

## University of Virginia – Examples of Efficiency Efforts

The University engages in ongoing efforts to contain and reduce costs and enhance effectiveness. We have implemented numerous approaches to cost containment, cost avoidance, enhancing efficiency, and generating new revenue. We are constantly benchmarking best practices in higher education and other industries and evaluating how those might be adapted and adopted at U.Va. The University's most significant approaches to efficiency and improvement are described below.

Additionally, since 1994 the University has had a dedicated process improvement program, known as Process Simplification. This pan-institutional initiative seeks to enhance the quality, effectiveness, and efficiency of processes that affect faculty, staff, and students. As such, specific project outcomes include the simplification of steps in a process, the elimination of duplicative efforts, and optimization of available resources.

**Energy Conservation** - Pan-institutional initiatives to reduce energy and water usage in existing facilities, includes retro-commissioning of facilities and special programs to encourage conservation behaviors.

- Retro-commissioning efforts include: lighting retrofits and increased use of motion sensors; working with building coordinators to examine evening, night, weekend, and holiday temperature setbacks for additional savings opportunities; and projects related to steam traps, insulation, controls, variable speed drives, high efficiency motors, etc. The targeted cost avoidance range is \$400,000 to \$600,000 annually as calculated based on costs if the initiatives had not been implemented. Since implementation of the program the total actual avoided cost is more than \$2.2 million. The University has many sustainability programs targeted to employees and students, such as Shared Energy Savings, Sustainability Advocates, and Recycling Competitions.
- Continue to examine the application of alternative energy technologies, and their cost-effectiveness and feasibility, such as solar (power and thermal), geothermal heat pumps, biomass, landfill gas, transportation efficiency and biofuels, building-specific energy conservation, energy supply options, heat recovery, and combined heat and power.
- The University has established a target to reduce greenhouse gas emissions to 250,000 metric tons or less by 2025, representing 25% below 2009 levels and over a third less than expected 2025 emissions without this commitment.

### Partnerships/Collaborations - Examples

#### Public-Private

- Execute new partnership with the academic division childcare services provider, Childrens' Creative Learning Centers (CCLC), and convert an existing community childcare center to a dedicated center for University faculty, staff and students. This arrangement will increase capacity by 77 children, bringing the total enrollment to 187. This approach achieves expansion of service without incurring the costs of building a new facility.
- Continue to outsource surplus property sales through electronic auctioning and local contracts. This has achieved higher sales prices for auctioned surplus items and freed up space formerly used as warehouse space.

- Continue to outsource part of help desk operations to provide 24/7 coverage at same cost as 8-5/5, with consistently high measured satisfaction.
- Assess opportunities for other private-public partnerships as appropriate. The University currently outsources or partially outsources more than 40 services to multiple vendors.

#### University-City/County

- Continue partnership between University Parking & Transportation and the City of Charlottesville to allow faculty, staff and students to ride city buses. Charlottesville Transit Services (CTS) boardings for fiscal year 2010 including the trolley were 178,200 passengers.
- Continue partnership in 911 Emergency Communication Center.
- Continue fire services and rescue squad arrangement

#### University-University

- Continue partnership with Virginia Tech for remote-site data backup of IT infrastructure in the other's computer room for backup and disaster recovery at no cost.
- Collaborate on high-performance computing and computational science. A grid of high-performance computing resource spans (UVa – VT) and is available to investigators at either site.

### **Consolidation/Realignment/Redesign of Units/Services - Examples**

There are many examples of consolidation of administrative services in both administrative units and academic schools and units.

- Central Facilities Management and Student Affairs have consolidated their facilities management functions and realized a financial advantage of approximately \$100,000 annually. A similar consolidation with Housing Division maintenance and housekeeping staff and central Facilities Management has been initiated (annual savings are unknown at this time).
- Merge the positions of Director of Housing and Director of Residence Life for improved services and educational programs for students living in University Housing.
- Administrative positions that previously were assigned to support one area/department/center have been reconfigured (e.g. reorganized, consolidated, shared) to support more than one area. For example, in the Curry School, clinic administration functions have been consolidated. In the School of Medicine, consolidated administrative management has occurred in the departments of Ophthalmology and Anesthesiology; the Center for Cell Signaling and the Department of Microbiology; and the departments of Neurology, Otolaryngology, and Urology. The School of Continuing and Professional Studies (SCPS) is combining the oversight of regional centers under the leadership of one instead of two directors (e.g. Richmond and Hampton Roads Centers now have one Regional Director). SCPS has shifted to a centralized structure for four core services of outreach, academic, administrative and student services, instead of having staff to provide all services at each regional center
- Merged the departments of Information Technology and Communication with Integrated System Development and Support, the two organizations that provide technology infrastructure and support, into Information Technology Services (ITS) for efficiency and better alignment with the University's needs and ambitions.

- Hired a position in the Cost Analysis group to perform the space functionalization work to attain Facilities and Administrative Costs (F&A). This work was previously outsourced, but a savings of approximately \$33,000 annually has been realized by performing the work in-house.

### **New Models of Service - Examples**

- U.Va. has implemented a new model of library service for Curry School of Education; librarians will be in residence within the School to provide reference service and instruction for classes and individuals and to collaborate with Curry faculty and University Library staff to support research and teaching. The model shifts the focus from maintaining and circulating physical collections to providing skilled staff expertise to focus on services to students and faculty related to support for scholarship and access to digital information.
- Virtualized public computing labs allowing us to leverage student investments in technology and approach licensing costs and desktop management in new and more scalable way. Average annual savings over a five year period, which began last year, is estimated to be \$170,000.
- An ongoing cost savings measure for the University is that we retain the first \$100,000 of each property loss as well as losses to vehicles valued at \$20,000 or less. This self-insurance program has saved the University approximately \$140,000 annually from the discounts negotiated with the state insurance program.

### **Information Technology - Examples**

- Utilize campus wide licensing for Microsoft products at the significant aggregate savings of \$250,000 annually.
- Review supported users and type and replacement cycle of equipment. In one department cell phone and mobile devices were cut in half from \$17,000 to \$8,500. In one school, the computing hardware expenditures were reduced \$50,000 by extending the replacement cycle time. In another unit, individual printers were replaced with shared, multi-functional devices (print, scan, copy, fax) yielding a savings of \$12,000 per year.
- A project is underway to replace the institution's voice system with a modern standards-based system, providing more features, increasing general infrastructure robustness, and decreasing costs. Implementation, which will begin as soon as vendors are selected and approved, will continue into 2012-14.
- The Predictability Project is underway with the goal of ensuring central IT (service capabilities, service performance levels, technology architecture, tactical and strategic directions, etc.) is predictable. Through this effort, those who depend on IT can make their plans and pursue their goals with confidence in the technology environment in which they are embedded. In support of this initiative, in June 2011 the central IT function was restructured based upon a set of important management philosophies and practices. This is a critical first step and other planned predictability project work will continue into 2012-14

### **Automate Internal and External Transactions - Examples**

- Continue electronic student billing, eliminating the mailing of paper bills.
- Implement investment accounting endowment system solution, Fundriver, to automate manual processes and enhance internal controls and documentation. The software will save

endowment management staff at least three days per month, approximately 10% of an FTE, or \$10,000. It will also streamline and enhance reporting for the Development Office and departments that hold endowments.

- Implement a web-based system to replace the paper monthly reconciliations required for all University expenditures. This will save significant printing and storage costs for all units as well as streamline work flow.
- Leverage the textbook rental system implemented by the University Bookstore that reduces about 400 hours of employee time per semester, or about \$13,000 annually. The system eliminates the need for students to manually fill out rental forms, improving the flow of customer traffic at check-out, and automates the rental return notification process.
- Continue the web-based education module for faculty and staff to streamline required research effort reporting with on-line tracking. Initial results show approximately 90% of those reports were certified within the 45 day certification window, an improvement from 90 days with the paper process.
- Continue with automated processes in Human Resources, including on-line employee time and leave tracking, employee performance evaluations, I-9 online forms, and on-line background checks. These systems have reduced cycle time and error rates.
- Implement paycards and discontinue paper paychecks. While direct deposit is required for new employees, there are about 200 paper checks issued per biweekly pay period. Paper checks are costly to produce and result in lost productivity of Human Resource staff to distribute and employees take time off to pick them up. In June 2011, the University will convert these remaining employees to paycards, which operate like debit cards.
- Convert various paper publications to electronic formats (e.g. student handbooks, calendars, newsletters, etc.) The documented savings associated with the conversion of two publications totals over \$100,000. In 2012, the Board of Visitors will move to a paperless system and leverage technology for Board materials. This will reduce costs associated with copying and mailing materials. Meeting materials are currently compiled for 4 regular meetings and a retreat. Final meeting materials are typically between 500-1,000 pages. This does not include supplemental materials, such as handouts, or earlier drafts of materials.

#### **Capital Budget - Construction Management - Accelerate Project Schedules and Value Manage Projects**

- Accelerate Alderman Road dormitory replacement project - Phase 2, Phase 3 and Building 5 in Phase 4. The rate of acceleration varies but is between 2-3 years. This acceleration represents an estimated savings of \$46.5 million. Evaluate additional acceleration opportunities.
- Continue using sequenced design and construction package releases in order to get to the market earlier and thereby expedite the start of construction. The benefits derived include not only early use of the new or renovated facility but also the earlier pricing minimizes exposure to inflation-related cost increases

#### **Value Management**

- Value Management (VM) studies are conducted at the Schematic Design phase and the Preliminary Design phase on all capital projects with a construction cost of \$5 million or more. VM's resulted in savings of \$8 million in FY 2010 (4% of construction costs).

### **New Internal Financial and Budget Model**

Developing a new resource allocation model that provides revenue centers with a transparent resource allocation and decision-making process, a more effective long-range planning tool, and incentives for entrepreneurial activity and prudent stewardship of resources. To be implemented in 2013-14.

### **Comprehensive Records Management Office**

Expand institutional-wide systematic approach to records retention and destruction. More than 81 tons of records were destroyed in 2009-10. As a result of records destruction, storage costs have been reduced by approximately \$64,000 annually; staff time to manage records has been reduced; and the security of confidential records has increased.

### **Revenue Generation through Innovative Procurement Strategies.**

Implement several revenue-generating and cost-reduction initiatives, such as increased use of the P-card, expanded vendor rebate/discount programs, expanded electronic invoicing. The goal is to generate approximately \$1.5 million in revenue each year.

### **Procurement Contracts**

- Expand the number of Group Purchasing Organization (GPO) contracts the University utilizes. Increase the quantity of cooperative contracts through participation in Virginia Association of State College and University Purchasing Professionals (VASCUPP). The number of VASCUPP contracts currently accessible is 1,327.
- Identify and establish contracts through a competitive process called Contract Opportunity (CO) for commodity areas where the University has numerous transactions (e.g. graphic design, painting, etc.). Negotiating and setting the blanket terms of the contract before a service or good is needed saves Procurement staff time, allows the University to commission service or acquire goods more quickly when needed, and may yield additional pricing efficiencies. Procurement Services awarded 149 new University contracts in FY2010 through the use of this less formal solicitation.

### **Process Improvement Initiative**

Process Simplification serves as the University's formal, systematic approach to continuous improvement. Established in 1994, the program seeks to enhance the quality, effectiveness, and efficiency of processes that affect faculty, staff, and students. As such, specific project outcomes include the simplification of steps in a process, the elimination of duplicative efforts, and optimization of available resources. This effort has facilitated significant, tangible improvements over the years in administrative areas, student services, and academic administrative support areas.