

UC DAVIS REPORT TO INFORMATION TECHNOLOGY LEADERSHIP COUNCIL

Jan. 31-Feb. 1, 2006

VP-IET Recruitment. In September, the Office of the Chancellor launched the recruitment for a permanent Vice Provost for Information and Educational Technology. This key senior position reports to the Provost and Executive Vice Chancellor and has primary responsibility for providing leadership to assure effective, strategic, and secure deployment of information and educational technology for the Davis campus. The first two candidates have been selected and will meet in late January-early February with the IET management team, key campus management and IT advisory groups, IET staff and interested members of the campus community.

CAMPUSWIDE TECHNOLOGY INITIATIVES

Progress Report on Campus Strategies and Vision. This Fall, the UC Davis Strategic Plan entered its third year as a guiding document for planning, actions, and decisions throughout the campus. Assessing progress on a regular and ongoing basis continues to be a critically important part of the strategic plan. To meet this goal, the campus issued its "Year Two" Progress Report in November. This report captures major advances and outlines ongoing programs in support of campus strategies and priorities, and in some cases features a discussion of the metrics that are being used to measure progress in advancing the strategies. This year again, IET contributed a rich narrative summary of implementation efforts in support of "providing the physical facilities, information resources and technology infrastructure necessary to achieve national and international distinction and leadership in learning, discovery, and engagement" (strategicplan.ucdavis.edu/2005_framework_4.html).

High-Performance Scientific Computing. In October-November, IET conducted a survey among faculty to identify the existing demand for high performance computing and to determine the most reasonable and efficient way for the campus to accommodate increasing demand. The survey confirmed that, like many other institutions, UC Davis is facing a number of challenges introduced by the burgeoning appetite for high-performance computing resources, a demand that is outgrowing the existing Data Center and other associated space. There are approximately 1900 cluster nodes in place on campus or through collaborative use at remote facilities. This need is projected to increase by over 168% to approximately 5100 nodes by 2010. The increase in data storage requirements is projected to be even more staggering – from ~ 300 terabytes to 13 petabytes, an increase of over 4,200%. In addition, many of the existing cluster spaces are inadequate in terms of square footage, security, air conditioning, and electrical perspectives and will require extensive renovations. To address these challenges, Interim Vice Provost Peter Yellowlees is proposing, in close collaboration with the Center for Computational Science and Engineering, the development of a High Performance Computer Data Center (HPCD). This proposal is being vetted with various campus groups.

Learning Management System. Working with the Schools of Medicine and Veterinary Medicine, IET is coordinating a campus initiative to implement its version of Sakai. A pilot with selected courses was launched in Fall 2005 in the School of Medicine, and in early January the project team kicked off a campus pilot involving faculty representing various disciplines, schools, and degrees of familiarity with course management. For this pilot, participants are focusing on testing and providing feedback on the various Sakai tools. A second campus pilot with a larger group of faculty members, including some from the School of Veterinary Medicine, will occur in the Spring. By then, Sakai will have been modified to interface with the Banner Student Information System and the computing accounts system.

Faculty Merit and Promotion Project. The pilot with the Faculty Merit and Promotion System (that creates faculty digital portfolios that can be used in support of academic merit and promotion actions) reached several milestones last quarter. Modifications to the MyInfoVault application and the transition from the Health System to campus servers at the Data Center were completed in September. Following this transition, the extended 2005-06 pilot was launched. In addition, the first phase of the communication approach was implemented with the roll-out of an informational project Web site (myinfovault.ucdavis.edu). Current activities include capacity planning for continued growth, completing additional enhancements and code improvements. The primary goal for this academic year is to test the system with the pilot departments through at least one merit and promotion cycle and to finalize technical and functional enhancements to the application prior to campuswide deployment. In response to system-wide interest in the MyInfoVault application, a meeting is being scheduled in early March at UC San Diego with key UC Davis project members and other interested parties.

Electronic Research Administration System. The Office of Research, in conjunction with IET, is implementing the first phase of the Electronic Research Administration System. The Proposal Tracking module of this new system will replace the campus Contracts and Grants database maintained by the Sponsored Programs Office. Recently, the project team successfully completed the final configuration of the application, a second conversion of legacy data from the Contract & Grant database into the InfoEd system and a successful dual entry period. The next major milestone to achieve is the final conversion of legacy data and the rollout of the Proposal Tracking module to the Sponsored Programs Office. Tentative completion timeframes: Proposal Tracking expected in April 2006; Proposal Development in late 2007; and Project Management in 2008 (will link information stored in the InfoEd system to various campus systems).

Temporary Employment Services System. While future enhancements are being considered to meet the growing needs of the Temporary Employment Services (TES) department, the system has now been migrated from its original silo-environment to HRIS' centralized server location where it is now supported by that department under their standard operating procedures.

Campus Email Architecture. A multi-phase, multi-component plan is underway to improve the UC Davis campus email architecture. The existing architecture, which was developed in the 1990s, is beginning to show signs of aging amid the changing needs of email users and the proliferation of viruses and spam. As a first step, in spring 2005, IET released an RFI to survey the email architecture and 'hygiene' (virus and spam) solutions marketplace. Based on findings from the RFI process and consultation with the Gartner Group, two requests for proposals are in development. The first RFP is for a commercial anti-spam/anti-virus system. The second is for a commercial email storage and access system (including Web email). Shortly after the RFI process was completed, Microsoft introduced the MSN College and University Program, a new program that provides Web-based email (Windows Live Mail) and virus/spam filtering services for students. The RFP process is pending investigation of this new option and its implications for the development of a campus email architecture strategy. As part of the overall improvements, IET plans to offer centralized Exchange services for faculty and staff (see Exchange entry below). Additional information will be posted on email.ucdavis.edu as it becomes available.

Centralized Active Directory and Exchange Services. IET continues to work with the Office of Administration (OOA) to consolidate their existing decentralized Microsoft Exchange servers into a centralized service provided through the campus Data Center (see windows.ucdavis.edu). A total of approximately 1,400 staff, representing eight departments, are involved in this transition. It is anticipated that most OOA departments will have migrated by the end of April. In the next few months, IET will be migrating to the centralized Exchange services hosted by the Data Center.

Email Forwarding for Life. This fall, IET rolled out the UC Davis Email Forwarding for Life Service, a Web-based application that allows graduates, retirees and others to have their email forwarded, upon leaving the university, to another address of their choosing. A Web site was developed (emailforwarding.ucdavis.edu) that provides an overview of the service, as well as answers to frequently-asked questions, and instructions for registering or updating a forwarding address. In addition, all qualified individuals receive an email notification describing the status of their email accounts and encouraging them to learn more about the service and register for it. A policy workgroup, involving representatives from IET and University Relations, has been formed to identify and address policy issues (e.g., email usage and retention, and electronic communications issues).

UC Davis ECP Revision. The UC Davis Electronic Communications Policy is being updated to ensure this campus policy is consistent with changes recently made to the University of California Electronic Communications Policy and to several UC Davis policies. An additional goal is to make the policy more clear and succinct for campus users. The UC Davis ECP workgroup proposes to split the existing campus policy into two separate policy sections. One section would focus on privacy and access to electronic communication records, and the other section would focus on the allowable use of electronic communication resources. Information regarding records management and system administrators would be moved to other related UC Davis policies as appropriate. Contact: Bob Ono (raono@ucdavis.edu).

Temporary Affiliate Form. IET continues to make progress on a new application that will allow visiting scholars and other temporary affiliates to apply online for a UC Davis login and other permission to use computing and library resources. This application is in QA/QC testing and will roll out during the Winter Quarter.

COMPUTING AND NETWORK SECURITY

Campus Cyber-Safety Reports. The first annual Cyber-Safety IT Security reports were due on October 1, 2005. Results from these reports have been compiled and reviewed by campus leadership. Nine departments reported compliance in high-risk areas at 90-100%, four at 80-89% and five at less than 80%. Data reported by departments suggested that administrative units consistently have a higher rate of compliance than academic departments. Several reasons for this disparity were cited, including uneven hardware/software budget distribution within the school or college and low technical staff to faculty/staff ratio. As a result of these findings, the following recommendations were made: form a campus workgroup to improve core IT services, improve IT cost-effectiveness and IT strategy implementation; develop and publish a simple risk-based assessment methodology and program for reviewing report accuracy; continue outreach efforts with Academic Senate; and continue Cyber-safety reporting process. July 1, 2006 is the deadline for the next round of reports (security.ucdavis.edu/cybersafety.cfm).

Virtual Private Networks (VPN) Workgroup. In November, a campus workgroup was formed to research and make recommendations on whether a campus VPN service should be established. The workgroup is investigating policy and protocol issues, as well as the extent to which VPN services can address security, remote access connectivity, and other requirements. The workgroup's report, including an estimate of the financial, program and personnel resources required to implement and support any recommended campus VPN service, is expected in late February (see security.ucdavis.edu/vpn.cfm).

SSL Certificates. In addition to Thawte certificates, UC Davis is now also deploying SSL certificates from GeoTrust. The GeoTrust service offers a competitively priced one-year SSL certificate, a two-year SSL certificate and an improved user order interface (see security.ucdavis.edu/thawte.cfm).

Forensics Contract. UC Davis has entered into an agreement with Guidance Software concerning forensic and enterprise consulting services. Through this contract, UC Davis may authorize Guidance software to provide computer forensic investigation, electronic discovery, consulting and/or data recovery and retrieval services. The contract ensures any delay between an incident and requesting external investigatory assistance will be limited. This contract will augment UC Davis computer forensics staff for incidents in which external handling is appropriate. Contact: Bob Ono, IT Security Coordinator (raono@ucdavis.edu).

Business Continuity Planning. Since early December, selected campus units have been participating in the Business Continuity Planning Workshop, a program that focuses on post-emergency business recovery. Conducted by the Disaster Survival Planning Network (DSPN), the workshop specifically targets campus units responsible for HIPAA electronic personal health information and those handling sensitive and/or critical university electronic information. Over the course of the training—15 hours for each of the 10 participants, including substantial one-to-one time with the consultant—workshop participants develop business recovery plans specific to their unit. Following review, the final plans are tested during a simulated desktop drill. All participants are expected to exit training with a usable recovery plan. Training ends 02/02/06. Contact: raono@ucdavis.edu.

TELECOMMUNICATIONS & NETWORKING

Directory Services-White Pages Project. In early January, a team of IET, Health System and University Communications representatives kicked off a project to replace the currently paper-based and error-prone process used for updating the UC Davis and UC Davis Health System print and online directories. The "White Pages" Project will provide a new Web-based mechanism for departments to review and edit all employee listings electronically. By developing an application that centrally manages and functions as the system of record for directory information, this project will also allow for the publishing of additional employee directory information such as multiple appointments, emails, and phone numbers, etc., both in print and online. Expected in June.

Firewall Services Upgrades. Through its agreement with Netscreen, the campus provides a range of firewall solutions to campus departments, from a complete turnkey solution and an equipment sparing service to customized support and services. In addition, a Netscreen 5200 firewall has been installed between ResNet

and the campus network to enhance security screening of traffic entering and exiting the residential network. Two vendor-supplied training sessions were held in September and January, with over 40 campus network administrators and other technical staff in attendance. IET is developing a curriculum for ongoing Netscreen firewall installation and management training sessions (see security.ucdavis.edu/firewalls.cfm).

Inventory Consignment System Pilot. For the past five months, IET-Communications Resources has partnered with Anixter to conduct a six-month pilot of their inventory consignment program. This pilot has involved using Anixter's Rapid Fire Inventory Tracking System as a means of purchasing materials and supplies for communication projects and services. With the Rapid Fire system Anixter's inventory can be stocked in the department's storehouse and items can be purchased from Anixter on an "as needed basis." As items are used, the system automatically reorders the item and the replacements are shipped within 24 hours. E-Anixter, the Web-based inventory warehouse for the Rapid Fire system, enables technicians and engineers to establish material quotes for campus projects that reflect accurate department inventory and pricing. The benefits of Rapid Fire also include the reduction of inventory obsolescence risk, and freeing up nearly \$50,000 that was previously tied to inventory items. At the conclusion of the six-month pilot in February, CR will make a decision to either revert to the old system or continue with Anixter for a one-year contract.

Wireless Guest Access. IET completed another phase of its wireless network improvement plan by introducing wireless guest access to the campus on 01/09/06. A UC Davis staff or faculty member can sponsor a visiting guest by creating an account that grants wireless access to the Internet for up to 30 days, renewable in 7-day increments. Users access a Web site to create a temporary Kerberos password. Sponsors can monitor their guest accounts by logging into the sponsor Web site which displays all guest accounts and the upcoming expiration dates. Guest accounts will be particularly beneficial to campus departments who organize conferences and other events during which visiting guests will require uninterrupted access to their mail and other Web-based services. IET's next wireless enhancement project is an implementation of the 802.1x encryption and network authentication standard (see wireless.ucdavis.edu).

Cellular Site RFP Update. UC Davis has received cell site proposals from nearly every nationwide cellular carrier (Verizon Wireless, T-Mobile, Sprint/Nextel, and Cingular Wireless). These proposals are part of an effort to expand coverage of the voice and data wireless network throughout campus using multiple vendors. Final approval of carrier sites and plans is slated for late March.

COMPUTER LABS & CLASSROOMS

Digital Lecture Recording and Distribution System Pilot. Last fall, IET piloted a digital lecture recording and distribution system with four classes. Two recorded digitally for the entire quarter and the others recorded one or two class review sessions. One class's lectures were also simultaneously recorded to cassette as a comparison to help gauge student preference for digital files versus cassette tapes. Digitally recorded lectures were distributed via MyUCDavis. Additionally, one course's lectures were also distributed via a podcast site, which supported both subscription and downloadable files. Based on usage as well as student and faculty feedback, this pilot underscored students' preference for digital files over traditional cassettes as well as their propensity to use these files as a learning aid. The pilot will continue during Winter 2006 with addition of two large classes that have used the cassette-based recording system extensively in previous quarters.

ADMINISTRATIVE COMPUTING

Banner 7 Upgrade. The required SIS Banner system upgrade is underway. A timeline and resource plan is being followed and a focused effort is being made to complete the conversion soon. User testing will begin in March with most heavy testing going on through the summer. Training on the new version of the Banner system is being planned for late summer just prior to implementation in Fall 2006 (see sis.ucdavis.edu/future.htm).