access to the Cushing Library collections which increases the risk of loss or theft.

Recommendation

Improve accounting controls over the Cushing Library collections by creating detailed procedures on acquiring new inventory, certifying existing inventory, and documenting the execution of the certification for all Cushing Library rare books and other collections.
4. Accounting for Cushing Library Collections (cont.)

Additionally, develop a procedure to value assets in compliance with GASB 34, State Property Accounting Policies, University and System Property Management, and subsequently, enter assets at those determined values into FAMIS.

To enhance current security, consider reducing the number of staff and faculty that have 24-hour access to the Cushing Library building. In addition, consider consulting with security experts to identify opportunities to strengthen the current security mechanisms and procedures. Review alarm disabling report records on a regular basis, document the review process, and maintain the reports and results after each examination.

Management's Response

The Cushing Library is compiling existing procedural documents into one operational manual. The manual will include procedures regarding the gift acceptance policy, acquisition and valuation of assets, security of assets, inventory control and certification, and records management and retention. Additionally, Cushing Library will work with University and System Property management personnel to develop procedures in line with GASB 34 and state policies to value, capitalize, and record historical treasures or similar assets in accounting records. These procedures will be included in the operational manual. All aspects of the manual, with the exception of inventory control and certification, are expected to be completed by November 30, 2010. All aspects of inventory control and certification are expected to be completed by May 31, 2011.

Weekly alarm disabling reports provided by the alarm company will be reviewed on a regular basis. The current security mechanisms, including staff and faculty access to Cushing, will be reviewed for improvement opportunities. Estimated completion date is the end of the first quarter, fiscal year 2011.

5. Evacuation Drills

Observation

Evacuation drills are not being conducted on a regular basis.

Evacuation drills have not been scheduled at the University Libraries since fiscal year 2006. Without scheduled fire drills, an evacuation due to an actual emergency may not be conducted in an efficient or effective manner, resulting in an increased risk of injury. The University Health and Safety Manual states that to ensure that building occupants are prepared for an emergency evacuation, drills must be conducted on a regular basis.
5. Evacuation Drills (cont.)

**Recommendation**

Conduct evacuation drills on a regular basis at all library facilities.

**Management’s Response**

The Libraries will perform evacuation drills twice a year. These drills will be coordinated with Environmental Health and Safety. The first round of drills was completed in January 2010. We plan to schedule the next drill for late August to early September 2010.

6. Student Worker Evaluations

**Observation**

Written evaluations are not performed and discussed with student workers, except at the Medical Sciences Library. Without formal evaluations, the student may not be aware of his or her job-related strengths and weaknesses in order to build on the strengths or correct the weaknesses.

According to Texas A&M’s *Guide for On Campus Supervisors of Student Employees*, evaluations are a necessary and an important part of the employment experience. Additionally, the Guide states that it is important for student employees to experience the evaluation process, so that they might learn from it and modify their future performance.

**Recommendation**

Consider conducting evaluations for student workers. Take into account the complexity of job duties and level of supervision in determining student workers who would most benefit from a structured evaluation on a periodic basis.

**Management’s Response**

The Libraries consulted with the Student Employment Office within Student Financial Aid on April 28, 2010. We plan to explore the use of student evaluations with their assistance. The goal is to find an effective and efficient method for performing evaluations for the approximately 350 student workers per semester using the newly released (April 2010) “The Super Manual: A Guide for On-Campus Supervisors of Student Employees” as a guide. Consideration will be given to position duties, number of employees per supervisor and tracking of evaluation status. Process planning and form development will occur during summer and fall 2010. Training and
6. Student Worker Evaluations (cont.)

Implementation of student worker evaluations is expected to begin during the spring semester with complete implementation completed by the end of the fourth quarter, fiscal year 2011. This timeframe takes into account the time to create an acceptable evaluation form and process and to educate supervisors and student workers regarding the process.
BASIS OF REVIEW

Objective

Review and assess the University Libraries’ controls and processes to determine if resources are used efficiently and effectively and in compliance with laws, policies, regulations, and University rules.

Criteria

Our audit was based upon standards as set forth in the System Policy and Regulation Manual of the Texas A&M University System and other sound administrative practices. This audit was performed in compliance with the Institute of Internal Auditors’ “International Standards for the Professional Practice of Internal Auditing.”

Additionally, we conducted this performance audit in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

Background

The University Libraries is a customer service organization. Their mission is to support effectively the teaching, research, and outreach missions of the University through leadership in acquiring, managing, and delivering information in an environment that fosters learning and inquiry. The digital area has grown dramatically in recent years, as they have computerized more processes and more of their collections are in electronic form. Texas A&M is a founding member (along with the University of Texas, the University of Houston, and Texas Tech University) of the Texas Digital Library. The University Libraries is a member of the Association of Research Libraries (ARL). Through an ARL grant, it helped develop LibQUAL+. LibQUAL+ is an assessment tool used to identify services which can be improved, or new services needed, to meet the user’s needs and has been adopted by other institutions of higher education.
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