

Report summary

Support Costs and Staffing at Virginia's Higher Education Institutions

WHAT WE FOUND

Spending on support functions has increased, but rate of increase has been declining

Spending on support functions at Virginia's 15 public higher education institutions increased 28 percent from 1991 to 2010, when adjusted for enrollment and inflation. This increase accounted for 17 percent of the growth in total higher education spending. The rate of increase varied substantially across institutions, and some institutions experienced reductions. The rate of increase across all institutions has declined, though, since most of the increase occurred between 1991 and 2000. Support spending increased six percent between 2000 and 2010, less than the 11 percent increase in instructional spending.

Most Virginia institutions spend less than comparable schools nationwide, but several spend substantially more

Eleven of Virginia's 15 institutions spend less than similar institutions nationwide. Six of these (JMU, ODU, VCU, Radford, Virginia State, and Virginia Tech) spend less than 75 percent of other similar public institutions. In contrast, UVA, VMI, and William and Mary spend more than 75 percent of other similar institutions.

WHY WE DID THIS STUDY

The General Assembly directed JLARC to study the cost efficiency of the state's institutions of higher education and to identify opportunities to reduce costs. Interest in this topic was spurred by substantial increases in tuition and fees in recent years and the high debt load of Virginia students. This report, which is the fourth in JLARC's higher education series, focuses on support functions, including information technology and procurement (HJR 108, 2012).

ABOUT SUPPORT FUNCTIONS AT PUBLIC FOUR-YEAR INSTITUTIONS IN VIRGINIA

Virginia has 15 public four-year higher education institutions. Collectively, their spending on support functions totaled \$1.2 billion, or one-fifth of total spending.

Support functions facilitate an institution's core academic mission by providing services to students and faculty, and for general operation of the institution. Academic and general administration, libraries, and building repair and maintenance are the largest support functions in terms of spending and number of staff. Support functions are funded mostly through tuition and fees and state general funds.

Virginia institutions emphasize academic support

Virginia institutions allocate the largest proportion of support spending for academic support, which includes spending for libraries, curriculum development, and academic administration. Institutions report that academic support is important for student retention and graduation. Ten institutions spend more on academic support than similar schools around the country, and eight of these also have higher retention and graduation rates than comparable schools.

Institutions could potentially reduce costs by reviewing organizational structure

For this study, JLARC staff used “spans of control” analysis to identify opportunities to improve the efficiency of support functions at four-year public institutions in Virginia. In some organizations, there are too many supervisors, which may lead to unnecessary layers of management between front-line employees and top executives. These layers can slow decision making and unnecessarily increase costs. It appears Virginia institutions have a disproportionately high number of employees in supervisory positions. In fact, more than half of supervisors at Virginia’s higher education institutions supervise three or fewer employees; 24 percent supervise only one.

These narrow spans of control (i.e. too few employees per supervisor), which sometimes point to structural inefficiency, are not unique to Virginia and have been found at other higher education institutions nationwide. Several institutions outside Virginia have increased their spans of control and reported reducing their total annual operating costs by 0.5 to one percent. Such reductions, if achieved by Virginia institutions, could potentially reduce costs by several hundred dollars per student, per year.

TABLE
Virginia institutions could reduce costs by increasing spans of control

Institution	Average annual savings (\$M)		Average savings per FTE student	
	<i>Low</i>	<i>High</i>	<i>Low</i>	<i>High</i>
<i>Outside Virginia</i>	\$3.2	\$20.0	\$203	\$790
Virginia baccalaureate	0.3	0.5	157	314
Virginia master’s	0.9	2.0	104	215
Virginia doctoral	3.8	7.5	176	353

Source: JLARC staff analysis of findings and estimated savings achieved at institutions outside Virginia, NCES data, and institutions’ FY 2012 financial reports.

Note: Operating expenditures exclude hospital and medical center expenditures at VCU and UVA. Low and high average annual savings are based on 0.5 and 1.0 percent of total annual operating expenditures.

Spans of control analysis is used in the corporate world and more recently by colleges and universities around the country in working toward organizational efficiency. It is used to help streamline organizational structures by identifying areas with many layers of management and high numbers of supervisors relative to employees.

Several procurement strategies could be better utilized to further reduce costs

Procurement is a major expense for Virginia institutions. Cooperative procurement of goods and services is one of the recommended strategies to reduce procurement costs. All Virginia institutions report that they use cooperative procurement. In interviews, it was most commonly mentioned by institution staff as the strategy from which they received the greatest benefit, in terms of both cost savings and reduced staff time.

Current cooperative procurement efforts by Virginia institutions, however, are not as effective as they could be, because the buying power of institutions and state agencies is fragmented. Many cooperative contracts may not maximize cost savings because of the lack of collaboration across institutions during the contract negotiation process.

All Virginia institutions report using another recommended strategy: institution-wide contracts. These allow for better pricing by aggregating the buying power of the individual institution to one or a few vendors. Many Virginia institutions, however, do not strictly enforce the use of these contracts, allowing “off contract” purchases, which may drive up spending. Institutions also are not effectively limiting the variety of goods, such as computers and printers, available for purchase. This hinders an institution’s ability to take advantage of favorable pricing and economies of scale.

Institutions could reduce support costs through several other strategies

Several other strategies to improve higher education support functions have also been consistently recommended to improve efficiency and reduce costs. These strategies include centralizing staff and automating processes. Most Virginia institutions already centralize staff performing similar functions and many have automated major support functions, such as financial and human resource systems. Some schools, however, could further centralize certain staff into one office or into one or more “shared service” centers across campus. Processes at some institutions also still remain heavily paper-based. For example, only a few schools have automated systems for time, attendance and leave; performance evaluations; travel reimbursement; and staff recruitment.

Most Virginia institutions have already adopted key IT efficiency strategies. However, some institutions could further require the co-location and “virtualization” of new servers to reduce costs. Larger institutions could further limit the variety of hardware and software purchases, which would enable the institution to buy larger quantities of a specific model and achieve better prices.

WHAT WE RECOMMEND

Legislative action

- Include language and funding in the Appropriation Act for the purpose of hiring a consultant to assess opportunities to reduce costs through cooperative procurement.
- Amend the Code of Virginia to direct institutions, the Department of General Services, and the Virginia Information Technologies Agency to implement the findings of the consultant review.

Boards of Visitors action

- Require a comprehensive review of the institution's organizational structure and work processes to identify opportunities to increase spans of control, further centralize staff, or better use automation.
- Revise human resource policies to eliminate and prevent unnecessary supervisory positions by developing standards for broader spans of control.
- Require policies to maximize standardization of purchases of commonly procured goods, including requirements to use institution-wide contracts.

See the complete list of recommendations on page v.