The Maryland Higher Education Commission

presents

Van de Water Consulting’s Report

MEETING MARYLAND’S
POSTSECONDARY CHALLENGES:

A Framework to Guide Maryland’s
Public Investments in Postsecondary Education
in the Coming Decade
LETTER OF TRANSMITTAL

January 10, 2007

Dear Higher Education Colleague:

The Maryland Higher Education Commission is pleased to present Van de Water Consulting’s report, *Meeting Maryland’s Postsecondary Education Challenges: A Framework to Guide Maryland’s Public Investments in Postsecondary Education in the Coming Decade*. When implemented, we believe, the recommendations contained in the report will have a positive impact on Maryland’s higher education system as a whole and will provide a framework to strengthen the formulation of higher education budget policy and analysis.

The 2004 State Plan for Postsecondary Education sets a bold vision through its guiding principles and goals on quality and effectiveness, access and affordability, diversity, student-centered learning system, and economic growth and vitality. The recommendations in *Meeting Maryland’s Postsecondary Education Challenges* supply the framework for achieving the visions in the State Plan. We look forward to working with higher education stakeholders across the State to implement this plan to fulfill our collective responsibility to provide postsecondary education adequately and effectively.

Sincerely

The Maryland Higher Education Commission

Kevin M. O'Keefe, Chairman
Donald J. Slowinski, Sr., Vice Chairman
Victor E. Bernson, Jr.
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Anne Osborn Emery
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James G. Morgan
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Mario F. VillaSanta
Endorsement by the Maryland Higher Education Commission

The Maryland Higher Education Commission endorses the recommendations of Van de Water Consulting’s report, *Meeting Maryland’s Postsecondary Challenges*, especially as these relate to the reform of the budgeting process, and recommends that they become the basis for the deliberations of the legislative Commission to Develop the Maryland Model for Funding Higher Education. The Commission further recommends that the legislative Commission also consider the following three issues and how they impact on the affordability of public higher education:

(a) the preparedness for college of Maryland high school graduates;

(b) enrollment growth and enrollment distribution; and

(c) The possibilities for cost containment in the management of public colleges and universities.

Introduction

Van de Water Consulting’s report, *Meeting Maryland’s Postsecondary Challenges* issued on September 8, 2006, was presented to the Commission at its retreat on November 8, 2006 by Dr. Gordon Van de Water. After the presentation, Commission members expressed some concerns about the initial draft of the report. Several of the Commission members felt that while there was much value to the report, more context was needed. The Commission requested staff to prepare a contextual document to accompany the report. The Commission further requested that information on whether the report met the requested objectives and the impact of implementing the recommendations be included in the contextual document. The Commission also asked that information be provided on several additional issues that the Commission feels must be included in the discussion of a new postsecondary education model. This document is provided as a companion document to the consultant’s report.

Origin of the Request for the Report

In the 2004 *Maryland State Plan for Postsecondary Education* an overarching goal and accompanying action recommendations were developed to serve as a preface to and to envelop all the other goals in the document. The goal calls for a comprehensive framework to guide decisions relating to postsecondary education in Maryland. The action recommendations were:

- The Maryland Higher Education Commission will initiate a comprehensive process to develop a postsecondary education model that will address the linkage of tuition policy, State support to institutions, and institutional and State financial aid in regard to student access and the needs of the State. The public debate segment of the process will include but not be limited to consideration of:
  - How access can be provided to all Maryland residents who can benefit from postsecondary education and desire to attend a college, university, or private career school.
The appropriate balance between the student share and the State share of the cost of higher education.
- The economic and civic benefits to the State from having an educated population.
- The postsecondary education model should be the foundation for the development of a coordinated statewide 10-year growth plan for postsecondary education.

The Maryland Higher Education Commission sought grant funds from the Lumina Foundation for Education and USA Funds to undertake this comprehensive process to develop a postsecondary education model. Through the support of the two granting agencies, the Commission was able to engage, Van de Water Consulting LLC, a consulting firm to perform a study of the appropriate relationship between and among tuition levels, state appropriations to higher education, and institutional, state, and federal financial aid; examine postsecondary education statewide models that effectively integrate policies on tuition levels, state appropriations to higher education, and institutional, state, and federal financial aid; make recommendations on a possible model for Maryland postsecondary education; and to participate in the subsequent development of a model for Maryland postsecondary education.

Van de Water Consulting was asked to include in the examination and analysis:

a. Examination of the effectiveness of postsecondary education models that work to integrate policies on tuition levels, state appropriations to higher education, and institutional, state, and federal financial aid.
b. Identification of key state policies or conditions that result in a well-coordinated and effective state system;
c. Consideration of the unique composition and governance of Maryland’s postsecondary education system;
d. Examination of the most recently available data on outcomes to demonstrate the effectiveness of the models reviewed;
e. Identification of appropriate accountability measures for a Maryland model; and
f. Consideration of the structure and history of higher education and financial aid in Maryland.

In preparation for the development of recommendations, an analysis of effective postsecondary education models was to be undertaken to include:

a. Identification of key state policies or conditions that result in a well-coordinated and effective state system;
b. An assessment of the impact of state policies on the access to and affordability of postsecondary education for the average family with low- to moderate-income;
c. Consideration of relevant policies in other states related to the funding of higher education, tuition levels at public institutions of higher education, and financial aid policies;
d. Evaluation of established measurements of outcomes and the most recently available data on outcomes;
e. A thorough understanding of Maryland’s history and fiscal policies regarding higher education;
f. Consideration of the context and goals of the 2004 Maryland State Plan for Postsecondary Education;
g. An understanding and sensitivity to the unique composition and governance structure of Maryland’s higher education system; and
h. Interviews of key policymakers and stakeholders in Maryland;

Van de Water Consulting was asked to address the following when formulating the recommendations:

a. Proposed policy changes that would integrate policies on tuition levels, state appropriations to higher education, and financial aid to ensure access for Maryland citizens to postsecondary education and to meet the needs of the State for an educated workforce;
b. The impact of proposed policies on the balance between the student share and the State share of the cost of higher education;
c. A timeline for implementing policy changes; and
d. Possible accountability measures of outcomes to evaluate the effectiveness of the adopted model.

The Consultant’s Report, Meeting Maryland’s Postsecondary Challenges

In compliance with the scope of the request, in the development of the report and recommendations, Van de Water Consulting reviewed Maryland planning documents and reports; reviewed national data and models; conducted interviews with over 30 Maryland leaders in the executive and legislative government, associations, and higher education institutions; identified peer states based on their relationship to the national average on the aid-to-tuition ratio; and collected data for Maryland and the peer states.

As a result of the interviews, the consultant reported that he heard from the Maryland leaders that they were pleased with the current budget mechanisms that link funding for the community colleges and the independent colleges to the funding at the University System of Maryland. The main concerns emerging from the interviews were those of the raising of tuition and fees during times of State budget constraints, the concern for accessibility for low-income students, and the need to accommodate the anticipated growth in enrollments. Therefore, the consultant’s report does not contain recommendations to alter the current funding distribution mechanism for community colleges and independent institutions. Instead, the consultant’s recommendations focus on the development of a model that represents the state’s commitment to higher education.

While there was concern expressed about the impact of Thornton and the capacity to accommodate the enrollment growth, addressing those issues are outside of the scope of the request to Van de Water Consulting. The action recommendation in the 2004 Maryland State Plan for Postsecondary Education states that “The postsecondary education model should be the foundation for the development of a coordinated statewide 10-year growth plan for postsecondary education”. In accordance with the request, the consultant focused on recommendations to afford access to those additional students but did not address where the enrollment of those additional students would or should be directed. The consultant’s report is intended to be the beginning point for the development of the coordinated statewide 10-year growth plan.

The report, Meeting Maryland’s Postsecondary Challenges, contains four recommendations:
1. Set specific goals for access and affordability
2. Strengthen coordination of the planning and budget processes
3. Align state appropriations, tuition, and student aid
4. Use student aid to make postsecondary education affordable for all citizens

Within each broad recommendation a series of specific actions are set forth. In addition, benchmarks are included to measure the progress of implementing the recommendations. The recommendations and specific actions are examined in this document. However, because two of the four recommendations focus on the budget process and budget decision making, a description of the current budget process is provided to add background to better understand the changes being recommended.

**Overview of Operating Budget Process**

By statute, the Commission is to comment on the overall level of funding for higher education in order to achieve the goals established in the state plan for higher education, and may comment regarding funding priorities among segments of higher education, and, within public senior higher education, among institutions. This authority was granted in 1988 when the Commission was established. This authority was further clarified in 1999 with passage of legislation recommended by the Larson Task Force which states that the Commission may not recommend against a budget item approved by the University System of Maryland Board of Regents unless the item is clearly inconsistent with the state plan for higher education.

Also consistent with the Larson Task Force recommendations and statute, peer-based funding guidelines were developed in 1999 that examine the total resources from tuition, mandatory fees, and state general fund appropriations to provide information during the budget decision process. The guideline model compares funding and performance of Maryland public colleges and universities with similar colleges and universities nationally to provide information during the budget process by supplying an assessment of the funding level as well as a source of comparison between institutions. The guidelines do not represent a request for an appropriation, but look at the following to assess an institution's funding level:

- Peer institutions that are similar to Maryland institutions in size, program mix, enrollment composition, and other defining characteristics; and,
- Financial characteristics of the peer institutions to determine the resources available per full-time equivalent student (FTES). The overall goal is to fund Maryland’s institutions at the 75th percentile of their current peer institutions.

The accountability component of the funding guidelines is critical in determining whether higher education institutions are performing at the level of their funding peers. The performance of Maryland institutions is compared annually to the performance of a group of peer institutions on a set of measures that include core measures as well as institution specific measures. An institution that has performed at or above the level of its peer institutions is eligible to begin adopting aspirational peer institutions into the funding peer group.

As the Commission reviews institutional budgets, it looks at the proposed requests for all four-year public institutions in relationship to funding recommended by funding guidelines to see if institutions are reaching funding guideline parity. In addition, it examines requested increases to
State appropriations and expenditures for specific initiatives to ensure these items are consistent with the goals and objectives of the State plan.

The Commission is to present a consolidated operating budget request to the Governor and General Assembly. This consolidated budget is to include a recommendation regarding the appropriate level of funding for higher education in order to achieve the goals established in the State Plan for Higher Education.

An issue for the past few years has been the timing of the submission of the University System of Maryland institutional budgets. The budgets have not been submitted to the Commission and the Department of Budget and Management until late December. Because the operating budget requests are used in the peer funding calculation methodology, the Commission staff have been unable to provide information on peer funding during the budget decision process. In addition to the inability to provide the peer funding information, the Commission staff have also been unable to perform the statutorily required analysis of the overall funding for higher education until after the Governor’s budget has been introduced at which time the analysis has lost its meaning and usefulness.

Consultant's Recommendations

The consultant’s recommendations are based on interviews with Maryland’s governmental and higher education leaders, reviews of MHEC reports, analysis of historical data for Maryland and an identified set of peer states, and the examination of information collected from peer states. Not only will they have a positive impact on Maryland’s higher education system as a whole, they also provide a framework to strengthen the formulation of higher education budget policy and analysis. If implemented, these recommendations will create a more coordinated budget development process and measure the accountability and effectiveness of specific higher education initiatives. These recommendations are aligned with discussions of the Larson Task Force which called for MHEC to become a policy coordinating board in terms of budget development.

Below, each recommendation of the report is specified, followed by what is required to implement the recommendation and the impact of implementation.

1. Set specific goals for access and affordability
Adopt the following objectives to support implementation of the 2004 State Plan for Higher Education. Progress toward these objectives should be monitored on an annual basis.

- The participation rate of low-income students will increase by 1% a year until the average of the peer group of states is reached.
- The gap between low- and high-income students in college-going and degree-completion rates will be reduced by at least one percentage point per year.
- The percentage of unfunded students who apply by May 1 and new two-year public college students who apply by August 1 will decrease by 20% annually over the new five years.
- EAG awards as a percent of public tuition will increase to 80% for students in Maryland’s lowest 20th percentile of family incomes by FY 2010.
- Maryland will rate at the average of peer states on the Measuring Up overall affordability index.
- The state need-based aid as a percent of state Pell Grant funding will increase annually.
• Allocations to need-based aid will be increased until Maryland reaches the average among peer states in dollars of need-based aid per $100 of tuition.
• The share of higher education costs funded by state appropriations will be increased by 1% each year until the average share of peer states is reached.

**Required to implement:** Benchmarks for all of the above should be set in collaboration with the Governor’s Office (DBM), General Assembly (DLS), and the segmental leaders. The “higher education affordability committee” recommended in 2 below could be the forum for establishing these benchmarks. This group could be established in statute and given the authority to set these benchmarks through regulations or guidelines. These benchmarks could serve as goals for State higher education policy and guide State appropriations. Ultimately, these benchmarks will serve as indicators of access and affordability for the State as a whole and for individual institutions.

The legislative Commission to Develop the Maryland Model for Funding Higher Education, in collaboration with key stakeholders, should consider developing the benchmarks for the share of higher education costs that is funded by state appropriations. This will be a major contribution of the work of this group.

**Implementation Impact:** The specific goals outlined in the consultant’s report create a detailed plan for measuring the implementation Goal 2 of the 2004 State Plan for Postsecondary Education. Goal 2 of the State Plan states: “Achieve a system of postsecondary education that promotes accessibility and affordability for all Marylanders.” The specific objectives laid out in the consultant’s report provide a mechanism to measure college participation by low-income students, the degree completion gap between low- and high-income students, the adequacy of need-based aid, and the state share of higher education costs as compared to the average share for peer states.

The State currently has a “performance accountability process” with established benchmarks and performance indicators for individual public four-year institutions. For the community colleges, one set of common indicators is used but each institution sets its own benchmarks. The performance accountability process is required by State law but the nature of the benchmarks and indicators is left to the Commission in consultation with the segments.

The present benchmarks and indicators have emerged over years of negotiation among the segmental boards, the institutions, and the Commission. Whereas, they contain measures of access, they do not address affordability. These benchmarks should be modified through a collaborative group as described above to address affordability.

MHEC should report annually on the attainment of these statewide goals. In addition, MHEC should focus its institutional budget review on the attainment of these benchmarks to guide decisions during the budget cycle. The Commission’s focus should be on the attainment of policy rather than focusing on the budget requests of the institutions. The analysis done by the Commission should be on whether the institutions are using their budgets to implement the policies that have been set. This would require a change in the way the Commission staff look at and present information during the budget cycle.

**2. Strengthen coordination of planning and budget development**

Strengthen coordination of planning and budget development by:
• Amending the schedule and process for developing budget requests so that the University System and MHEC keep each other informed and the decisions about budget requests, tuition and fees, and student financial aid can be coordinated.
• Directing MHEC staff to provide the Governor with analysis of the implications of proposed appropriation levels on tuition and fees and student aid during the budget preparation cycle.
• Providing, in accordance with MHEC’s mission, timely policy analysis to the Governor and Legislature on how well the total budget request for higher education fulfills the goals of the state plan.

Required to implement: The consultant laid out the policy option of establishing a “higher education affordability committee” which would be a collaboration of the Governor’s Office (DBM), Legislature (DLS), MHEC, and the higher education segmental leaders. As described above, this group could work to establish benchmarks to be used as part of the policy analysis related to the budget. These recommendations are in keeping with the role of the Commission laid out in Maryland statute with regard to institutional budgets. MHEC is to “…comment on the overall level of funding for higher education in order to achieve the goals established in the State Plan for Higher Education and may comment regarding funding priorities among segments of higher education and, within public senior higher education, among institutions.” However, it would require a change in MHEC’s budget review process. The recommendations would require the analysis of budget requests in terms of the State Plan and preparation of a budget policy document.

Implementation Impact: The formation of a “higher education affordability committee” could link the setting of tuition rates and need-based financial aid to provide access to more Maryland citizens. In addition, the policy analysis provided the Governor and the General Assembly during the budget process could assist in the formulation of appropriation levels.

3. Align State appropriations, tuition and student aid
   • Link appropriations, tuition and student financial aid by adopting the peer state model as a guideline for budget development and direct MHEC to provide analyses based on the model to inform governmental and higher education leaders prior to budget decisions being made.

Required to implement: The legislative Commission to Develop the Maryland Model for Funding Higher Education should develop the model and implementation strategies for this recommendation. This group brings together all appropriate parties, Governor’s Office (DBM), Legislature (DLS), the segment heads, and business representatives to determine how these funding sources address affordability in Maryland. This group can also determine the appropriate portion of costs to be borne by students of different income levels. The funding goals determined under the first bullet above, could be used to inform MHEC’s budget analysis.

Implementation Impact: This could have a significant impact on all aspects of higher education. Adopting a unified method will ultimately determine costs per FTE, need-based aid, and tuition levels.

4. Use student aid to make postsecondary education affordable for all citizens

Need-based Aid
• Seek funding to increase Educational Assistance Grant (EAG) award maximums to equal average tuition and fees at public two- and four-year institutions. Set the same maximum award at the independent institutions equal to that at public 4-year institutions.
• Work toward an application deadline date of May 1 for all renewal students and first-time applicants at four-year institutions, and August 1 for first-time applicants at two-year institutions. The cost of achieving these deadlines can be estimated annually and additional funding should be phased in to support all eligible students who apply by the March 1 deadline and for the campus-based EAG program. Once funding is adequate, the two programs can be merged along with the Part-Time Grant program.
• Focus EAG funds on providing access for lower-income students and families. Establish an expected family contribution (EFC) cutoff of $10,000 or a college cost cap that effectively eliminates from eligibility families with incomes near or above the state median.
• Set a benchmark for the level of remaining need to be covered by the EAG grant for students with the least ability to pay (or students with the lowest income quintile). Establishing the benchmark should take into account expected earnings during the school year, the amount low-income students are expected to borrow, and institutional aid received as a proportion of the total college costs.
• Improve differentiation of awards by EFC through a payment table or sliding scale that indicates the amount of remaining need to be covered based on the EFC and allows students with lower EFCs to qualify for larger grants.

**Required to Implement:** These recommendations require both legislative and guideline changes to implement. To build consensus for these changes, MHEC’s Financial Assistance Advisory Council should participate in the implementation process.

**Implementation Impact:** These recommendations completely change how the Office of Student Financial Assistance (OSFA) currently awards students in EAG program. Various modeling scenarios could be developed to determine the impact of these recommendations and the total cost. Another implementation consideration will be how these changes will affect the development of OSFA’s new financial aid system.

These recommendations not only change the way EAG is awarded but also who receives the awards. Implementing the recommendations will cause awards to low-income students to increase while students from families near or above the state median income will become ineligible for awards.

**Program Administration**

• Maintain one large, highly visible state student aid program based primarily on financial need that allows students to know their eligibility status as early as possible. Begin announcing awards on a first-come, first-served basis in early March based on estimated tuition and fees if institutions are unable to establish actual rates by that time.
• Consider decentralizing the EAG program similar to Washington State’s approach after funding for the maximum award and application deadline is sufficient to achieve 90% of the recommended levels. At that point, the combination of EAG and campus-based EAG funding should be adequate to provide allocations to institutions based on their students’ proportion of need without disenfranchising previously eligible students.
Required to Implement: These recommendations require both legislative and guideline changes to implement. To build consensus for these changes, MHEC’s Financial Assistance Advisory Council should participate in the implementation process.

Implementation Impact: As above, these recommendations completely change how OSFA currently awards students in EAG program. Various modeling scenarios would be developed to determine the impact of these recommendations and the total cost. Another implementation consideration will be how these changes will affect the development of OSFA’s new financial aid system.

Special Purpose Programs

• Continue efforts to consolidate financial aid programs including evaluating the success of the Guaranteed Access Grant program to determine if the program is meeting statutory intent. Otherwise, consider implementing modifications to result in the desired intent or merge funding into the EAG program.

• Simplify the application process for special-purpose programs by consolidating them into fewer and more comprehensible programs and allowing students to apply through one application form.

Required to Implement: These recommendations require both legislative and guideline changes to implement. To build consensus for these changes, MHEC’s Financial Assistance Advisory Council should participate in the implementation process. Evaluation of the Guaranteed Access Grant Program could be performed by MHEC, in collaboration with K-12 and higher education institutions.

Implementation Impact: These recommendations change how OSFA currently awards students in its program. Some programs are currently being consolidated. Implementing these recommendations would result in further efficiencies. Various modeling scenarios would need to be developed to determine the impact of these recommendations and the total cost. Another implementation consideration will be how these changes will affect the development of OSFA’s new financial aid system.

Outreach

• Use focus groups with target populations—students and parents—to determine how to best target marketing efforts to reach first-generation students, low-income students, underrepresented minorities, and students with disabilities.

• Explore the feasibility of using MarylandMentor for outreach activities and examining other specific activities used by other states with Mentor such as North Carolina, Illinois, and New York to reach target groups. Determine whether usage data can be obtained from the sponsor.

Required to Implement: A collaborative of K-12 and higher education representatives should work with student focus groups to develop a targeted message and campaign to deliver the message to the students.

Implementation Impact: Additional outreach efforts to first-generation students, low-income students, underrepresented minorities and students with disabilities could increase the college-going rate of that population. It is anticipated, based on national and historical data, that these students would need additional supports to be successful. First year programs would need strengthening to insure the success of this target population.
Additional Issues for Discussion in Developing a Postsecondary Education Model

During the discussion of the consultant’s report, the Commission identified several areas that were outside of the scope of the consultant’s charge but that are critically important to the development of a postsecondary education model. These areas are the preparedness of high school graduates for college-level courses, enrollment growth, and the need to address cost containment at the colleges.

Preparedness of High School Students for College
There has been concern among Maryland legislators and educational policymakers over the past decade about the number of recent high school graduates requiring remediation in basic skill areas before entering college-level credit courses. Many have seen the number of students needing remediation as a factor in the increasing cost of higher education because the State must pay for the same instruction twice: once in the high school and once in remedial courses offered by colleges.

In 1990, the General Assembly requested the Maryland Higher Education Commission to establish the Student Outcome and Achievement Report (SOAR) to provide feedback to high schools on how well their graduates do in the initial year of college study. Commission studies have consistently found that a much lower percentage of students who took a college preparatory or “core” curriculum in high school (four years of English, three years of math, three years of social studies, and two years each of a natural science and a foreign language) was assessed as needing remediation in math, reading and writing than were students who did not. The amount of remediation could be reduced if larger numbers of college bound high school graduates had an academically rigorous course of study in secondary school.

Nevertheless, according to the most recent SOAR report, 39 percent of the Maryland high school graduates who enrolled at a college or university in the State in 2004-2005 did not take a college preparatory or “core” curriculum. This figure is almost certainly conservative since the statistic does not include the 35 percent of all first-year college students who did not take the SAT or ACT – most of whom enrolled at a community college. In addition, some of the students identified as having taken the “core” curriculum did not take Algebra II in high school and ended up needing math remediation in college. Nearly half (48.3 percent) of the high school graduates in 2004-2005 who enrolled at a Maryland college or university directly from high school were assessed as needing remediation in math, reading or writing. This problem has been concentrated at the community colleges, which have open admissions policies, and the historically black institutions. Nearly two-thirds of the students at these institutions were assessed as requiring remedial help in a basic skill area. Ninety percent of remedial enrollments in Maryland are found at two-year institutions, and the amounts of money spent on this type of assistance have increased over the years. This trend is likely to continue as the percentage of high school students enrolling in college continues to grow.
Percentage of 2004-2005 Maryland High School Graduates Who Were Assessed As Needing Remediation in Math, Writing or Reading in College

| Higher Education Sector | % Assessed as Needing Math Remediation | % Assessed as Needing Writing Remediation | % Assessed as Needing Reading Remediation | % Assessed as Needing Any Type of Remediation *
<table>
<thead>
<tr>
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<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Community Colleges</td>
<td>58.6%</td>
<td>31.2%</td>
<td>31.4%</td>
<td>66.4%</td>
</tr>
<tr>
<td>Historically Black</td>
<td>60.8%</td>
<td>27.3%</td>
<td>42.0%</td>
<td>66.3%</td>
</tr>
<tr>
<td>Institutions</td>
<td>7.8%</td>
<td>0.1%</td>
<td>2.8%</td>
<td>9.9%</td>
</tr>
<tr>
<td>Traditionally</td>
<td>10.5%</td>
<td>3.3%</td>
<td>5.1%</td>
<td>17.5%</td>
</tr>
<tr>
<td>White Institutions</td>
<td>42.2%</td>
<td>21.0%</td>
<td>22.9%</td>
<td>48.3%</td>
</tr>
</tbody>
</table>

* Indicates the percentage of students assessed as needing remediation in math, writing, OR reading.

In 1995, the Maryland Partnership for Teaching and Learning preK-16, an alliance dedicated to the improvement of student achievement at all levels, was established. Major areas of attention of the Partnership have been (1) the alignment of high school graduation requirements with the academic requirements of first year entry-level college courses and (2) the administration of the PSAT to all 10th grade students as a diagnostic tool to gauge whether they are college-ready. In 2001, a task force appointed to study college readiness for disadvantaged and capable students made a number of recommendations to enhance preparation, particularly for minority and low-income students. Future Maryland high school seniors will have to pass competency tests in basic academic skills in order to earn a diploma, based on requirements approved by the Maryland State Department of Education.

Efforts have been undertaken through the Maryland Partnership for Teaching and Learning to keep high school students and their parents informed about the importance of following a recommended course of study in high school. School officials should make it a priority to stress the relationship between high school curricula and the avoidance of remedial coursework in advising students planning to pursue higher education. Having an adequate program of study in high school is of particular importance for reducing remediation among African American students, many of whom traditionally have been underprepared for higher education. More than two-thirds (69.2 percent) of the African American high school graduates in 2004-2005 who enrolled at a Maryland college or university right after high school required some form of remediation.

The need for remedial education is a critical issue that will continue to have a great impact on postsecondary education, both from a budget perspective and a capacity perspective. As part of the development of the model, the legislative commission should consider where remedial work should take place and how it should be funded. In addition, MHEC invites the legislative commission to consider the adoption of the Maryland Scholars curriculum or the equivalent of the University System of Maryland’s required college preparatory curriculum as the default...
curriculum for all high school students, with the option for students to take a less-demanding curriculum only with parental consent.

**Enrollment Growth**

The *2004 Maryland State Plan for Postsecondary Education* calls for the development of a coordinated statewide 10-year growth plan for all of higher education, the establishment of a growth strategy for the State for both traditional and nontraditional students, and specific growth goals for each of the public segments (with consideration of the projected growth of the independent segment). There are a number of issues that should be taken into consideration in the development of the 10-year growth plan.

During the past 20 years, total headcount enrollment in Maryland colleges and universities, public and independent, has grown by 37 percent, from 233,066 in 1986 to an opening enrollment in Fall 2006 of 319,549. The most significant percentage increase has occurred at the independent institutions with a 67.5 percent increase, while the largest number increase occurred at the four-year publics with headcount enrollment increasing by almost 39,000.

**Headcount Enrollment Growth by Segment, 1986—2006**

<table>
<thead>
<tr>
<th>Segment</th>
<th>1986</th>
<th>% of total</th>
<th>2006</th>
<th>% of total</th>
<th>Change 86-06</th>
<th>% Change 86-06</th>
</tr>
</thead>
<tbody>
<tr>
<td>Community Colleges</td>
<td>93,899</td>
<td>40.3</td>
<td>119,580</td>
<td>37.4</td>
<td>25,681</td>
<td>27.3</td>
</tr>
<tr>
<td>Public 4-year</td>
<td>105,534</td>
<td>45.3</td>
<td>143,633</td>
<td>45</td>
<td>38,099</td>
<td>36.1</td>
</tr>
<tr>
<td>Institutions</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Independents</td>
<td>33,633</td>
<td>14.4</td>
<td>56,336</td>
<td>17.6</td>
<td>22,703</td>
<td>67.5</td>
</tr>
<tr>
<td>Total</td>
<td>233,066</td>
<td></td>
<td>319,549</td>
<td></td>
<td>86,483</td>
<td>37.1</td>
</tr>
</tbody>
</table>

Total headcount enrollment at Maryland public colleges and universities is projected to grow another 21.8 percent (an increase of 55,723) by 2015. In other words, an additional 5,570 students will enroll each year for the next ten years. Based on present trends, enrollments are expected to grow by 15 percent (18,349) at the community colleges and 26 percent (37,374) at the public four-year colleges.

If present trends prevail, there will be a sharp difference between the community colleges and the public four-year institutions in the growth rates of full- and part-time undergraduates during the next ten years. At the community colleges, full-time students are projected to rise by 23 percent while part-time enrollments are expected to increase by only 11 percent. In contrast, at the public four-year campuses, full-time undergraduates are anticipated to increase by 17 percent while part-time undergraduate enrollments experience a 40 percent leap. It is projected that much of the part-time growth at public four-year institutions will occur at University of Maryland University College (UMUC) and will be accommodated by distance education rather than by traditional classroom buildings. UMUC has been the fastest growing Maryland public four-year due to their dominance in distance education.
The capacity of institutions to accommodate additional students will be key to the development of the 10-year growth plan. Between FY 2002 and FY 2007, the State supplied over $1.3 billion for capital construction for higher education institutions. The vast majority, $1.26 billion, went to the four-year public institutions for renovations, facilities renewal and construction of new buildings. The State provides only a portion of the capital costs for community colleges as the local jurisdictions supply from one-third to one-half of the total costs. Despite several years of significant spending on construction by both the State and the local jurisdictions, the community colleges report in the Legislative Agenda 2007 that they “do not have adequate space to meet the existing and projected demand for higher education by native Marylanders.” In addition, data indicate that both the public four-year institutions and the independent institutions will need additional space to accommodate enrollment growth in the future.

The level of tuition and fees can be a major determining factor for students and families in selecting a higher education institution. From FY 1995 to FY 2005, tuition and mandatory fees at the Maryland four-year public institutions increased an average of 92 percent. During the same time period, tuition and mandatory fees at the community colleges rose an average of 58 percent. However, when room and board, supplies, commuting and other personal expenses are factored in, the total cost of attendance at some of the community colleges is the same or even higher than at some of the four-year public institutions. These increases are considerably above the inflation rate.

The 10-year plan should be based on guaranteeing access in the most cost-effective manner while meeting the educational aspirations of students. How the additional projected students are distributed among the segments of higher education will have a significant impact on the statewide model. A key to achieving the 10-year growth plan will be the proportional distribution of the growth in enrollment among the segments. It will be important to develop state policies that will encourage the enrollment of students in accordance with the growth plan.

Cost Containment

The cost of a higher education has been a concern of Maryland officials, legislators, and the general population for a number of years. For a period of time, State appropriations were provided to the University System of Maryland (USM) to offset costs which would have resulted in an increase in tuition. This occurred in fiscal years 1998 to 2002 where tuition increases were held to 4% annually and the average annual increase in State appropriations was 10.8%. However, due to budgetary constraints, this trend reversed itself beginning in fiscal 2002. From fiscal 2002 to 2006, tuition and fees at the University System of Maryland institutions increased at an average annual rate of 10.1 percent, while State appropriations for the institutions decreased in fiscal 2003 and 2004 by 6.1 percent and increased modestly by 1.5 percent in fiscal 2005. The overall tuition and fee increase from fiscal 2002 to 2006 was 40.5 percent. In addition, tuition and fees increased at community colleges by 23.6 percent. The increasing financial burden placed on students and families created an outcry from the public and lawmakers to control the costs of higher education. To do so, the institutions themselves implemented initiatives to control costs and lawmakers introduced legislation to address the issue.

Institution initiatives include renegotiating contracts, reducing advertising and mailing costs, realigning utility contracts to qualify for rebates, competitive contracting, business process reengineering, consolidating administrative systems, and space and building efficiencies. Through these efforts, the community colleges have reported a total of $54.5 million in cost
savings between fiscal 2002 and 2006. The four-year public institutions have reported a total cost savings of $236.5 million.

The USM also implemented the Effectiveness and Efficiency (E&E) Program to optimize the use of system resources and effectively manage its fiscal, enrollment demand, and personnel challenges. The USM achieved cost savings of $17.8 million in fiscal 2005 and $24.7 million for fiscal 2006 through initiatives related to the E&E program. The System also expects cost savings of over $25 million in fiscal 2007 related E&E efforts.

To control increases in tuition, numerous pieces of legislation have been introduced in the last few years either to limit tuition increases or provide State tax deductions or exemptions for tuition and other related higher education expenses. Whereas, most of this legislation did not become law, it did put sufficient pressure on USM institutions to cap the average resident undergraduate tuition increase in fiscal 2006 at 5.6%.

During the 2006 session legislation passed, SB 959 Higher Education – Tuition Affordability Act of 2006 (Ch. 57, Acts of 2006), to hold tuition charges for resident undergraduate students at USM institutions and Morgan State University at the 2005-2006 level for academic year 2006-2007; and hold resident tuition increases at St. Mary’s College of Maryland to 4.8%. Funds that were over budgeted for health insurance expenses at USM and MSU were used to enable the institutions to freeze tuitions at the 2005-2006 level. This legislation also established the legislative Commission to Develop the Maryland Model for Funding Higher Education. This group is to review Van de Water Consulting’s report, Meeting Maryland’s Postsecondary Challenges, and make recommendations relating to the establishment of a consistent and stable funding mechanism to ensure accessibility and affordability while at the same time promoting policies to achieve national eminence at all of Maryland’s public institutions of higher education. As part of the development of the funding model, the legislative commission should explore cost containment measures to create efficiencies and limit the costs to students.

**Conclusion**

The following report, Meeting Maryland’s Postsecondary Challenges: A Framework to Guide Maryland’s Public Investments in Postsecondary Education in the Coming Decades, is presented to the Commission to Develop the Maryland Model for Funding Higher Education to serve as a foundation for the discussion to establish a postsecondary education model to ensure accessibility and affordability while at the same time promoting the achievement of national eminence at Maryland public higher education institutions. The implementation of the report’s insightful recommendations and accountability measures will position Maryland to meet the needs of the growing postsecondary education population and the demand for a highly educated workforce by Maryland businesses.
MEETING MARYLAND’S POSTSECONDARY CHALLENGES

A Framework to Guide Maryland’s Public Investments in Postsecondary Education in the Coming Decade

Prepared for the Maryland Higher Education Commission
In accordance with Request for Proposals (RFP) R62SO197302 For an Effective Postsecondary Education Statewide Model And Maryland Standard Contract Dated January 4, 2006

Prepared by Van de Water Consulting LLC www.vandewaterconsulting.org

September 8, 2006
LETTER OF TRANSMITTAL

September 8, 2006

Ms. Paula Fitzwater
Director of Grants
Maryland Higher Education Commission
839 Bathgate Road
Annapolis, Maryland 21401

Dear Ms. Fitzwater:

Attached is Van de Water Consulting LLC’s report on developing a framework to guide Maryland’s investments in postsecondary education during the coming decade.

Because our study team was impressed with Maryland’s postsecondary education enterprise we sought to build on the State’s past successes with the goal of placing Maryland in a strong competitive position for the long term future. We believe our report presents a framework that, if adopted and implemented, will push Maryland to the forefront of public postsecondary education in the United States.

Should you have any questions, please do not hesitate to contact me at 303.506.7859.

Sincerely,

Spud Van de Water

Gordon (Spud) Van de Water, Ph.D.
President

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Centennial, Colorado 80122           voice: 303.506.7859; fax: 303.694.0646
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ACKNOWLEDGEMENTS

This study could not have been completed without the first rate assistance of a highly qualified study team drawn from Van de Water Consulting’s national network of higher education policy researchers and practitioners (see study team information on the inside back cover).

The team was greatly assisted by Paula Fitzwater, our Maryland Higher Education Commission liaison. Ms. Fitzwater made sure that we had every available piece of data, arranged our interviews, provided access to MHEC staff and efficiently answered what must have seemed like an endless stream of questions.

Insights into Maryland’s higher education system and its future needs was provided by the 36 higher education, legislative and executive branch leaders who graciously made time in their busy schedules to participate in wide ranging interviews. We appreciate their openness and willingness to share their views.

Finally, the sharp eye and reportorial mind of Suzanne Weiss has made the final product a cleaner, easier document to read.

We have done our best to provide Maryland with guideposts for future decisions. Any errors that remain in our effort are our sole responsibility.

Gordon (Spud) Van de Water
September 2006
MEETING MARYLAND’S POSTSECONDARY CHALLENGES
A Framework to Guide Maryland’s Public Investments in
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PREFACE

In the 2004 Maryland State Plan for Postsecondary Education, an overarching goal and accompanying action recommendations were developed to serve as a preface to the other goals in the document. Maryland’s leaders understand that the State has a responsibility to ensure that all sectors are adequately and effectively coordinated to make postsecondary education a key and integral component of public education for Maryland citizens. The Maryland State Plan for Postsecondary Education calls for the development of a comprehensive framework to guide future decisions relating to financing postsecondary education in Maryland.

The Maryland Higher Education Commission contracted with Van de Water Consulting LLC to work on this very important undertaking. We were asked to examine the appropriate relationship between and among tuition levels, state appropriations to higher education, and student financial aid; examine postsecondary education statewide models that effectively integrate policies on tuition levels, state appropriations to higher education, and student financial aid; recommend a framework for financing Maryland postsecondary education; and participate in the subsequent development of a new approach for funding Maryland postsecondary education.

The Commission on Higher Education asked that the recommendations address:

a. Proposed policy changes that would integrate policies on tuition levels, state appropriations to higher education, and financial aid to ensure access for Maryland citizens to postsecondary education and to meet the needs of the State for an educated workforce;

b. The impact of proposed policies on the balance between the student share and the State share of the cost of higher education;

c. A timeline for implementing policy changes; and

d. Possible accountability measures of outcomes to evaluate the effectiveness of the adopted model.

During the 2006 legislative session, the legislature passed SB 959 and HB 1381 enacting the “Tuition Affordability Act of 2006.” In addition to imposing limits on tuition increases, the Act establishes a Commission to Develop the Maryland Model for Funding Higher Education. This 27-member legislative commission includes senators, delegates, college presidents, higher education leaders, business community representatives, and members of the public. The commission plans to review our report and make recommendations to the Governor and General Assembly by December 31, 2007.

Funding for the consultant study was provided by a grant from Lumina Foundation for Education and the USA Funds. Lumina Foundation for Education is an Indianapolis-based, private foundation dedicated to expanding access and success in education beyond high school. The views expressed in this report do not necessarily represent those of Lumina Foundation, its officers or its employees. USA Funds, the nation’s leading education-loan guarantor, is a nonprofit corporation that works to enhance postsecondary education preparedness, access and success by providing and supporting financial and other services. The views expressed in this report do not necessarily represent those of USA Funds, its officers or its employees.
EXECUTIVE SUMMARY

Few states are better positioned than Maryland to compete and prosper in an increasingly knowledge-based global economy. Maryland has one of the best-educated populations and most highly skilled workforces in the nation, and a postsecondary education enterprise with notable strengths -- a diverse array of institutions, a supportive political culture, a well-articulated plan, a record of collaboration within and across education levels, and significant efforts to increase access through distance learning and regional centers.

But Maryland’s ability to maintain its competitive edge hinges on steadily enlarging – and strategically investing in – postsecondary education and training opportunities for its citizens over the next decade and beyond. State leaders face three interrelated challenges:

**Increasing the number and proportion of Marylanders entering college, persisting and completing degrees.** Maryland outperforms many states on measures of educational achievement and attainment: college entrance and degree completion rates, the percentage of residents over the age of 25 with a bachelor’s degree or higher, and median income. But a closer look reveals troubling disparities. Poor and minority students – the fastest-growing portion of the school population – are significantly less likely to be prepared for, pursue and complete education and training beyond high school. Nontraditional college students are far less likely to graduate than fulltime students at four-year institutions. And the state’s success in attracting professional and technical workers educated in other states masks the fact that (1) Maryland is a net exporter of college students and (2) the state’s colleges and universities award fewer than the average number of degrees for its eligible population. Finally, while Maryland’s median income is $10,000 above the national average, the median incomes of the lower quintiles are similar to the national average.

**Improving access to postsecondary education and training for low-income and minority students.** Maryland is among the 10 states with the highest nonwhite populations. By 2014, its high school graduating class will be “minority-majority” due to the rate of growth in the black, Hispanic and Asian-Pacific Islander populations. Low-income and minority students are less likely to be well prepared for college and more likely to be discouraged by high tuition and
complex student financial aid systems. While Maryland has substantially increased funding for need-based aid over the past several years, on a critical performance measure -- the affordability of postsecondary education – it ranks 30th among the 50 states.

**Accommodating enrollment growth and optimizing capacity.** With growth in the 18-24 age group, improved high school preparation and increased participation rates among adults, enrollment in Maryland’s public colleges and universities is expected to increase by 55,700, or 22%, by 2015. This growth will require an increase in capacity more than twice the undergraduate enrollment at UM-College Park. From another perspective, this means Maryland needs at least 5,570 new spaces every year for the next decade (assuming an even distribution of demand over time).

In the face of these challenges, the *2004 Maryland State Plan for Postsecondary Education* gives top priority to the development of a financing model that reflects and reinforces the state’s commitment to making postsecondary education accessible and affordable for all Marylanders.

The Maryland Higher Education Commission (MHEC) engaged Van de Water Consulting to propose a model that combines the best features of Maryland’s current policies and processes with those of similarly situated states that have had greater success in maintaining access and affordability.

Nine states were identified as peer states—Connecticut, Illinois Massachusetts, Minnesota, New Jersey, New York, Pennsylvania, Virginia and Washington—on the basis of the similarity to Maryland of their tuition policies and state average family income. Each of these states ranked higher than Maryland and higher than the national average on a key measure of financial access, the aid-to-tuition ratio—indicating that need-based student financial aid allocated to students attending public institutions covered more of the weighted average tuition and fees at public two- and four-year institutions than was common in other states.

The recommended model for Maryland calls for:

- Defining the state’s goals for postsecondary access and affordability in measurable terms
- Better coordinating planning and budget development
- Aligning policy decisions about three funding components – appropriations to higher education, tuition and fees at public institutions, and allocations to student financial aid
- Amending student aid programs to reflect and support the state’s goals for postsecondary access and affordability.

### Recommendation 1.
**Set Specific Goals for Access and Affordability**

The general goals of the *2004 Maryland State Plan for Postsecondary Education* are widely supported but are not specific enough to serve as implementation guides. The following objectives should be adopted to support implementation of the State Plan. Progress toward these objectives should be monitored on an annual basis.
• Increase the participation rate of low-income students and close the gap in college-going and degree-completion rates between low- and high-income students.

• In student financial aid, place priority on meeting the needs of lowest income and non-traditional students.

• Continue to increase allocations to need-based student financial aid.

• Improve Maryland’s rating among states on national measures of affordability.

• Increase the share of higher education costs funded by state appropriations.

### Recommendation 2. Strengthen Coordination of Planning and Budget Development

The schedule and process for developing Maryland’s higher education budget should be amended to promote more collaborative, better-informed decision-making. Specifically:

- The University System should inform MHEC of the parameters of its budget request, prior to submission to the Governor, so that student-aid funding requests take into account tuition increases.
- The MHEC staff should provide the Governor, during the budget preparation cycle, with analysis of the implications of proposed appropriation levels for tuition and fees and student aid.
- The MHEC staff should provide timely policy analysis to the Governor and the Legislature on the extent to which the budget request for higher education fulfills the goals of the state plan.

Consideration might also be given to establishing a “higher education affordability committee” that would meet annually to provide guidelines for setting tuition levels and related changes to student financial aid. This committee could be modeled on the Legislature’s Spending Affordability Committee. It could be supported by MHEC and convened by MHEC, the Legislature or the Governor.

### Recommendation 3. Align State Appropriations, Tuition, and Student Aid

Appropriations, tuition and student financial aid should be aligned by adopting a framework to guide budget development and inform governmental and higher education leaders prior to budget decisions being made. The framework, as detailed in the full report, should include: (1) identifying the funding needs of higher education; (2) determining the proportion of those needs to be funded
by state appropriations, and tuition and fees paid by students; (3) balancing increases in tuition and fees with increases in student financial aid.

Maryland has a reasonable method for identifying the funding needs of higher education based first on the USM funding request using the guidelines developed by MHEC, and then the Cade and Sellinger formulas.

Consideration should be given to adopting a framework that informs decisions about the appropriate share of those costs paid by students and by state appropriations. The policy could be tied to the average among the peer states examined in this study and expressed as a goal to be achieved; for example, “Over the next 10 years, the share of higher education costs paid by state appropriations will be increased until the state’s share is 58% of the total costs and students’ share is 42%.” Such a policy should be updated every three years based on new data. A companion policy might call for “state student aid allocations to equal 10% of tuition and fee revenues within 10 years.”

Recommendation 4. Use Student Aid to Make Postsecondary Education Affordable for All Citizens

Boost funding for need-based aid at a rate faster than tuition increases and enrollment growth, and focus on assisting students with the greatest needs and disadvantages. To match the efforts of peer states, Maryland will have to continue increasing both the level of support provided to individual students and the number of students aided. Most of the peer states fund maximum awards that approach the average cost of tuition and fees at public two- and four-year colleges, and have application deadline dates that extend to the start of the fall term. As a short-term strategy for increasing support for the neediest students, Maryland should consider establishing an Expected Family Contribution cutoff of $10,000 and/or college cost cap that would effectively eliminate families with incomes near or above the state median from eligibility for the EAG program.

Consolidate financial aid programs. In FY06, MHEC administered 28 separate programs providing need- or merit-based aid – many more programs than typically found in other states. Work should continue toward consolidating these programs and emphasizing one large, highly visible student aid program based primarily on financial need, serving students on a first-come, first-served basis, and allowing them to know their eligibility status as early as possible.

Increase awareness of student aid through outreach efforts. Maryland’s projected growth in enrollment will not only increase the size of the pool of students requiring financial assistance but also result in a more diverse group of students with less experience and familiarity with the college admissions calendar. Expanded outreach to these students early in the education pipeline will be critical. Special efforts should be made to reach underserved populations -- first-generation students, low-income students, underrepresented minorities and students with disabilities.

The full report is available from the Maryland Higher Education Commission, 839 Bestgate Road, Suite 400, Annapolis, MD 41401; 410-260-4500; www.mhec.state.md.us.
MEETING MARYLAND’S POSTSECONDARY CHALLENGES
A Framework to Guide Maryland’s Public Investments in Postsecondary Education in the Coming Decade

Introduction

Since its creation in 1988, the Maryland Higher Education Commission (MHEC) has been charged with developing and updating a statewide plan for postsecondary education.¹ The current version, 2004 Maryland State Plan for Postsecondary Education, was issued in December 2004 and is guided by this principle: “All Maryland residents who can benefit from postsecondary education and desire to attend a college, university, or private career school should have a place in postsecondary education and it should be affordable” (p. iii).

Like other states, policy decisions and economic conditions in Maryland over the past few decades have shifted the costs of a postsecondary education from the state to students and their families, thus undermining the Plan’s guiding principle. The 2004 State Plan calls for a new model:

[T]he State of Maryland has a basic responsibility to provide postsecondary education adequately and efficiently. To this end, Maryland should develop a postsecondary education model that will link tuition policy, State support to institutions, and State and institutional financial aid to address such issues as student access and the particular needs of the state. The discussion of this model should include consideration of the appropriate State portion in the funding of higher education and the appropriate level of student financial obligation. Over several decades, the burden of financing higher education has shifted from the State to the student without a formal public discussion of this fundamental precept. While higher education is a private benefit, it is also unquestionably an enormous public good. With considerable evidence that a highly educated citizenry is the key to the prosperity of a state, it is time for an in-depth, organized public debate to occur on the model of higher education that will underlie our State’s policies. (pp. 6-7)

¹ The term “postsecondary education” embraces all formal learning conducted at levels beyond high school. It is broader than the older term “higher education” which has traditionally meant colleges and universities.
This report builds on Maryland’s past success and offers a financing framework to guide Maryland’s public investments in postsecondary education over the coming decade. The key questions addressed are these:

- What are Maryland’s current strengths and challenges?
- What can Maryland learn from other states’ approaches to investing in postsecondary education?
- What criteria should guide a new Maryland model?
- What are the choices available?
- Which model is the best fit for Maryland?

The framework recommended here is limited to guiding how public dollars flow in support of Maryland’s goals for postsecondary education. It does not address how Maryland colleges and universities are governed nor can it be used to guide the academic development of Maryland campuses.

The report has six sections: (1) an overview of Maryland’s strengths, current goals and approach to providing fiscal support; (2) Maryland’s challenges over the next decade; (3) how states serve and support public purposes; (4) an analysis of the funding components and higher education outcomes in Maryland and peer states; (5) an examination of frameworks appropriate for Maryland; and (6) a recommended framework for Maryland.

### Maryland Voices
(from interviews conducted by Van de Water Consulting)

“Education is a top priority for the governor – K-12 and higher education.”
Governor’s staff

“The legislature has always taken education – pre-K through 16 – as a priority item for Maryland.”
State legislator

“There is a college in every legislative district. Legislators can’t love them enough.”
Legislative observer

“To me, the needs of students come first, the needs of the state come second and the needs of the institutions come third.”
Citizen leader

“From a financing perspective, serving Maryland’s low income students is the biggest problem the state faces.”
University leader

“Costs to students are far and away the most important issue.”
College president

“If nothing changes in financing higher education, tuition will continue to rise and students will be priced out, facilities will deteriorate, and classrooms will be overcrowded.”
Higher education analyst
Section One
The Maryland Context:
Strengths, Current Goals and Methods of Providing Fiscal Support

Postsecondary Strengths

Maryland’s higher education enterprise has numerous strengths, among them:

- A diverse array of institutions, including 13 comprehensive public colleges and universities, 31 independent two- and four-year degree-granting institutions, 16 comprehensive community colleges and 163 career and vocational schools
- A supportive political culture that recognizes and fosters the benefits of postsecondary education
- A well-articulated plan for developing a higher education system responsive to student and state needs
- A nationally recognized model for developing and delivering distance learning
- A record of close collaboration among different institutional types and across education levels, primarily through the statewide K-16 Council
- A developing array of regional higher education centers bringing high-demand programs to place-bound students in support of workforce development efforts.

The data analysis conducted for this study reveals that Maryland is at or above the national average on measures of postsecondary participation and degree completion. However, it was clear from our interviews that higher education and governmental leaders believe that average is not good enough for Maryland. Recent increases in need-based student financial aid programs indicate that there is a commitment to improving affordability and bringing student financial aid into balance with relatively high tuition, particularly at public four-year institutions.

Maryland ranks first among states in the percentage of professional and technical workers in the labor pool. In addition to high degree attainment, income levels are high. The median income is about $10,000 above the national median. The Governor and the Legislature have placed priority on higher education in recent years. The University System has improved efficiency and effectiveness and earned the confidence of governmental leaders.

Three additional factors provide context to development of a framework for financing higher education. First, Maryland is among the 10 states with the highest non-white populations (U.S. Bureau of the Census). By 2014, Maryland’s high school graduating class will be “minority-majority” due to the rate of growth in the black, Hispanic and Asian-Pacific Islander populations (WICHE, 2005). Second, while Maryland’s median income is above the national average, the median incomes of the lower quintiles are similar to the national average. Third, with growth in the 18-24 age group, improved high school preparation and increased participation rates among adults, enrollment in Maryland’s
public colleges and universities is expected to increase by 55,700 or 22% by 2015 (MHEC, 2006).

Current Goals

The official statement of postsecondary goals for Maryland is articulated in the **2004 Maryland State Plan for Postsecondary Education**. The State Plan is based on the work of a blue-ribbon panel appointed by Governor Ehrlich to advise the Maryland Higher Education Commission. This panel of 38 leaders was drawn from Maryland’s colleges and universities, political leadership (legislators and cabinet members) and business and community activists. It was supported by 68 experts from state government and postsecondary education. After eight months of intensive work, the panel submitted its recommendations to MHEC, all of which were incorporated into the State Plan.²

The first action recommendation in the State Plan directs MHEC to “initiate a comprehensive process to develop a postsecondary education model that will address the linkage of tuition policy, State support to institutions, and institutional and State financial aid in regard to student access and the needs of the State” (p.14). This report is a central component of MHEC’s comprehensive process. The focus is on the development of a framework that integrates policies on higher education appropriations, tuition and fees, and state student financial aid.

Before developing an approach to serve Maryland over the coming decade, the study team conducted 36 interviews with Maryland leaders to probe their views on the state’s goals for higher education, the challenges Maryland faces and possible responses to the challenges.

Two things are clear from these conversations: (1) Maryland leaders support the goals of the 2004 State Plan, although institutions are more invested than legislators; and (2) Maryland leaders do not perceive that postsecondary education is in crisis. Rather, the prevailing view is that the state has slipped into a pattern of raising tuition and fees during times of public budget constraints.

² The Plan is available at [http://www.mhec.state.md.us/higherEd/2004Plan/MHEC_PostSec04.pdf](http://www.mhec.state.md.us/higherEd/2004Plan/MHEC_PostSec04.pdf).
without being guided by a widely understood and accepted model for balancing public and individual/family support. This has heightened concerns that ad hoc public policy decisions have had the unintended consequence of closing the door to college for many of Maryland’s families. One Annapolis observer voiced an oft-expressed sentiment by saying:

*The timing for this study is a normal outgrowth of MHEC’s planning process. It comes at a time when the governor and the legislature are concerned about Maryland’s “F” for affordability awarded by the 2004 *Measuring Up* report.*

Political leaders see this as “going in the wrong direction” and would like to change course.

### How Maryland Allocates Resources to Support Goals

**Appropriations.** Traditionally in Maryland the budget cycle begins with the announcement of a budget spending target by the Spending Affordability Committee, a 24-member group of leading legislators and prominent citizens. The FY07 original target was for an 8.9% increase. This is the bottom-line figure that the legislature uses as a goal when it receives the governor’s budget request. Unlike other states, Maryland’s legislature is restricted to deleting or reducing items from the governor’s budget, thus giving the governor an exceptionally strong position in the budget process. The governor is not bound by the Spending Affordability Committee’s recommendations and may, as he did in the current budget cycle, set a higher spending target based on his own analysis of the state’s projected economic performance.

As a priority item within the FY07 governor’s budget request, higher education was recommended for a $172 million increase over FY06 levels. Within the overall amount for higher education, the key budget number is the state operating appropriation for the University System of Maryland (USM). USM’s budget request is built using MHEC’s peer-based budget guidelines developed in 1999. The final amount, however, is negotiated between the USM Chancellor and the Governor’s Office. Once set, a portion of this amount drives statutory formulas that determine state support for independent colleges and universities as well as the state’s 16 community colleges. MHEC plays no role in this negotiation.

Independent colleges and universities receive state support through the Joseph A. Sellinger program that was begun in the 1970s as a way to stabilize independent college

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3 *Measuring Up 2004* is the third in a series of national report cards published by the National Center for Public Policy and Higher Education in San Jose, California. The report is available on the web at [http://measuringup.highereducation.org/default.cfm](http://measuringup.highereducation.org/default.cfm).

4 The base document guiding development of higher education operating budgets in Maryland is the MHEC publication “Higher Education Operating Funding Guidelines, Interim Report”, August 1999. Subsequent updates have refined the basic approach without fundamentally altering it.
finances and recognize their role in serving Maryland’s students and economy. The current formula provides 16% of the full-time equivalent student (FTES) amount which supports students at selected USM institutions, times each independent institution’s certified fall enrollment for the preceding year.

In a similar fashion, state aid to community colleges is provided through the John A. Cade formula, which is based on 25% of the average appropriation per FTES at selected four-year public institutions times the number of FTES eligible for state aid at the community colleges two years prior to the funding year. (Baltimore City Community College operates on a similar formula but, because it is state-run, receives a much higher percentage to offset the lack of local support.) Legislation passed in 2006 gradually increases the percentage to 30% by 2013. A similar increase is provided for Baltimore City Community College.

When asked to identify needed changes in the budget development process and funding formulas, Maryland campus and political leaders uniformly supported the current methods. As one veteran legislative leader remarked:

The Sellinger and Cade formulas have worked very well. Linking sectors is a great incentive for the sectors to work together. They sing with one voice. Johns Hopkins knows that if we increase funding for USM, they will benefit. Why give Johns Hopkins a dime? They won’t move if we don’t give them money. It does help them know they are part of the state and it gives us leverage if we need something from them. I have no qualms about supporting them.

**Tuition.** In Maryland, tuition decisions are made by institutional governing boards. Traditionally, campus leaders and political leaders have operated with a tacit understanding that if campus leaders work to keep tuition increases low, legislative leaders will work to increase state support. The last decade put a severe strain on this relationship as tuition rates rose rapidly through the economic good times of the 1990s and the recession earlier this decade.5

Legislators expressed serious concerns about rising tuition levels. Here’s how one powerful legislator put it:

We have bills in this year on freezing tuition. Tuition went up almost 60% over a couple of years. It’s awful. We’re pricing our people out of the operation. We can pass a law that requires them to freeze tuition for two years. . . Middle class Americans are the ones who are getting hit – energy, health care, college – they need help.

One citizen leader expressed a different perspective:

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5 From FY1994 through FY2004, community college tuitions and mandatory fees rose, on average, 55% and public four-year tuition and mandatory fees rose 90%. Source: MHEC Trend Book, May 2005, pp. 116 and 121.
But, playing devil’s advocate, by having low tuition costs we are subsidizing the rich. It’s very clear that Maryland’s student profile is more and more affluent each year. All we are doing by keeping tuition low is subsidizing students who could afford to pay more and eliminating potential for increasing support for student aid for those students who need it. What’s the right balance there? I don’t believe that poor people should be subsidizing the rich to go to school.

Student Financial Aid. In FY06, MHEC administered 28 state student financial aid programs totaling $94.8 million and assisting more than 27,000 students at four-year institutions (27% of all Maryland enrollees), more than 12,000 community college students (10.4% of all Maryland enrollees) and almost 6,500 students at independent colleges and universities (21.4% of all Maryland enrollees). MHEC’s FY07 aid budget will increase $16.5 million. MHEC aid administrators anticipate serving an additional 2,350 students and increasing maximum award levels to $3,000. The governor’s staff thinks they are on the right track:

The real question for us is how can we offer all of our students an opportunity to move on to higher education – using federal, state and foundation funds. The governor has led the way for advocacy of need-based student aid as well as providing greater access through greater capacity. The Regents have determined that, within USM, the growth institutions will be Towson and Salisbury. . . From our vantage point, you have to look at everything holistically. Maryland is wealthy overall. The important thing is to aid those who need it – which we’ve been doing. We need to get recent data. Our sense is that we have not yet met the need that is out there (Governor’s office).

Interviewees generally recognized the importance of increased need-based student aid and praised the governor for his strong moves in this direction.

It’s fair to continue moving more toward need-based aid. Absolutes are not appropriate. We need to serve everyone, including a merit component for middle-income students. We need to remain flexible to respond as conditions change (Legislator).

We very much support the state’s need-based programs and believe the governor has made the right choice to move away from merit and toward choice. Need is going up. There have been recent changes in the need-based programs to provide additional assistance to students who miss the March 1 deadline and additional resources for community college students. We’re told that’s in direct response to the Measuring Up report (Independent college leader).

In order to better understand the extent of unmet financial need among Maryland students, the MHEC Office of Student Financial Assistance is in the process of implementing “a student record-based system designed to evaluate financial aid
effectiveness”.6 The first full report based on data from this system, released by MHEC in May 2006, analyzes the distribution of financial aid among students from different economic backgrounds. MHEC plans to release a companion report this fall focusing on the aid received by students based on their level of need using cost of attendance and expected family contribution. This information system gives MHEC the capability to conduct studies that will provide Maryland leaders with a much clearer picture of students’ financial needs and how well the state is helping to deal with the cost burden.

Policymakers and financial aid administrators are also addressing Maryland’s plethora of student aid programs. They understand that having 28 separate programs is confusing to students, families, administrators and policymakers. Last year the legislature directed MHEC “to establish a workgroup to study the consolidation of economic development student assistance grants and work-based shortage grants into a single financial assistance program.”7 This charge sought to consolidate 11 of the state’s 28 programs. This is the third attempt in recent years to consolidate programs. The first two efforts – one by the Department of Budget and Management and by a private consulting firm – resulted in grouping programs into five types: need-based grants, merit-based scholarships, assistance contingent on service commitments, assistance for unique populations and legislative scholarships.

The current effort recommended that a broad-based advisory council be established and charged with identifying critical occupational shortage areas and postsecondary programs capable of preparing students in these areas. Scholarships would then be made available as an incentive for students to enroll in programs in these areas. The 2006 legislature approved these recommendations. Implementation will begin during the summer of 2006.

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Section Two
Maryland’s Postsecondary Challenges

Maryland prides itself on being a wealthy state with a 21st century knowledge-based economy. In general, its highly educated population holds good jobs and values education for its offspring. These families expect their sons and daughters to go to college and they save to meet the rising costs. What is less apparent at first glance is Maryland’s considerable poverty amidst plenty. Spread unevenly across Maryland’s 24 counties, this lower half of the income spectrum holds the key to Maryland’s future prospects.

Why? As the global playing field levels, Americans will continue to see factory jobs and other low-skilled jobs relocate beyond our borders. In each successive generation, fewer and fewer jobs require minimal education and there will be increasing demand for workers with higher-level language, calculation and technical skills. This does not argue for every person under 25 earning a baccalaureate degree but it does point to the need for boosting secondary school completion rates and postsecondary enrollment rates to ever-increasing highs.

The National Context

The United States held a competitive advantage over all other countries in the last half of the 20th century because of its vast natural resources, high levels of educational attainment, and innovative and entrepreneurial genius. However, advances in technology and the globalization of the economy along with the growth of the European Union and the rise of China, India and other developing countries has greatly increased global competition for design and management functions, not just the unskilled work that launched American corporations’ decisions to outsource. Thomas Friedman suggests that U.S. companies “…are not just outsourcing to save on salary. They are doing it because they can often get better-skilled and more productive people than their American workers.” (Friedman, 2005)

America is being outpaced by both India and China in the number of college graduates. As Bill Gates pointed out in a presentation to the National Governors Association, “In 2001, India graduated almost a million more students from college than the United States did. China graduates twice as many students with bachelor's degrees as the U.S., and they have six times as many graduates majoring in engineering.” (Gates, 2005). Educational opportunities are expanding in Europe, India and Asia and attracting many of the students who in the past would have enrolled in U.S. colleges and universities and stayed on to fill our demand for scientists and engineers.

The U.S. Chamber of Commerce reports that the most important challenge for the United States is not a shortage of jobs but of workers. “We are staring right in the face of a severe worker shortage as 77 million baby boomers prepare to retire…with fewer
numbers of younger workers available to replace them. Moreover, many new jobs will require more technical skills and a greater understanding of math and science—subjects in which American students fail to show a suitable level of competence or even interest.” (U.S. Chamber of Commerce, 2006)

Challenges for Maryland

Maryland is fairly well positioned to compete in the global marketplace. As the state’s Chamber of Commerce puts it, “Maryland is home to a well-educated, highly skilled workforce. The state ranks first among states in the percentage of professional and technical workers in the labor pool. Thirty-seven percent of Maryland's population age 25 and above hold a bachelor's degree or higher.” Correlated with high degree attainment are high income levels. The median income is about $10,000 above the national median and the gap between Maryland and national levels increases in the higher income quintiles. As noted above, the state’s postsecondary system has notable strengths—a diverse array of institutions, a supportive political culture, a well-articulated plan, a record of collaboration, and notable efforts to increase access through distance learning and regional centers.

Although Maryland has considerable assets, there are challenges for Maryland higher education in serving its residents and competing in the global economy. The consultants' review of national studies suggests three such challenges for Maryland (See the Appendix, Maryland and Peer States: Characteristics and Higher Education Outcomes).

Increasing the number and proportion of Marylanders entering college, persisting and completing degrees. Maryland’s high school graduation rates have improved substantially in the last decade (NCPPHE, 2004). High school graduation and college entrance rates are above the national average but below many of the states that might be considered peers. Maryland is among the top states in the graduate rates for traditional students—full-time students at four-year institutions—but its nontraditional students are far less successful (NCPPHE, 2004). Further, Maryland is a net exporter of college students—more students leave the state to go to college than come in from other states to attend Maryland institutions (U.S. Department of Education). Conventional wisdom suggests that students are less likely to return to their home state for employment when they attend college in another state. Finally, although the state’s colleges and universities award fewer than the average number of degrees for its eligible population, education levels are relatively high in part because the state is a net importer of degrees (NCHEMS, 2005).

From a public policy perspective, it is in Maryland’s best interests to develop all of its native talent pool to the level consistent with the state’s democratic and economic goals. As leaders are increasingly aware, that means some postsecondary credential for a much larger proportion of high school graduates than ever before. Here’s how two Maryland leaders summed it up:
The constitution calls for a thorough and efficient education system; it does not limit it to K-12. I think it should include postsecondary education because in today’s society and economy a high school diploma doesn’t cut it. It won’t be free but I’d like to move in that direction. I’d like to see an AA degree accessible to everyone. We’ve got a vibrant, very good public sector (Legislator).

People are now more aware of impending demographic changes. The demographics are with us now. If we don’t do something about those populations, the situation will get worse in terms of our social ecology, quality of life and workforce. We talk about the global economy – China and India are growing their education infrastructure quickly, especially science and engineering. The foreign talent that we have depended on for so long is now staying home and we are developing an economy around outsourcing. What that says to America is that you have to maximize the yield on your talent at home. The underrepresented segments are African-Americans, Latinos and other groups – these are the ones to develop (University leader).

Assuring financial access for low income and minority students. Maryland is among the 10 states with the highest non-white populations (U.S. Bureau of the Census). By 2014, Maryland’s high school graduating class will be “minority-majority” due to the rate of growth in the black, Hispanic and Asian-Pacific Islander populations (WICHE, 2005). While Maryland’s median income is above the national average, the median incomes of the lower quintiles are similar to the national average. Maryland’s poor are just about as poor as the rest of the country. Finally, Maryland ranks 30th among the 50 states on affordability according to Measuring Up 2004, the national report card on higher education. Low-income and minority students are less likely to be well prepared for college and more likely to be discouraged by high tuition and complex student financial aid systems.

One influential legislator summed up the prevailing view this way:

The legislature over the last three years has been very concerned about tuition levels and their impact on students at all levels. A couple of pieces of legislation were proposed and then the administration came back with an allocation that kind of addressed the issues. Still, tuition is continually inching up and we, as a legislative body, are still concerned. I think need-based scholarship dollars is still a goal for us.

Accommodating enrollment growth and optimizing capacity. With growth in the 18-24 age group, improved high school preparation and increased participation rates among adults, enrollment in Maryland’s public colleges and universities is expected to increase by 55,700 or 22% by 2015. This growth will require an increase in capacity more than twice the undergraduate enrollment at UM-College Park (MHEC 2006). From another perspective, this means Maryland needs at least 5,570 new spaces every year for the next decade (assuming an even distribution of demand over time).
As one future-oriented legislator said:

> I think Thornton will be successful – kids will be better educated, better prepared for college.\(^8\) It should hit colleges in 5-8 years. It would be a disaster to educate these kids and then say to them we have no place for you to go to college in Maryland.

This paper examines models used by other states to address similar challenges and to integrate policies on appropriations to higher education, tuition and student financial aid, and recommends options for consideration in Maryland.

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\(^8\) The 2001 Thornton Commission report led to The Bridges to Excellence program which guides Maryland’s investment of $1.3 billion in K-12 education.
Section Three
How States Serve and Support Public Purposes

State Investment in Postsecondary Education

Based on the premise that higher education is a public good, states have pursued the ideal of broad, affordable access since the 1950s. In addition to direct support for public colleges and universities, student financial aid programs, developed at both state and federal levels, have made opportunities available to low- and middle-income families. These strategies have been effective. In 1952, about 8% of adults had one to three years of college and 7% had attended four or more years. By 2004, college participation had more than tripled—25% of adults had some college or an associate degree and an additional 28% had completed a bachelor’s degree or higher (US Bureau of the Census, Current Population Surveys).

The guiding principle for Maryland’s 2004 plan for higher education is representative of the philosophy adopted by most states: “All Maryland residents who can benefit from postsecondary education and desire to attend a college, university or private career school should have a place in postsecondary education and it should be affordable.” Although the philosophies may be similar, programs and priorities may differ substantially among states based on the mix of institutions, state traditions, higher education leadership and organization, and political environment.

Maintaining access and affordability is particularly difficult during economic recessions when appropriations for higher education may be reduced while enrollments increase. Although there have been four recessions in the past 27 years, few states have developed the means to avoid roller-coaster funding for higher education. When appropriations decline, tuition generally increases and student aid may not keep pace. In addition to the effects of recessions, several factors have caused increased competition for state funds—the aging population, burgeoning prison populations, escalating health care costs, homeland security requirements and concerns about elementary and secondary schools. Because colleges and universities have tuition as an available source of funding, higher education’s share of the state budget has declined in most states. In recent years, tuition increases have been justified by the rationale that higher education is a personal benefit rather than a public good.

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9 In the two-year period following the 2001 recession, for example, appropriations per full-time-equivalent enrollment declined in 44 of the 50 states. Only New York, Georgia, Louisiana, Nevada, South Dakota, and Wyoming realized increases. In the two years following the recession, all states increased tuition, ranging from an 11 percent increase in Nevada to a 50 percent increase in Massachusetts (Washington Higher Education Commission data). In most states, student financial aid did not keep pace with tuition increases, resulting in declining affordability and access. 17 of the states increased student financial aid in this two-year period.
Models of State Investment

A model consists of an overarching goal, a policy or set of related policies, and strategies for implementing the policy. In addition, a complete model includes performance measures so that the model can be evaluated on a continuing basis.

The goal of providing access and affordability depends on policy decisions about three funding components—appropriations to higher education, tuition and fees at public institutions, and allocations to student financial aid. Although there are many variations, state models may be classified based on the relative balance of the three funding components. There tends to be a strong relationship between tuition and aid levels. States with relatively high tuition tend to have high student financial aid. The relationship between appropriations and the other two components is less clear-cut. Although several of the low-tuition states have high appropriations, some of the high-tuition states also have high appropriations.

<table>
<thead>
<tr>
<th>Policy</th>
<th>High tuition High aid</th>
<th>Moderate tuition Moderate aid</th>
<th>Low tuition Low aid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students and families will pay a larger share of the costs of higher education. State is responsible for assisting low-income students.</td>
<td>The state will share the costs of higher education with students and families.</td>
<td>The state will pay a larger share of the costs of higher education for all students.</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Strategies</th>
<th>Staff tuition increases as operating costs increase</th>
<th>Appropriations, tuition increases and student aid aligned in budget development process</th>
<th>Appropriations targeted to institutional support; Tuition increases regulated or limited by policies. If financial aid is available, it is targeted to the lowest-income students.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Tuition increases as operating costs increase</td>
<td>Appropriations, tuition increases and student aid aligned in budget development process</td>
<td>Appropriations targeted to institutional support; Tuition increases regulated or limited by policies. If financial aid is available, it is targeted to the lowest-income students.</td>
</tr>
<tr>
<td></td>
<td>State aid focused on those least able to pay</td>
<td>Increased flexibility to institutions to customize aid packages</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Outreach efforts to assure low-income students are aware of financing options</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Increased flexibility to institutions to customize aid packages</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Alignment Methods

The governor, legislature, higher education coordinating board, boards of trustees of systems or institutions, and leadership of colleges and universities have varying levels of responsibilities for these decisions. Ideally, decisions are informed and coordinated, but this is frequently not the case.
States use a variety of strategies to align decisions about funding components. In many states, the decisions are dispersed and uncoordinated. Typically, the governor and legislature determine appropriations for higher education, and colleges and universities establish tuition and fee levels. The student aid budget may be proposed by a coordinating board or the student assistance organization. Some states, however, have developed methods for integrating decisions about appropriations, tuition and student aid. For example, offsets for aid from tuition increases might be mandated, aid increases may be tied to appropriations, or tuition increases linked to appropriations. Section Five of this report provides examples of the approaches used by several states. In general, current methods include:

- **Formulas** that link two or three of the funding components. Formulas based on enrollment and other factors, for example, may be used to establish higher education’s funding needs and then appropriations and tuition increases balanced to meet these needs.

- **Mathematical models** provide information on the impact of changes on each of the components. Tuition increases and related student-aid needs, for example, may be estimated for various levels of appropriations.

- **Indexing and capping** that regulate tuition increases. The tuition caps may be linked to an agreement about appropriation levels.

These quantitative methods are used to identify a balance among the budget components. The application of these methods may be prescribed in statute, formalized as principles and guidelines, or serve as the basis for tradition and culture. Our review of the approaches used by peer states found that each of these approaches can be effective.

- **Legislation** may codify the alignment, typically the proportion of total higher education costs to be covered by state appropriations.

- **Principles and guidelines** may be developed at the state level, ideally with the involvement of key decision makers to identify common priorities and specify means for achieving priorities.

- **Tradition or culture** may play an important role in some states where access and affordability are continuing priorities for all decision makers.

**State Objectives and Policies**

In addition to aligning appropriations, tuition and aid, states use different policies to achieve certain objectives. Priorities such as improved high school graduation rates,
increased college participation by low-income students or greater educational capacity have implications for both tuition and student aid policy.

<table>
<thead>
<tr>
<th>Objectives</th>
<th>Tuition and Student Aid Policies</th>
</tr>
</thead>
<tbody>
<tr>
<td>Increase access</td>
<td>Student aid funds used to provide smaller awards for more students; vouchers; high need for marketing to low-income families; guaranteed tuition</td>
</tr>
<tr>
<td>Increase access for low-income students</td>
<td>Aid focused on low-income students; eligibility limited by income or EFC cutoff; high need for marketing to low-income families</td>
</tr>
<tr>
<td>Retention of best and brightest</td>
<td>Program based on performance measure such as GPA or college entrance examinations</td>
</tr>
<tr>
<td>Increase choice/address capacity issues</td>
<td>Provide larger awards to fewer students</td>
</tr>
<tr>
<td>Improve retention and completion</td>
<td>Focus funds on renewal students; guaranteed tuition plan; dual enrollment</td>
</tr>
<tr>
<td>Address workforce issues</td>
<td>Targeted and flexible programs</td>
</tr>
<tr>
<td>Increase minority student participation</td>
<td>Fund first-generation college students; extend application deadlines; provide more aid for part-time students</td>
</tr>
<tr>
<td>Improve academic preparation</td>
<td>Focus funds on students who complete core coursework</td>
</tr>
<tr>
<td>Ensure aid increases with tuition</td>
<td>Tie increases by law; offset of public tuition revenue for state</td>
</tr>
</tbody>
</table>

In addition to selecting student aid and tuition policies that support achievement of objectives, states may select a set of outcomes measures and regularly monitor progress. For example, states may examine trends in participation, persistence and degree completion rates among low-income and minority students to assess efforts to increase access. As the following section illustrates, there are several national databases that may be used to examine similar measures in peer states.
Section Four
Funding Components and Higher Education Outcomes
Maryland and Peer States

The first step in this project was the selection of states that might serve as models. Since Maryland is described as a high-income, high-tuition state, it was clear that higher education financing models developed by states with historically low tuition such as California or Arizona and states with unique economies such as Alaska, Nevada and Wyoming would not be appropriate as models. Although Maryland is a member of the Southern Regional Education Board, most southern states were also excluded as models because of relatively low per-capita personal income.

Nine states were identified as peer states—Connecticut, Illinois, Massachusetts, Minnesota, New Jersey, New York, Pennsylvania, Virginia and Washington—on the basis of their performance on a key measure of financial access. Each of these states ranked higher than Maryland and higher than the national average on the aid-to-tuition ratio—indicating that need-based student financial aid allocated to students attending public institutions covered more of the weighted average tuition and fees at public two- and four-year institutions than was common in other states). “Maryland and Peer States, Characteristics and Outcomes Measures” in the Appendix to this report provides comparative data on demographic characteristics, the funding components, and outcomes measures for Maryland and the peer states. Key factors are summarized in this section.

Table 1 provides a summary of the three funding components for higher education—state appropriations, tuition and fees, and student aid—for Maryland and the peer states. In 2004, Maryland ranked 25th among the 50 and 6th among the peer states in appropriations per full-time-equivalent (FTE) enrollment based on Grapevine data collected by Illinois State University. As expected, Maryland and most of the peer states show relatively high tuition for four-year public institutions. Maryland was ranked 7th among all states in tuition levels. Although Maryland’s allocation of need-based student aid was above the national average per FTE, it was well below the aid provided by eight of the nine high-tuition states.10

10 The most recent comparative data are used in this study. However, these data do not reflect the effects of Maryland’s investments in FY2006 and FY2007 in need-based student financial aid. These investments are considered in the recommendations developed. The data and analysis for Maryland and peer states is summarized in the Appendix.
### Table 1
**Funding Components Maryland and Selected States**

<table>
<thead>
<tr>
<th>States</th>
<th>Appropriations per Public FTE Enrollment</th>
<th>Rank among 50 States</th>
<th>Tuition and Mandatory Fees Public Four-Year Institutions</th>
<th>Rank 50 States</th>
<th>Need-based Student Aid per Public FTE Enrollment</th>
<th>Rank 50 States</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2004</td>
<td></td>
<td>2004</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>US</td>
<td>$6,620</td>
<td>-</td>
<td>$4,372</td>
<td>-</td>
<td>$216</td>
<td>-</td>
</tr>
<tr>
<td>Peer State Average</td>
<td>7,185</td>
<td>-</td>
<td>528</td>
<td>-</td>
<td></td>
<td>-</td>
</tr>
<tr>
<td><strong>Maryland</strong></td>
<td>6,620</td>
<td>25</td>
<td>5,892</td>
<td>7</td>
<td>288</td>
<td>15</td>
</tr>
<tr>
<td><strong>Connecticut</strong></td>
<td>$9,714</td>
<td>3</td>
<td>$5,565</td>
<td>9</td>
<td>$286</td>
<td>16</td>
</tr>
<tr>
<td><strong>Illinois</strong></td>
<td>7,165</td>
<td>15</td>
<td>5,333</td>
<td>10</td>
<td>510</td>
<td>5</td>
</tr>
<tr>
<td><strong>Massachusetts</strong></td>
<td>6,303</td>
<td>31</td>
<td>5,266</td>
<td>12</td>
<td>375</td>
<td>10</td>
</tr>
<tr>
<td><strong>Minnesota</strong></td>
<td>7,236</td>
<td>12</td>
<td>4,888</td>
<td>19</td>
<td>381</td>
<td>9</td>
</tr>
<tr>
<td><strong>New Jersey</strong></td>
<td>8,039</td>
<td>8</td>
<td>7,261</td>
<td>1</td>
<td>659</td>
<td>2</td>
</tr>
<tr>
<td><strong>New York</strong></td>
<td>7,858</td>
<td>9</td>
<td>5,196</td>
<td>14</td>
<td>988</td>
<td>1</td>
</tr>
<tr>
<td><strong>Pennsylvania</strong></td>
<td>6,400</td>
<td>27</td>
<td>6,101</td>
<td>6</td>
<td>627</td>
<td>3</td>
</tr>
<tr>
<td><strong>Virginia</strong></td>
<td>5,585</td>
<td>37</td>
<td>5,180</td>
<td>15</td>
<td>369</td>
<td>11</td>
</tr>
<tr>
<td><strong>Washington</strong></td>
<td>6,366</td>
<td>29</td>
<td>3,933</td>
<td>30</td>
<td>555</td>
<td>4</td>
</tr>
</tbody>
</table>

Appropriations: Illinois State University, Grapevine
Enrollment: FTE based on headcount data provide by NCES for special request Washington Higher Education Coordinating Board.
Source: NASSGAP Annual Survey

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Table 2 shows the aid-to-tuition ratio. This is an indicator of the balance of need-based financial aid with tuition and fees and shows the dollars of need-based aid per FTE.

### Table 2
**2003 Aid-to-Tuition Ratio**

<table>
<thead>
<tr>
<th>States</th>
<th>Aid-to-Tuition Ratio 2003</th>
<th>Rank ATR 2003</th>
</tr>
</thead>
<tbody>
<tr>
<td>US</td>
<td>$9</td>
<td>-</td>
</tr>
<tr>
<td>Peer States</td>
<td>14</td>
<td></td>
</tr>
<tr>
<td><strong>Maryland</strong></td>
<td>6</td>
<td>25</td>
</tr>
<tr>
<td>Connecticut</td>
<td>-</td>
<td>na</td>
</tr>
<tr>
<td>Illinois</td>
<td>17</td>
<td>4</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>11</td>
<td>9</td>
</tr>
<tr>
<td>Minnesota</td>
<td>11</td>
<td>8</td>
</tr>
<tr>
<td>New Jersey</td>
<td>14</td>
<td>6</td>
</tr>
<tr>
<td>New York</td>
<td>22</td>
<td>2</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>9</td>
<td>7</td>
</tr>
<tr>
<td>Virginia</td>
<td>13</td>
<td>10</td>
</tr>
<tr>
<td>Washington</td>
<td>10</td>
<td>3</td>
</tr>
</tbody>
</table>

Sources: Student aid data: NASSGAP Annual Surveys
Tuition: Washington Higher Education Coordinating Board
compared to weighted average tuition at public institutions for 2003. This indicator addresses two of the factors—tuition and aid—that state policymakers can influence and control. Maryland was ranked 25th among the states and below the national average on the ratio. All of the peer states were rated in the top 10 on this measure, indicating that they have balanced their high tuition with high need-based student aid.

Measuring Up to Peer States

For a state with substantial higher education assets, Maryland is merely average among all states on several measures of participation and degree completion and trails most of the states that might be considered peers. Like Maryland, the peer states have relatively high family income and high tuition and fees at public institutions. However, each of these states rated higher than Maryland and higher than the national average on “financial access” for students—the balance of need-based financial aid allocated to students attending public institutions compared to tuition and fees.

Measuring Up 2004 by the National Center for Public Policy and Higher Education (NCPHPE) provides information on college participation. Maryland is among the states receiving an “A” for participation, along with peer states Connecticut, Illinois, Massachusetts and Minnesota. The measures used are shown in Table A-10. Maryland ranks 21st among all states in the “chance for college by age 19”, which considers both high school graduation rates and college continuation rates. Eight of the nine peer states show higher chances. Maryland is close to the national and peer state average on the percent of young adults enrolled in college and among the top states in part-time enrollment of adults 25-49 years old.

Maryland is among the states with the highest participation rates among both white and non-white 18-24 year olds. Although there is a substantial gap between white and non-white participation rates, both rates were above the national average in 2000-02 and showed improvement since 1990-92. With the exception of New York, Maryland ranks the highest among the model states in participation of non-white 18-24 year olds.

Despite the relatively high proportion of Maryland’s non-white 18-24 year olds enrolled in college, enrollment of low-income students in 2000-02 was below the national average, ranking 34th out of the 39 states for which data were available. Participation improved among both low- and high-income young adults between 1990-92 and 2000-02, but there was a substantial gap in participation between the two groups. Minnesota and Washington had better participation rates among the lowest income group and the narrowest gap between low- and high-income groups.

Maryland ranks 41st among all states and is tied for last among peers in the number of certificates and degrees awarded per 100 undergraduate students. In contrast, Maryland is among the top states in the completion rates of first-time, full-time students enrolled in bachelor’s degree-granting institutions and all of the peer states are at or above the national average on this measure. The seeming contradiction between these two
measures is explained, at least in part, by the differences between the two groups of students involved. The bachelor’s degree measure includes only full-time students enrolling in four-year institutions, a group likely to include many traditional students. The total undergraduate enrollment includes many nontraditional students attending part-time or intermittently.

The data examined in this report and detailed in the appendix indicate that the peer states tend to do a better job than Maryland on several indicators of participation and degree completion, despite the fact that they also have high tuition structures. There are many factors that affect participation rates, but few are within the control of state policymakers. However, governmental and higher education leaders can control decisions about appropriations, tuition and financial aid and the balance among them. Reviews of policy documents and telephone interviews with administrators in peer states revealed that peer states used a variety of approaches to balance appropriations, tuition and fees, and student aid. As described in the following section, these approaches were reviewed in preparation for development of a recommended model for Maryland and are summarized in the Appendix to this report.
Section Five
Review of Peer States’ Postsecondary Education Models

A review of peer state structures, processes and policies was conducted to evaluate how they balance appropriations, tuition and fees, and student financial aid to meet state level goals for access and participation. The topics of interest in the review included:

- The structure of higher education in the state and the degree of coordination among higher education entities
- How higher education appropriations requests are developed and the extent to which funding requests are tied to tuition and student aid
- How tuition levels are set and regulated
- The administration of student aid, criteria for assessing need and determining award amounts
- Efforts to align appropriations, tuition and student aid.

Governance Structure. The peer states have a variety of governance structures, with seven of the nine having higher education governing boards with program approval authority. Of these seven, two have significant authority in the higher education budget process, three have limited budget authority and one has no statutory budget role. Of the two remaining states, one has a planning agency with authority over K-16/20 and two consolidated governing boards encompassing all institutions, and the other has two consolidated governing boards encompassing all institutions.

Of the nine peer states, five have a separate agency with its own board or commission that administers student financial aid; in the remaining states the responsibility for student aid is administered by the higher education coordinating board. Five of the primary need-based aid programs administered by the peer states are managed through a centralized application/award structure and the remaining four are decentralized to varying extents in that awards are made by the institution but under eligibility and award criteria set by the state agency.

Regardless of structure, most states stated that coordination among the board, institutions, and the student aid agency was critical to achieving budget goals. States without formal structures frequently reported establishing a standing task force or committee composed of higher education constituency leaders that met on a regular basis to discuss mutual issues of concern. It was indicated by one state that such an approach helps to maintain more continuity in higher education across changes in political leadership.

11 The secondary data sources for this review included states’ higher education Web sites, data collected through the Lumina-funded Recession, Retrenchment and Recovery project being conducted by the Center for the Study of Education Policy at Illinois State University, the annual survey of state programs conducted by the National Association of State Student Grant and Aid Programs (NASSGAP), and other written reports related to state models including materials resulting from the Changing Directions initiative. Primary data were collected through personal and telephone contacts with selected state agency administrators.
Appropriations. In nearly all the peer states with a coordinating board, at a minimum, the board established guidelines for the state budget request. Several of the peer states use a policy-based approach tied to a master or strategic plan that appears to work best during economic expansion cycles, and others use a formula in building their budget request that they cited as helping them in a contracting economy although it could have constraints during periods of expansion. Those that use a formula indicated it often acts as a “third party” in budget negotiations which is useful in fostering coordination within higher education and is more likely to result in “raising the boats” for all parties. Some formulas are built on enrollment figures; one state uses a cost-minus-resources approach to “close the gap.” In this approach, base appropriations and projected tuition revenue are subtracted from operating requirements to identify the revenue gap for increased appropriations, or, increased tuition. When incremental budgeting failed to work in another state, the board began basing the budget request on student/faculty ratios by discipline. Another state reported having no clear funding policy and this has resulted in across-the-board increases or decreases for the past two decades without regard for enrollment, programmatic needs or other considerations. None of these approaches, however, are formalized in statute as is the higher education appropriation process in Maryland through the Cade and Sellinger formulas.

In terms of the budget request for student aid, student aid agencies that aren’t required to work with the coordinating board by law indicate working with either the board or systems on an informal basis. Their primary concern is to determine planned tuition increases in order to build a budget request that provides sufficient funding to address those increases. There is no evidence to indicate that those agencies contained within the coordinating board fare any better on budget alignment than do those agencies that are administered separately or vice versa.

Tuition. In one of the nine states, proposed increases in undergraduate resident tuition at state colleges and universities are subject to legislative approval. Of the remaining eight states, tuition is set by the state coordinating board in three states and by the institutions in five states; in one of these states the board has established policy that tuition cannot increase beyond 15% per year, and in two states the legislature has set a limit for annual tuition increases or frozen tuition from time to time. Other tuition actions include:

- Efforts by the legislature to freeze tuition in past years have resulted in major tuition increases when the freeze was lifted.
- A truth-in-tuition plan that guarantees students the same level of tuition for four years has resulted in double-digit tuition increases for each new freshman class and perhaps greater increases than needed given the difficulty of predicting expected costs and revenues four years out.
- Consideration of an approach that limits tuition increases to the Consumer Price Index if higher education appropriations increase beyond a certain level; otherwise institutions would be free to charge whatever is needed.
• A requirement that 15% of total tuition be set aside for need-based aid in one state; in another, state law forbids any portion of tuition going to student aid.

Most states indicated there was no comprehensive tuition policy in place for resident undergraduate students and, as a result, tuition increases fluctuated with the economy. One state reported creating a quick-reference tool for members of the legislature to see the impact of varying levels of appropriations on tuition. State officials believed it improved their appropriation level and the tool was cited as helping tie together the relationship between appropriations and tuition.

**Student Financial Aid.** The majority of the peer states administer one large need-based aid program that funds students on a first-come, first-served basis and accounts for more than 70% of their student aid funding; it accounts for 90% of total funding in four of the peer states. Based on FY2004 NASSGAP data, eight states reported that 50-60% of their funds go to students at in-state public institutions – one state reports that figure to be nearly 90% – and the remainder goes to students attending in-state schools in the private not-for-profit sector or proprietary institutions. Very little funding goes to students attending out-of-state colleges or to support merit aid programs; one state indicated nearly 12% of total funding was for merit aid, three states reported less than 2% was for that purpose, and the rest of the states reported no merit aid programs.

States that reported better alignment between tuition and student aid said that the relationship had become “ingrained” in the minds of key policymakers and members of the legislature and that had been accomplished through the coordinated work of the board, the institutions and the student aid agency. They noted that the support of particularly the president of the flagship university was critical in advancing increases in state student aid and that strong advocates for student aid and improving affordability were needed among key members of the legislature. Another factor key to alignment was having specific criteria in statute that shape the basis for student grant eligibility. Both Minnesota and New York have such criteria in place; Washington believes its approach of basing eligibility on median family income also provides a clear goal for measuring performance.

**Alignment.** The review of the nine peer states indicates there are few instances, if any, of long-term formal statutory alignment between appropriations, tuition and student aid. This is primarily because governmental policymakers want to be free to annually examine important higher education issues in the context of new political, economic and social issues in the state. When alignments do occur, they are most commonly between tuition and student aid as evidenced by some states using tuition offsets for need-based aid. This practice is also seen in states not included in this review but may represent a last-ditch effort to fund student aid when state funding is not forthcoming; the burden to support low-income students is passed from taxpayers to other students. States that indicate the relationship between tuition and aid has become “ingrained,” or that have

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advocates to carry a clear and consistent message about the importance to the state’s economic future of funding low-income students, tend to provide the funding needed to cover increases in tuition. Other states however, fall into the mold that, “Once tuition and appropriations were determined, policymakers looked at the budget dust to determine how much was left over for financial aid.”

In many states there seems to be a relationship between tuition and appropriations that falls within what might be characterized as a “range of political tolerance.” For example, if appropriations increase 10% for higher education, a 10% increase in tuition will not be politically acceptable. Finally, there appear to be three factors surrounding state appropriation decisions that have to be taken into consideration when developing an approach to alignment: (1) the vast majority of states have structural budget problems, (2) economic cycles affect states differently but affects them all in that they will have tough budget periods, and; (3) whatever political party is in control of the executive and/or legislative branches will have differing approaches to solving state budget issues than other political parties.

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14 “Almost all states will find it impossible given their existing tax policies to continue funding their current level of public services over the next eight years.” (Boyd)
Section Six
Using Student Financial Aid to Achieve Public Purposes

During the course of the state interviews, Maryland’s governmental and education leaders placed a high priority on serving low-income students. Because of this concern, a number of factors related to student aid programs in the peer states are discussed in more detail in this section. Areas covered include the level of support provided through need based aid, the criteria for measuring student need, and administration of state need-based aid.

Level of Support

One aspect of the level of support provided to students is measured by the purchasing power provided through state student aid. In the State of Washington, for example, full awards of $2,000 for the neediest students at community colleges and $5,000 at public four-year institutions approximate tuition and fee charges by sector. Illinois, Minnesota, New Jersey, New York, Pennsylvania, and Washington all have maximum awards for students at public four-year institutions in FY2007 that approach or exceed $5,000. New Jersey and Minnesota offer even larger maximum awards to students attending independent colleges than at public four-year schools thereby providing some degree of choice.

The maximum award is important because it helps offset the amount of need remaining after the Pell grant is taken into consideration. With the current Educational Assistance Grant (EAG) maximum of $3,000 and the typical public four-year institution cost in Maryland, remaining need for students with the least ability to pay can be as high as $7,000. To make college attendance a reality, these students need to receive institutional grant aid, borrow from the Federal Stafford Loan Program, and work while in school or seek alternative loans.

The level of support provided by a state can also be measured by the number or proportion of “needy” students who receive awards. Nearly all the peer states with better aid-to-tuition ratios than Maryland commence award processing with the beginning of the Federal Pell Grant processing cycle on a first-come, first-served basis and nearly all have deadlines that extend to the start of the fall term; the entitlement nature of New York’s program allows awards to be made throughout the school year. Two other states differentiate between new and returning students – both New Jersey and Pennsylvania have earlier dates, June 1 and May 1 respectively for renewals and later dates, October 1 and August 1, for new applicants. Pennsylvania further differentiates by requiring new four-year students to apply by May 1 and new two-year college students to apply by August 1.
Criteria for Measuring Need

Most states have broad statutory goals to provide access and choice or to ensure that no student is denied a college education for financial reasons. The formula used to determine who receives aid and how much they receive is the state’s method of implementing statutory intent. The formulas used by the peer states can be categorized into three approaches for determining the amount of the award to be provided by the state.

- **Financial Need.** Several states base eligibility on financial need. Financial need is calculated by subtracting financial resources available for college from college costs. College cost budgets used in formulas differ in that some states use only direct costs – costs students cannot influence – and others add in transportation, personal expenses, etc. Some states use one standardized cost of living for all students regardless of whether they commute or live on campus. Most peer states that use the financial need approach consider the Pell Grant as a resource in addition to the expected family contribution (EFC) resulting from Federal Methodology.

  New Jersey seeks to ensure that the neediest students receive awards equal to full tuition at public institutions and 50% of the average tuition at independent colleges and universities. Illinois’ benchmark has been to ensure that students with the least ability to pay – students whose EFC as calculated by Federal Methodology is zero - received state grant awards that covered tuition and fees at public institutions. This approach has generally been considered one that provides choice in addition to access. It tends to assist both low-income and middle-income students because the use of the college cost in the formula can result in greater need at higher-cost institutions. Some states limit eligibility, however, through an income or EFC cutoff, or a cap on college costs in the calculation of need.

- **Fair Share.** A second approach for determining the level of support to be provided students can be characterized as the “fair share” approach. This approach starts with need analysis but awards up to a certain portion of remaining need similar to Maryland’s EAG program. Minnesota has specific criteria in statute that shape the basis for how the cost of attendance will be shared among the student, family, and taxpayers. The policy basis is that of “shared responsibility”; that the student is responsible for roughly half the cost of college (46%). The other half is the responsibility of parents – to the extent they can contribute – or the state and federal government.

  Prior to FY2007, Pennsylvania’s formula used a similar approach; award amounts could not exceed the lesser of 80% of tuition and fees or 40% of need, or the maximum award. This limit mostly affected students at lower-cost institutions where the Pell Grant covered more of their educational costs. The concept was built on an expectation of students paying for part of their college costs through work, loans, or
other gift aid. For FY2007, Pennsylvania is implementing a new formula in order to
direct more state funds to students with lower EFCs.

- **Family Income.** Washington bases eligibility on median family income. Awards are
  provided to students whose family income is equal to or less than 65% of the state
  median income categorized by family size. Maximum awards are made to students
  whose income is less than 50% of the median for their family size, and awards equal
to 75% of the maximum are made to those whose income falls between 50% and 65%
of the median. The Washington approach clearly communicates who is eligible for aid
and how much they will receive. Washington moved to this approach from a financial
need formula. Eligibility for grant aid in New York is also tied to income rather than
financial need.

**Administration of State Need-Based Aid**

State need-based aid programs are either centralized or decentralized depending on
whether the state or the institution is responsible for determining student eligibility,
notifying students of awards, and providing funds to students. Each approach has its
advantages and disadvantages. Centralization provides the state with more control over
who receives aid and ensures data are available to analyze the impact of state-funded aid
for policymakers. School officials indicate that decentralized aid allows them to provide
funds to students faster and reduces the complexity of the financial aid process.

The structure of state need-based aid programs in peer states ranges from one large
need-based aid program to multiple programs that are sector specific and may have
different eligibility factors based on the profiles of students attending those sectors. Some
are centrally-administered and others are decentralized to varying extents. The majority
of peer states, however, tend to have one large need-based aid program for all students
at all sectors. The program is highly visible and its name is as familiar to parents and
students as is that of the Pell Grant.

Administration of the State of Washington’s grant program seeks to “mirror” the straight
centralized system. In their approach, the state agency establishes the formula to
determine eligibility, sets award amounts to be received, allocates funds to institutions,
and requires that awards be made on a first-come, first-served basis; the institution is
effectively acting on behalf of the state. Funds are distributed to the institution based on
their students’ proportion of total need within the state, not the proportion of aid they were
allocated in the past. This allocation system addresses another criticism of
decentralization - that institutions are funded rather than students. Schools submit end-of-
year reports that are used to populate the state data base, inform policymakers about the
impact of state student aid, build the annual budget request, and determine the portion of
state funding allocated to each school in the subsequent year. Minnesota now uses the
same approach for their primary need-based grant program.
Section Seven
Criteria to Guide Maryland’s Future Postsecondary Investments

The 2004 Maryland State Plan for Higher Education calls for a new financing model “that will link tuition policy, State support to institutions, and State and institutional financial aid to address such issues as student access and the particular needs of the state.” This section focuses on the criteria for development of a model to guide Maryland’s investments in postsecondary education over the coming decade.

Criteria to Guide Higher Education Funding

Our examination of other states, review of the literature and interviews in Maryland suggest that a model for aligning tuition policy, state support for higher education, and state and institutional financial aid should have the following characteristics:

• The model should define specific priorities that are consistent with Maryland’s goals for higher education defined in 2004 Maryland State Plan for Postsecondary Education. Higher education and governmental leaders agreed that the general goals for access and affordability defined in the plan are appropriate. Among interviewees, there was consensus that providing access for low and low-middle income students should be the highest priority. Other priorities included accommodating enrollment growth, addressing Maryland’s future needs for an educated citizenry and skilled workforce, and enhancing the quality of postsecondary offerings.

• The model should recognize Maryland’s political structure. Maryland has a “strong governor” form of budget development—the Legislature can only reduce the allocations specified in the Governor’s budget. During the last two budget cycles, Governor Ehrlich has placed priority on higher education in general and on affordability for low income students through increases in need-based student financial aid.

• The model should build upon existing budget development and decision-making processes. Higher education and governmental leaders raised concerns about making changes to the basic elements of the current budget development process. There was consensus that the mandated linkages between the University System budget and the other sectors had brought the sectors together. The University of Maryland System develops its budget request on funding guidelines developed by MHEC and based on enrollment projections among its campuses and funding for peer institutions in other states. State appropriations to community colleges and independent institutions are determined by formulae based on per-student appropriations to the universities. Individual institutions determine tuition levels. Budget requests for state student aid are developed by MHEC.
The model should incorporate features used by peer states that have been relatively successful in maintaining financial access for students. Peer states were selected because they, like Maryland, have relatively high family income and relatively high tuition and fees at public institutions. Although several states have been successful in maintaining affordability with historically low tuition, Maryland has already moved to a high tuition model. No state has successfully moved from a high tuition model to a low tuition model. We learned nothing during the course of our work that would lead us to conclude that Maryland will be the first state to do so. Maryland can maintain affordability by balancing high tuition with high financial aid as peer states have done.

There are challenges to designing a model for funding Maryland higher education that has these characteristics. Our review of the approaches used by other states indicates that there is no “magic formula” for aligning funding components and even stable models are difficult to maintain through recessions. Our goal is to shape policies and processes that respond to current and future needs by combining Maryland’s strengths with successful methods employed by other states with similar characteristics.

Despite the fact that Maryland’s current higher education budget process depends heavily on formulas, governmental leaders said that they want to avoid formulas and retain the flexibility to make budget decisions based on current conditions. Colleges and universities want to maintain their autonomy for setting tuition and making internal budget decisions. This has worked well for Maryland and should be retained. Maintaining flexibility for governmental leaders and autonomy for institutions while achieving access and affordability goals requires that decisions about appropriations, tuition levels and student financial aid be well informed and coordinated without being mandated. It also requires a sustained commitment to affordability that must emanate from a widely held view of the importance of extending postsecondary education to a larger proportion of Maryland’s population. We heard such a commitment from governmental and higher education leaders in our interviews.
Section Eight
A Recommended Framework for Maryland

The following recommendations are based on interviews with Maryland’s governmental and higher education leaders, reviews of MHEC reports, analysis of historical data for Maryland and peer states, and examination of information collected from peer states. The recommendations call for the goals of access and affordability to be defined in measurable terms and for budget development to be coordinated more effectively. A framework for balancing appropriations, tuition and fees, and student aid is presented. Finally, amendments to the student aid programs are recommended as strategies for bringing aid in balance with tuition. The following sections include the consultants’ findings and observations, general directions for the coming decade, examples of policies and strategies used by peer states, and specific action recommendations for Maryland.

Findings and Observations. The 2004 Plan for Maryland Postsecondary Education calls for “…a system of postsecondary education that promotes accessibility and affordability for all Marylanders” and cites the guiding principle that “all Maryland residents who can benefit from postsecondary education and desire to attend a college, university, or a private career school should have a place in postsecondary education and should be able to afford it.” In addition to expanding capacity and developing alternative access, the plan calls for higher education “to ensure that financial aid from all sources effectively reaches the student, that it adequately addresses student financial need, especially among low- and moderate-income students, and that it minimizes loan debt.” The plan has wide support among higher education and governmental leaders. As general statements, these serve well. As implementation guides, however, they are too general. Maryland needs to identify specific priorities and adopt targets for achieving them.

Goal. Define affordability so that decisions focus on priorities and progress can be measured.

Policy Options. Objectives for affordability can be defined as specific outcomes for students. One area relates to Maryland’s intent to increase enrollment of low-income students. For example, objectives might call for increasing the participation rate of the low-income 18-to-24 year old population or closing the gap in participation between the lowest and highest income groups.

Objectives for affordability may also specify the level of support to be provided to students in terms of remaining need, number of students helped and loan indebtedness. For example, several large private and public institutions in the country are now assuring their low-income students they can complete a baccalaureate degree debt-free. Other states
relate the acceptable level of indebtedness to expected income after college; lenders cite 10% of monthly income as the upper limit for loan repayments.

Setting targets using nationally recognized affordability measures would also be appropriate. Just as the MHEC Funding Guidelines relate university funding to funding at peer or aspirant institutions, Maryland might set targets for reaching the peer-state average on accepted measures of affordability and financial access. Other measures are included in the *Task Force to Study College Readiness for Disadvantaged and Capable Students* Report. One or more of these measures might be selected and then used to guide decisions and align funding components.

**Action Recommendation.** Adopt the following objectives to support implementation of the 2004 State Plan for Higher Education. Progress toward these objectives should be monitored on an annual basis.

- The participation rate of low-income students will increase by at least 1% a year until the average of the peer group is reached (see Table A-13, Participation by Income, in Appendix 1).
- The gap between low- and high-income students in college-going and degree-completion rates will be reduced by at least one percentage point per year (see Table A-13, Participation by Income, in Appendix 1).
- The percentage of unfunded students who apply by May 1 and new two-year public college students who apply by August 1 will decrease by 20% annually over the next five years
- EAG awards as a percent of public tuition will increase to 80% for students in Maryland's lowest 20th percentile of family incomes by FY2010
- Maryland will rate at the average of peer states on the *Measuring Up* overall affordability index (see Table A-15, Affordability of Higher Education, in Appendix 1).
- The state need-based aid as a percent of state Pell Grant funding will increase annually (see Table A-15, Affordability of Higher Education, in Appendix 1).
- Allocations to need-based aid will be increased until Maryland reaches the average among peer states in dollars of need-based aid per $100 of tuition (see Table A-6, Need-based Student Aid per Public FTE Enrollment, in Appendix 1).
- The share of higher education costs funded by state appropriations will be increased by 1% each year until the average share of peer states is reached (see Table 5 below).
Findings and Observations. As noted above, the Governor, Legislature, MHEC and University System each has a separate and independent role in the development of the higher education budget. Other sectors of higher education—community colleges and independent institutions—have an interest because their appropriations are tied to university funding. While each of the separate budget development procedures appears reasonable, the processes and the timing of budget submissions preclude coordinated decision-making. In order for the three funding components—appropriations, tuition and student aid—to be aligned in any way, coordination needs to be strengthened.

In many states, the higher education coordination board plays an important role in the coordination of the budget request for all sectors of higher education and for student financial aid. MHEC has not performed this role. Although none of the higher education or governmental leaders interviewed for this study specifically suggested that MHEC’s role should change, there were several comments about the lack of coordination and the timing of communication among decision makers during the budget development process.

Goal. Improve coordination of planning and budget development and communications among decision makers.

Policy Options. States that have been relatively effective in balancing appropriations, tuition and fees, and student aid tend to use coordinating processes effectively to achieve statewide goals for higher education. Central to these processes is planning and policy development. Once policy goals and objectives are agreed upon, other processes—budget development, data collection and analysis, and program review and approval—are employed specifically to achieve the policy goals. The “convening function” of a coordinating board can also be used to address inter-sector issues and encourage cooperation and collaboration.

Coordination of budget development would be improved if the University System informed MHEC of the parameters of its budget request prior to submission to the Governor so that budget requests for student aid could take into account tuition increases. The Governor’s budget decisions should be informed about the relationship among appropriation levels, tuition and student aid. Consideration might also be given to developing a “higher education affordability committee” that would meet annually to provide guidelines for setting tuition levels and related changes to student financial aid. This committee could be modeled on the Legislature’s Spending Affordability Committee. It could be supported by MHEC staff and convened by MHEC, the Legislature or the Governor.

Action Recommendation. Strengthen coordination of planning and budget development by:
• Amending the schedule and process for developing budget requests so that the University System and MHEC keep each other informed and the decisions about budget requests, tuition and fees, and student financial aid can be coordinated.

• Directing MHEC staff to provide the Governor with analysis of the implications of proposed appropriation levels on tuition and fees and student aid during the budget preparation cycle.

• Providing, in accordance with MHEC’s mission, timely policy analysis to the Governor and Legislature on how well the total budget request for higher education fulfills the goals of the state plan.15

Recommendation 3. Align State Appropriations, Tuition, and Student Aid

Findings and Observations. With defined objectives and improved coordination, attention can be directed to alignment of higher education appropriations, tuition and fees, and student aid. The purpose of alignment is to clarify the state’s and students’ roles in funding higher education and to assure progress toward goals for affordability and student participation.

For purposes of illustration, data from the State Higher Education Executive Officers (SHEEO) latest publication on higher education finance, State Higher Education Finance 2004, are shown below in Table 4. To show the balance across funding components, the table focuses just on two major sources of revenue for higher education—state appropriations and public tuition and fees—and student aid allocated to students attending public institutions.

Nationally, student payments represent about 39% of the sum of state appropriations and tuition and fees. To put it another way, for every dollar that students pay in tuition and mandatory fees, the state invests $1.54. Included in the average state appropriation is about $.08 in state student financial aid for every dollar students pay in tuition. Among the high-tuition peer states, tuition represents 42% of the total revenues and state student aid is equal to 10% of tuition. In Maryland, tuition represents 49% of the sum of state

15 “The mission of the Maryland Higher Education Commission is to ensure that the people of Maryland have access to a high quality, diverse, adequately funded, effectively managed, and capably led system of postsecondary education. It accomplishes this mission through the provision of statewide planning, leadership, coordination and advocacy for the State's postsecondary educational institutions and through the administration of State financial aid programs.” From the MHEC web site (http://www.mhec.state.md.us/higherEd/about/mission.asp).
appropriations and tuition and fees while the state appropriates about $.05 in student aid for every dollar students pay in tuition at public colleges and universities.

<table>
<thead>
<tr>
<th>Table 4</th>
<th>Maryland and Peer States Comparison of Funding Components FY 2004</th>
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<td>Total State Tax Appropriations (000)</td>
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<td>US</td>
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<td>Maryland</td>
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<td>Peer States Total/Average</td>
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<td>Connecticut</td>
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</table>

**Goal.** Develop methods for aligning state funding, tuition and student aid so priorities can be established, decisions can be informed and progress toward goals assessed.

**Policy Options.** There are three steps in an idealized model for aligning funding components:

1. The funding needs of higher education are identified
2. The proportion of those needs funded by state appropriations and tuition and fees paid by students respectively is determined
3. Increases in tuition and fees are balanced by increases in student financial aid sufficient to achieve goals for affordability.

To identify higher education funding needs, some states have developed a formula or a set of guidelines to be used in development of a budget request. The University of North Carolina System uses a model based on enrollment projections and program mix at individual institutions. Massachusetts uses a more complex model that incorporates costs for instruction, support services and physical plant to calculate Total Operating Budget Requirements.
Higher education is frequently funded with across-the-board increases or decreases in state appropriations. Often tuition levels are set after appropriation decisions have been made. These approaches provide little opportunity to adjust student financial aid to assure affordability. However, in some states, the proportion of higher education’s funding needs covered by state appropriations is determined by policy. For example, several states adopted policies similar to that recommended by the Carnegie Commission in 1973—that students should pay one-third of the costs of their education at public institutions. For community colleges, the costs would be shared equally among the state, local government, and the student. Connecticut’s policy limits students’ share of costs to 30 to 35% at the four-year institutions and 25-30% at the two-year institutions. The goal in Massachusetts is for state support to equal 66% of total funding needs. In Minnesota the two-thirds state/one-third student ratio is in law although removing the stipulation is being considered. As Table 2 illustrates, these states have not been able to sustain these shares.

To align tuition and aid, Connecticut’s policies call for tuition increases to be no more than 15% per year and for institutions to set aside 15% of tuition revenue for student aid. The policy also calls for the state to match the student aid set-aside although funding is seldom available for that purpose. Nationally, institutional financial aid officers are reporting increasing pressure to use school funds to meet enrollment management goals that conflict with providing aid to the most financially needy students. In Massachusetts the maximum student aid award is coordinated with changes in public sector tuition. For the majority of states, however, the alignment of tuition and aid is not formalized in policy but is a part of the decision making culture: “as tuition goes up, so does student aid.”

Maryland has a reasonable method for identifying the funding needs of higher education based first on the USM funding request utilizing the guidelines developed by MHEC and then the Cade and Sellinger formulas. Consideration should be given to adopting a policy about the appropriate share of those costs paid by students and by state appropriations. The policy could be tied to the average among the peer states examined in this study and expressed as a goal to be achieved; for example, “over the next 10 years, the share of higher education costs paid by state appropriations will be increased until the state’s share is 58% of the total costs and students share is 42%.” Such a policy should be updated every three years based on new data. A companion policy might call for “state student aid allocations to equal 10% of tuition and fee revenues within 10 years.”

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The model would consist of the following steps (the proportions shown are the peer state averages for FY2004):

**Step 1: Determine Funding Needs**

| University requirements (guidelines) + Sellinger formula + Cade formula + MHEC operations + Student financial aid | = Higher Education Funding Needs |

**Step 2: Determine Shares across Funding Sources**

| Appropriations | = Funding Needs x 58%* |
| Tuition and Fees | = Funding Needs x 42%* |

**Step 3: Determine Financial Aid Allocation**

| State Student Financial Aid Allocation | = Tuition & Fees x 10%* |

*Peer State Average in FY2004

For purposes of example, Table 5 illustrates the difference between the distribution of funding components for Maryland in FY 2004 and the distribution if Maryland had used the peer state model. The example assumes that higher education funding needs totaled $2.2 billion (the sum of state tax appropriations and gross tuition and mandatory fees in Table 4). To approximate the averages of the peer states, $197 million would be shifted from tuition and fees to state appropriations and $50 million added to student financial aid programs at public institutions.
The Peer State Model sets realistic goals that respond to Maryland’s future needs. We know, however, that education and governmental leaders interviewed for this study raised concerns about losing flexibility with any that resembled a formula approach, particularly during economic downturns. As some of the peer states have found, funding statutes or policies cannot always be met, but they set targets for annual budget decisions and define the parameters for restoration of support when state revenues recover following recessions. In addition, a model can be useful and non-restrictive depending on the level at which it is implemented. There are at least three levels of implementation:

- **Informing Decision Making** A formula or mathematical model may be used simply to inform the decision-making process. The model may describe the distribution of state appropriations, tuition and aid desired to advance toward statewide affordability and access goals and define the impact of various levels of funding on the components of the model.

- **Guidelines or Principles** A model may be formalized as guidelines or principles adopted by a coordinating board that represents the commitment of the state. Several of the peer states indicated that the balance among appropriations, tuition, and student aid was maintained by common understandings and long-term commitments based on formal or informal principles.

- **Rules or Legislation** Finally, a model might be encoded in administrative rules or even legislation. Indexing tuition changes to inflation, freezing or capping tuition, and other approaches have been legislated in some states.

**Action Recommendation.** Link appropriations, tuition and student financial aid by adopting the peer state model as a guideline for budget development and direct MHEC to provide analyses based on the model to inform governmental and higher education leaders prior to budget decisions being made.
Findings and Observations. As shown by the FY2004 aid-to-tuition ratio, Maryland's funding effort for need-based aid has not kept up with the national average or the average of its peer states. Double-digit funding increases particularly in the Educational Assistance Grant (EAG) program each year since FY2004, however, have greatly improved the level of support being provided to students; the FY2007 funding level of nearly $76 million for need-based aid will allow the maximum award to increase from $2,700 to $3,000 and increase the level of need that can be covered.

If Maryland elects to match the effort of its peer states, it will need to continue to increase the level of support provided to individual students as well as increase the number of students aided. Most of the peer states fund maximum awards that approach the average cost of public-two and public-four year tuition and fees and have application deadline dates that extend to the start of the fall term. In addition, some aspects of the current state-funded student financial aid programs could be amended in order to focus resources on low-income students.

Some of those interviewed for this study advocated changing the delivery structure of the EAG program to a more decentralized approach so that students could be informed earlier of the amount of their awards. The underlying issue may actually be the timing of the end of the state budget process and the commencement of the award announcements, regardless of who makes the award announcements. Some states wait until the budget process is complete in the late spring before announcing awards, others use the best cost estimates schools can provide as the basis for determining eligibility earlier.

Maryland’s projected increase in enrollment will not only increase the size of the pool of students requiring financial assistance but will result in a more diverse group of students with less experience and familiarity with the college admissions calendar. Expanded outreach efforts to reach these students early in the education pipeline will be critical.

Goal. Increase funding for need-based aid at a rate faster than tuition costs and enrollment growth, place priority on serving low-income students, increase awareness of student aid through outreach efforts, and encourage and support preparation for and enrollment in postsecondary programs for underserved students.

Policy Options. Additional new funding may be the only way for Maryland to get caught up in need-based aid. Changing demographics will dictate even greater need than exists today and, as noted above, the current level of support is less than that provided by peer states. Immediate concerns about the level of support provided to students may be
addressed through a reallocation of funds within the EAG formula. This approach does not result in any increased funding but can serve as a short-term strategy to assist those students about whom Maryland is most concerned. One possible area for examination would be to reduce the Expected Family Contribution (EFC) cutoff that now extends eligibility to families above the state median income and/or reduce the cost cap placed on budgets used to determine eligibility.

MHEC should also be encouraged to continue efforts to consolidate programs. In FY2004, 58% of state student aid was directed to need-based aid; by FY2007, that figure had increased to 75% through both new funding and reallocation of merit-based funding. A total of 20% of Maryland’s need-based aid is in the Guaranteed Access Grant; funding for this program increased by more than 50% in FY2007. With a maximum award of $14,300, it represents a significant state investment in individual students. In addition to meeting the family income guidelines for eligibility, the only other primary criterion for eligibility is to have a 2.5 grade point average. It will be important to assess the success of this program within the next few years and particularly the effectiveness of the size of award in helping to achieve program intent.

In conjunction with the recommendations from Access and Affordability: Refocusing Financial Aid in Maryland (2001), efforts should be continued to simplify the application process for special purpose programs into one application form as well as consolidating the programs into a lesser and more comprehensible number of programs with similar eligibility rules.

Award eligibility for students in the EAG program is limited to 60% of need at public-two year institutions and 40% of need for students at four-year schools or the maximum award of $3,000, whichever is less. These rates, recommended by the 2001 Task Force to Study College Readiness for Disadvantaged and Capable Students and funded in FY2007, are an improvement over prior rates. Whether the rates are simply rationing methods or a specific attempt to define what percentage of funding the student should secure from other sources such as employment during the school year, student loans, and institutional aid, is unknown. The availability of unit record data as reported in the Analysis of Financial Aid Distributed to Undergraduates at Maryland Public Colleges and Universities in Academic Year 2003-04 should help address questions about the amount of institutional aid low-income students can expect to receive and to what extent students are borrowing for college.

Outreach to underserved groups is a key to opening the doors to postsecondary education to all of Maryland’s citizens. After conducting an extensive synthesis of the research, the Pathways to College Network concludes: “If we consider what current data and research tell us about academic, social, cultural, and financial factors affecting college access and success, it is readily apparent that our education system must change
to meet the needs of underserved students and the requirements of 21st century society for a highly educated workforce and citizenry."\(^{17}\)

For underserved students, college enrollment depends on having and meeting high expectations in middle and secondary school coupled with an early understanding of the financial and support services available that can make college attendance and completion a reality. In terms of student financial aid, the state’s role is to reach out to middle and high school students with engaging information that makes it clear that college is a valuable and viable option for every student.\(^{18}\)

The Web site of the National Association of Student Financial Aid Administrators (www.nasfaa.org) provides information on establishing early-awareness efforts including conducting focus groups of underserved schools and communities and building on programs that already exist. The Tri-State Association of Student Financial Aid Administrators is currently working on a report due at their upcoming annual conference regarding outreach to low-income students and parents that may also be helpful in this area. Other initiatives currently ongoing in the state such as GEAR UP and MarylandMentor are used in peer states as outreach efforts to assist students unfamiliar with the college admissions and student aid application process. One state indicated that through statewide billboard advertising they have increased usage of their Mentor site and that half of the users are junior high age. The Great Lakes Guaranty Corp. has invested in a “college success” series that gets the word out to students in a very engaging way.\(^{19}\)

**Action Recommendations.**

**Need-Based Aid**

- Seek funding to increase EAG award maximums to equal average tuition and fees at public two-year institutions and average tuition and fees at public four-year schools. Set the same maximum award at independent institutions equal to that at public-four year institutions.

- Work toward an application deadline date of May 1 for all renewal students and first-time applicants at four-year institutions, and August 1 for first-time applicants at two-year institutions. The cost of achieving these deadlines can be estimated annually and additional funding should be phased in to support all eligible students who apply.

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\(^{18}\) The Pathways to College “College Readiness for All Toolbox” ([http://www.pathwaystocollege.net/collegereadiness/toolbox/index.asp](http://www.pathwaystocollege.net/collegereadiness/toolbox/index.asp)) provides a variety of tools, assessments and resources that help schools and colleges improve their outreach activities.

by the March 1 deadline and for the campus-based EAG program. Once funding is adequate, the two programs can be merged along with the Part-Time Grant program.

- Focus EAG funds on providing access for lower-income students and families. Establish an EFC cutoff of $10,000 or college cost cap that effectively eliminates from eligibility families with incomes near or above the state median.

- Set a benchmark for the level of remaining need to be covered by the EAG grant for students with the least ability to pay (or students from the lowest income quintile). Establishing the benchmark should take into account expected earnings during the school year, the amount low-income students are expected to borrow, and institutional aid received as a proportion of the total college costs.

- Improve differentiation of awards by EFC through a payment table or sliding scale that indicates the amount of remaining need to be covered based on the EFC and allows students with lower EFCs to qualify for larger awards.

**Program Administration**

- Maintain one large, highly visible state student aid program based primarily on financial need that allows students to know their eligibility status as early as possible. Begin announcing awards on a first-come, first-served basis in early March based on estimated tuition and fees if institutions are unable to establish actual rates by that time.

- Consider decentralizing the EAG program in a manner similar to Washington State’s approach after funding for the maximum award and application deadline is sufficient to achieve 90 percent of the recommended levels. At that point, the combination of EAG and campus-based EAG funding should be adequate to provide allocations to institutions based on their students’ proportion of need without disenfranchising previously eligible students.

**Special Purpose Programs**

- Continue efforts to consolidate financial aid programs including evaluating the success of the Guaranteed Access Grant to determine if the program is meeting statutory intent. Otherwise, consider implementing modifications to result in the desired intent or merge funding into the EAG program.

- Simplify the application process for special-purpose programs by consolidating them into fewer and more comprehensible programs and allowing students to apply through one application form.
Outreach

• Use focus groups with target populations – students and parents – to determine how to best target marketing efforts to be successfully reach first-generation students, low-income students, underrepresented minorities and students with disabilities.

• Explore the feasibility of using MarylandMentor for outreach activities and examining specific activities used by other states with Mentor such as North Carolina, Illinois and New York to reach target groups. Determine whether usage data can be obtained from the sponsor.
Conclusion

Maryland is a proud and wealthy state. Its leaders are future-oriented and sensitive to global issues and challenges. Its knowledge-based economy attracts highly trained employees educated outside of Maryland. These employees and their children, coupled with the expectations and aspirations of middle and upper income Maryland natives, put higher-than-normal demands on the state’s institutions of higher education. The weak link in the chain is the preparation, enrollment, retention and completion of lower income students.

To grow its knowledge-based economy and be successful in the global market, Maryland needs to encourage and support an ever-increasing proportion of its high school graduates to enroll in and successfully complete postsecondary programs. To do this requires that postsecondary education be accessible and affordable to all. Adopting the recommendations in this report will greatly enhance the ability of Maryland’s lower income students to advance their education and, in turn, to advance the fortunes of Maryland. Adopting the guidelines that link appropriations, tuition and student financial aid will provide a framework for making annual budget decisions within the context of a strategic plan and the resources available in any given budget cycle.
List of Interviewees

(interviews were conducted February 6-10 and March 13-14, 2006)

Ms. Barbara Ash  
Director of Research  
Maryland Association of Community Colleges

Ms. Tina Bjarekull  
President  
Maryland Independent College & University Association

Hon. David Brinkley  
State Senator

Dr. Calvin Burnett  
Secretary of Higher Education  
Maryland Higher Education Commission

Dr. Robert Caret  
President  
Towson State University

Hon. Norman Conway  
Chairman, Appropriations Committee  
Maryland House

Mr. Warren Deschenaux  
Director  
Dept. of Legislative Services

Mr. Chip DiPaula  
Chief of Staff  
Office of the Governor

Ms. Janice Doyle  
Assistant Secretary for Finance Policy  
Maryland Higher Education Commission

Dr. Anne Osborn Emery  
Member, Maryland Higher Education Commission

Dr. Nancy Grasmick  
State Superintendent of Public Instruction

Ms. Beth Hepler  
President  
Maryland Association of Private Colleges and Career Schools

Ms. Rachel Hise  
Education Analyst  
Department of Legislative Services

Hon. Sheila Hixson  
Chairman, Ways & Means Committee  
Maryland House

Hon. Patrick Hogan  
State Senator

Dr. Michael Keller  
Director of Policy Analysis & Research  
Maryland Higher Education Commission

Dr. Steven Knapp  
Provost  
Johns Hopkins University

Ms. Cecilia Januszkiewicz  
Secretary  
Office of Management & Budget

Dr. William Kirwan  
Chancellor  
University System of Maryland

Hon. Nancy Kopp  
Maryland State Treasurer
Meeting Maryland’s Postsecondary Challenges
Report to the Maryland Higher Education Commission, September 2006
Van de Water Consulting LLC www.vandewaterconsulting.org

Dr. Kevin Manning
President
Villa Julie College

Ms. Andrea Mansfield
Director
Office of Student Financial Assistance
Maryland Higher Education Commission

Dr. Chris Nelson
President
St. John’s College

Dr. Margaret O’Brien
President
St. Mary’s College

Hon. Anthony O’Donnell
Delegate, Maryland House

Mr. Kevin O’Keefe
Chair, Maryland Higher Education Commission

Dr. Earl Richardson
President
Morgan State University

Dr. Steven Pannill
President
Cecil Community College

Hon. James Proctor
Delegate, Maryland House

Dr. Donald Slowinski
Vice Chair
Maryland Higher Education Commission

Dr. Martha Smith
President
Anne Arundel Community College

Dr. David Sumler
Assistant Secretary for Planning and Academic Affairs
Maryland Higher Education Commission

Dr. Thelma Thompson
President
University of Maryland Eastern Shore

Dr. Clay Whitlow
Executive Director
Maryland Community College Association

Dr. Craig Williams
Office of the Governor

Dr. Ron Williams
President
Prince George’s Community College
Bibliography

Maryland Publications

General Publications


Maryland Department of Legislative Services, “Higher Education Fiscal 2007 Budget Overview”, February 2006


Independent Colleges


Maryland Independent College and University Association (MICUA), “Providing Solutions for Maryland”, undated. Provides brief descriptions of MICUA’s 18 members plus facts about independent higher education.
Maryland Independent College and University Association (MICUA), Reports from member colleges on how Sellinger money was used.


Financial Aid


“Report of the Financial Aid Task Force to the University System of Maryland Board of Trustees”, December 10, 2004

Other References


Appendices

1. Maryland and Peer States: Trends, Characteristics, and Outcomes Measures

2. Summary of State Postsecondary Education Financing Models

3. Summary of Peer States Primary Need-Based Aid Program Attributes
Appendix 1

Maryland and Peer States
Trends, Characteristics, and Outcome Measures

Selection of Peer States

The first step in this project was the selection of states that could be considered peers of Maryland but also serve as potential models for the development of a financing framework. Since Maryland is described as a high income, high tuition state, it was clear that higher education financing models developed by states with historically low tuition such as California or Arizona and states with unique economies such as Alaska, Nevada, and Wyoming would not be appropriate as models. Although Maryland is a member of the Southern Regional Education Board, most southern states were also excluded as models because of relatively low per capital personal income.

A set of 17 states that ranked in the top 25 on both personal income and tuition and fees for public four-year institutions were first selected. From this group, a set of nine states was then selected on the basis of their performance on a measure of financial access. Each of these states ranked higher than Maryland and higher than the national average on the Aid-to-tuition ratio—indicating that need-based student financial aid allocated to students attending public institutions covered relatively more of the weighted average tuition and fees at public 2- and 4-year institutions than was the case in other states (see Table A-7 for more information on this measure). As the following table shows, these states provide examples of various geographic regions, levels of enrollment and distribution of enrollment across sectors.

In the following tables, the most recent comparative data available are used. However, most of the data are from 2004 and earlier and, therefore, do not reflect the substantial increases in appropriations, tuition, and student aid in Maryland since 2004. The data are sufficient for describing trends, examining outcomes measures, and developing a financing model that can be adjusted as new data become available.

Definitions and sources of data are described in the attachment to this section. The data are drawn primarily from two national studies. Outcomes measures for Maryland and the peer states were drawn primarily from the databases developed for Measuring Up 2004 published by the National Center for Public Policy and Higher Education. Measuring Up 2006 will be published this fall. Data on the trends in appropriations, tuition, and student aid were drawn from databases compiled as part of the Recession, Retrenchment, and Recovery project currently underway. The project is being conducted by the Center for the Study of Education Policy at Illinois State University in partnership with the State Higher Education Executive Officers and the National Association of State Student Grant and Aid Programs.
Characteristics of Maryland and Peer States

Table A-1 shows the income, tuition, and enrollment information about Maryland and the nine peer states. While all of the peer states have relatively high median family income and high tuition, total enrollment and distribution of enrollment across sectors varies substantially.

<table>
<thead>
<tr>
<th></th>
<th>2004 Median Family Income</th>
<th>2003-04 Average Tuition &amp; Fees Public 4-Year</th>
<th>Total Headcount Enrollment</th>
<th>Percent of Total Enrollment</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Community Colleges</td>
</tr>
<tr>
<td>US</td>
<td>$38,044</td>
<td>$4,372</td>
<td>17,272,044</td>
<td>36%</td>
</tr>
<tr>
<td>Maryland</td>
<td>46,280</td>
<td>5,892</td>
<td>312,393</td>
<td>38%</td>
</tr>
<tr>
<td>Connecticut</td>
<td>$49,091</td>
<td>$5,565</td>
<td>172,775</td>
<td>26%</td>
</tr>
<tr>
<td>Illinois</td>
<td>40,000</td>
<td>5,533</td>
<td>801,401</td>
<td>45%</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>43,162</td>
<td>5,265</td>
<td>439,245</td>
<td>19%</td>
</tr>
<tr>
<td>Minnesota</td>
<td>45,500</td>
<td>4,888</td>
<td>349,021</td>
<td>32%</td>
</tr>
<tr>
<td>New Jersey</td>
<td>49,600</td>
<td>7,261</td>
<td>380,374</td>
<td>40%</td>
</tr>
<tr>
<td>New York</td>
<td>38,535</td>
<td>5,196</td>
<td>1,141,525</td>
<td>24%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>38,100</td>
<td>6,102</td>
<td>688,780</td>
<td>19%</td>
</tr>
<tr>
<td>Virginia</td>
<td>47,558</td>
<td>5,180</td>
<td>425,181</td>
<td>36%</td>
</tr>
<tr>
<td>Washington</td>
<td>41,264</td>
<td>3,933</td>
<td>343,524</td>
<td>55%</td>
</tr>
</tbody>
</table>

Sources:

Maryland is among the ten states with the highest non-white populations (US Bureau of the Census). By 2014, Maryland’s high school graduating class will be “minority-majority” due to the rate of growth in the Black, Hispanic, and Asian-Pacific Islander populations (WICHE, 2005). Table A-2 shows that Maryland has the highest minority population among the peer states, although Illinois, New Jersey, and New York exceed the national average.
Table A-2
Population Distribution by Race/Ethnicity
2004

<table>
<thead>
<tr>
<th></th>
<th>Population</th>
<th>% white</th>
<th>% Black or African American</th>
<th>% Hispanic</th>
<th>% Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>293,655,404</td>
<td>67%</td>
<td>13%</td>
<td>14%</td>
<td>7%</td>
</tr>
<tr>
<td>Peer State Total/Average</td>
<td>81,730,575</td>
<td>71%</td>
<td>14%</td>
<td>11%</td>
<td>6%</td>
</tr>
<tr>
<td>Maryland</td>
<td>5,558,058</td>
<td>60%</td>
<td>30%</td>
<td>5%</td>
<td>6%</td>
</tr>
<tr>
<td>Connecticut</td>
<td>3,503,604</td>
<td>76%</td>
<td>11%</td>
<td>11%</td>
<td>4%</td>
</tr>
<tr>
<td>Illinois</td>
<td>12,713,634</td>
<td>66%</td>
<td>16%</td>
<td>14%</td>
<td>5%</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>6,416,505</td>
<td>81%</td>
<td>7%</td>
<td>8%</td>
<td>6%</td>
</tr>
<tr>
<td>Minnesota</td>
<td>5,100,958</td>
<td>87%</td>
<td>5%</td>
<td>4%</td>
<td>6%</td>
</tr>
<tr>
<td>New Jersey</td>
<td>8,698,879</td>
<td>64%</td>
<td>15%</td>
<td>15%</td>
<td>8%</td>
</tr>
<tr>
<td>New York</td>
<td>19,227,088</td>
<td>61%</td>
<td>18%</td>
<td>16%</td>
<td>8%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>12,406,292</td>
<td>83%</td>
<td>11%</td>
<td>4%</td>
<td>3%</td>
</tr>
<tr>
<td>Virginia</td>
<td>7,459,827</td>
<td>69%</td>
<td>21%</td>
<td>6%</td>
<td>6%</td>
</tr>
<tr>
<td>Washington</td>
<td>6,203,788</td>
<td>78%</td>
<td>4%</td>
<td>8%</td>
<td>11%</td>
</tr>
</tbody>
</table>

Source: U.S. Bureau of the Census, Press Release August 11, 2005

Appropriations, Tuition, and Student Aid

To provide a context for discussion of financing models, the following sections provide information on funding components—appropriations, tuition, and student financial aid—for Maryland and the nine peer states. Most of the tables show FY2004 levels and ranks, the 25-year change, and two-year post-recession change.

Trends in State Appropriations for Higher Education

In 2004, Maryland ranked 25th among states in state dollars appropriated per full-time-equivalent (FTE) enrollment based on Grapevine data collected by Illinois State University. At $6,620 per FTE, the state equaled the national average.

Maryland appropriations per FTE declined slightly (<1 percent) during the recessions of the early 1980s and
recovered quickly as did most states. However, appropriations per FTE declined 12.6% in the two-year period following the 1991 recession and recovery was gradual. Funding was restored to 1991 levels in FY1999. Following the 2001 recession, appropriations per FTE declined 9.4%.

On average, FY2004 appropriations per FTE enrollment for the peer states were above the national average and higher than Maryland. Six of the nine peer states showed higher appropriations per FTE than Maryland. Between 1979 and 2004, appropriations per FTE adjusted for inflation declined in 29 of the 50 states. However, Maryland and five of the peer states were able not only to maintain but to increase higher education appropriations during this period, despite the significant effects of the 2001 recession. In the two-year period following the 2001 recession, appropriations per FTE declined in 44 states. Maryland and all of the model states, with the exception of New York, saw declines during this period. In four of these states, the decline was larger than the national average.

<table>
<thead>
<tr>
<th>Table A-3</th>
<th>Appropriations per FTE Enrollment</th>
<th>Maryland and Selected States</th>
</tr>
</thead>
<tbody>
<tr>
<td>US</td>
<td>$6,620</td>
<td>-</td>
</tr>
<tr>
<td>Peer State Average</td>
<td>7,185</td>
<td>-</td>
</tr>
<tr>
<td>Maryland</td>
<td>6,620</td>
<td>25</td>
</tr>
<tr>
<td>Connecticut</td>
<td>$9,714</td>
<td>3</td>
</tr>
<tr>
<td>Illinois</td>
<td>7,165</td>
<td>15</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>6,303</td>
<td>31</td>
</tr>
<tr>
<td>Minnesota</td>
<td>7,236</td>
<td>12</td>
</tr>
<tr>
<td>New Jersey</td>
<td>8,039</td>
<td>8</td>
</tr>
<tr>
<td>New York</td>
<td>7,858</td>
<td>9</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>6,400</td>
<td>27</td>
</tr>
<tr>
<td>Virginia</td>
<td>5,585</td>
<td>37</td>
</tr>
<tr>
<td>Washington</td>
<td>6,366</td>
<td>29</td>
</tr>
</tbody>
</table>

Sources: Appropriations: Illinois State University, Grapevine
Enrollment: FTE based on headcount data provide by NCES for special request

Another approach to comparing support for higher education across states was developed by Postsecondary Opportunity that takes the wealth of a state into consideration. Table A-4 shows the appropriations for higher education per $1000 of state personal income. Maryland is ranked 38th among the 50 states on this measure. The average for the peer states is lower than Maryland and the national average, with only Illinois, Minnesota, and Washington ranking higher. Between 1979 and 2004 Maryland increased its appropriations relative to state personal income fairly substantially.
With the exception of New York, appropriations per $1000 of personal income declined in the two-year period following the 2001 recession. Declines ranged from 7-23%. Maryland declined 10%.

### Table A-4

<table>
<thead>
<tr>
<th>State Tax Fund Appropriations for Higher Education per $1000 of State Personal Income</th>
<th>Maryland and Selected States</th>
</tr>
</thead>
<tbody>
<tr>
<td>U.S. Average</td>
<td>$6.86</td>
</tr>
<tr>
<td>Peer State Average</td>
<td>5.66</td>
</tr>
<tr>
<td>Maryland</td>
<td>5.74</td>
</tr>
<tr>
<td>Connecticut</td>
<td>5.06</td>
</tr>
<tr>
<td>Illinois</td>
<td>6.55</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>3.32</td>
</tr>
<tr>
<td>Minnesota</td>
<td>7.72</td>
</tr>
<tr>
<td>New Jersey</td>
<td>5.15</td>
</tr>
<tr>
<td>New York</td>
<td>5.52</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>5.12</td>
</tr>
<tr>
<td>Virginia</td>
<td>5.62</td>
</tr>
<tr>
<td>Washington</td>
<td>6.86</td>
</tr>
</tbody>
</table>


### Tuition and Fees

Based on data collected by the Washington Higher Education Coordinating Board, tuition and fees at Maryland public four-year institutions averaged $2,049 in 2004 dollars in 1979. By 2004, public 4-year tuition had increased 188% to $5,892. The increase of $3,843 was the 5th largest dollar increase among the 50 states. Community college tuition increased 157 percent between 1979 and 2004, from $1,041 to $2,675.

The nine peer states were selected because they, like Maryland, have relatively high tuition and fees rates at public four-year institutions and these rates are reflected in the following table. Maryland ranks 7th among all states for public university tuition and fees and 11th for costs at community colleges.

In the two-year period following the 2001 recession, Maryland and most of the peer states had substantial tuition increases that paralleled losses in appropriations, ranging from 18 percent in Pennsylvania to 50 percent in Massachusetts.

There was more variation in community college tuition and fees among these states. While Massachusetts, Minnesota, and New York have among the highest tuition and fees at community colleges, rates in Illinois and Virginia are relatively low. All of the peer states saw tuition increases at community colleges following the 2001 recession.
Table A-5
Tuition and Fees 2004
Maryland and Selected States

<table>
<thead>
<tr>
<th>Public 4-year Institutions</th>
<th>Public 2-year Institutions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tuition &amp; Fees</td>
<td>Post Recession% Change 2001-03</td>
</tr>
<tr>
<td>US</td>
<td>$4,372 - 23% $2,155 - 19%</td>
</tr>
<tr>
<td>Connecticut</td>
<td>5,565 9 21 2,310 19 22</td>
</tr>
<tr>
<td>Illinois</td>
<td>5,533 10 24 1,807 33 14</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>5,265 12 50 3,267 5 43</td>
</tr>
<tr>
<td>Minnesota</td>
<td>4,888 19 27 3,419 4 24</td>
</tr>
<tr>
<td>New Jersey</td>
<td>7,261 1 24 2,647 12 10</td>
</tr>
<tr>
<td>New York</td>
<td>5,196 14 26 2,956 6 4</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>6,101 6 18 2,417 18 7</td>
</tr>
<tr>
<td>Virginia</td>
<td>5,180 15 33 1,883 31 62</td>
</tr>
<tr>
<td>Washington</td>
<td>3,933 30 21 2,142 22 23</td>
</tr>
</tbody>
</table>


Family Income

Maryland describes itself as a high income state. The median income is about $10,000 above the national median and the gap between the Maryland and national median increases in the higher income quintiles. However, the median incomes of the lower quintiles are similar to the national average. Maryland’s poor are just as poor as the rest of the country. Family income did not keep pace with increases in tuition. Between 1979 and 2004, Maryland median family income increased about 12 percent. Even the substantial increases in the two highest income quartiles did not keep pace with tuition increases. With increases of seven to eight percent, the lower two income groups lost ground significantly.
Financial Aid

Data collected by the National Association of State Student Grant and Aid Programs (NASSGAP) show that between 1979 and 2001, Maryland made substantial investments in student aid for undergraduate need-based aid, increasing from $13.0 million in 1979 to $53.8 million in 2001. However, total undergraduate aid declined by $9.1 million in the two-year period following the 2001 recession, but the primary need-based programs remained relatively stable while cuts were made in non-need programs and other need-based programs.

Need-based aid allocated to students attending public 2- and 4-year institutions increased substantially starting in 1989 and continuing through the recessions of 1991 and 2001. Between 1979 and 2004, 31 states maintained or increased the amount of need-based aid per FTE enrollment at public institutions when inflation is taken into account. Maryland and seven of the nine peer states were among the states that were able to increase need-based student aid when the effects of inflation are considered. Among the peer states, only New York and Minnesota showed decreases in aid, although both states continue to have high need-based aid per public FTE. New York has the highest, considerably higher than the second ranked state, New Jersey.

<table>
<thead>
<tr>
<th>Table A-6</th>
<th>2004 Need-based Student Aid per Public FTE Enrollment</th>
<th>Maryland and Selected States</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2004</td>
<td>Rank 50 States</td>
</tr>
<tr>
<td>US</td>
<td>$216</td>
<td>-</td>
</tr>
<tr>
<td>Peer State Average</td>
<td>528</td>
<td>-</td>
</tr>
<tr>
<td>Maryland</td>
<td>288</td>
<td>15</td>
</tr>
<tr>
<td>Connecticut</td>
<td>286</td>
<td>16</td>
</tr>
<tr>
<td>Illinois</td>
<td>510</td>
<td>5</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>375</td>
<td>10</td>
</tr>
<tr>
<td>Minnesota</td>
<td>381</td>
<td>9</td>
</tr>
<tr>
<td>New Jersey</td>
<td>659</td>
<td>2</td>
</tr>
<tr>
<td>New York</td>
<td>988</td>
<td>1</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>627</td>
<td>3</td>
</tr>
<tr>
<td>Virginia</td>
<td>369</td>
<td>11</td>
</tr>
<tr>
<td>Washington</td>
<td>555</td>
<td>4</td>
</tr>
</tbody>
</table>

Source: NASSGAP Annual Survey

Aid-to-Tuition Ratio

The aid-to-tuition ratio is an indicator of the balance of need-based financial aid with tuition and fees. While this statistic does not take into account the differences in income
distribution among states. The ratio tends to be higher in states with strong need-based aid programs. Need-based aid, FTE, and tuition are all related to students attending in-state public 2- and 4-year institutions. This ratio is not a measure of affordability, but a way to compare trends across states and time on two variables over which state policy makers have influence or control.

Between 1979 and 2003 the Aid-to-Tuition Ratio for Maryland showed an overall increase. The ratio of 5.6 in 2003 ranks Maryland 25th among the states, but below the national average. Although the state maintained the total dollar allocation to need-based aid for students attending public institutions following the 2001 recession, the aid-to-tuition ratio declined because of enrollment and tuition increases.

### Table A-7

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>US</td>
<td>$9</td>
<td>-32%</td>
<td>-3%</td>
</tr>
<tr>
<td>Peer States</td>
<td>14</td>
<td>-19%</td>
<td>-14%</td>
</tr>
<tr>
<td>Maryland</td>
<td>6</td>
<td>17%</td>
<td>-20%</td>
</tr>
<tr>
<td>Connecticut</td>
<td>-</td>
<td>na</td>
<td>-</td>
</tr>
<tr>
<td>Illinois</td>
<td>17</td>
<td>4</td>
<td>-13%</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>11</td>
<td>9</td>
<td>63%</td>
</tr>
<tr>
<td>Minnesota</td>
<td>11</td>
<td>8</td>
<td>-52%</td>
</tr>
<tr>
<td>New Jersey</td>
<td>14</td>
<td>6</td>
<td>-38%</td>
</tr>
<tr>
<td>New York</td>
<td>22</td>
<td>2</td>
<td>-57%</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>13</td>
<td>7</td>
<td>236%</td>
</tr>
<tr>
<td>Virginia</td>
<td>10</td>
<td>10</td>
<td>-25%</td>
</tr>
<tr>
<td>Washington</td>
<td>18</td>
<td>3</td>
<td>284%</td>
</tr>
</tbody>
</table>

The peer states were selected because they are high tuition states that have maintained a commitment to student financial aid. The 2003 aid-to-tuition ratios for these states rank in the top ten while Maryland ranks 25th among the 50 states on this measure. However, with an increase in the Aid-to-Tuition ratio of 17 percent between 1979 and 2003, Maryland gained ground on several of the peer states that saw the ratio decline during this period. However, neither Maryland nor the other peer states, with the exception of Pennsylvania, were able to maintain the ratio in the two years following the 2001 recession.

**Updated Aid-To-Tuition Ratio for 2004.** When this study began, the data to calculate the aid-to-tuition ratio were not yet available for 2004. The 2004 data, recently obtained, show that Maryland had moved up from 25th to 23rd among the 50 states. The ratio for
Maryland increased from 5.6 in 2003 to 6.5 in 2004 and was slightly above the national average of 6.2 although it still trailed the peer state average of 15.0. However, four of the peer states were no longer in the top ten on this measure, reflecting advancements in other states rather than declines in the ATR for these states.

State Tax Effort

Table A-8 compares changes in state revenues, total state expenditures, and appropriations to higher education between FY2004 and FY2005. These data and the analyses are drawn from the FY2005 report on the Grapevine Survey of Higher Education Appropriations. The report indicates that “in many states, changes in tax appropriations for higher education were not as large as changes in available general fund revenues (state fiscal “capacity”) or total state appropriations (a measure of legislative “willingness to spend”).” In Maryland and four of the peer states, the “effort” for higher education was less than the “capacity” of the state. Maryland had the largest difference.

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>US Range</td>
<td>-4.6 to +25.6</td>
<td>-14.0 to +29.8</td>
<td>-1.7 to +11.1</td>
<td>-</td>
</tr>
<tr>
<td>Peer States Average</td>
<td>3.2</td>
<td>6.0</td>
<td>4.7</td>
<td>+1.5</td>
</tr>
<tr>
<td>Maryland</td>
<td>5.5</td>
<td>8.7</td>
<td>2.1</td>
<td>-3.4</td>
</tr>
<tr>
<td>Connecticut</td>
<td>3.3</td>
<td>4.3</td>
<td>2.8</td>
<td>-0.5</td>
</tr>
<tr>
<td>Illinois</td>
<td>0.6</td>
<td>5.0</td>
<td>-1.7</td>
<td>-2.4</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>1.4</td>
<td>8.4</td>
<td>6.3</td>
<td>+4.9</td>
</tr>
<tr>
<td>Minnesota</td>
<td>-2.5</td>
<td>3.5</td>
<td>-1.1</td>
<td>+1.4</td>
</tr>
<tr>
<td>New Jersey</td>
<td>11.0</td>
<td>14.8</td>
<td>8.8</td>
<td>-3.0</td>
</tr>
<tr>
<td>New York</td>
<td>0.9</td>
<td>2.3</td>
<td>7.9</td>
<td>+7.0</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>4.6</td>
<td>4.3</td>
<td>3.4</td>
<td>-3.4</td>
</tr>
<tr>
<td>Virginia</td>
<td>6.7</td>
<td>8.2</td>
<td>10.8</td>
<td>+4.1</td>
</tr>
<tr>
<td>Washington</td>
<td>2.7</td>
<td>3.0</td>
<td>4.9</td>
<td>+2.2</td>
</tr>
</tbody>
</table>

State Tax Shortfalls

According to work by Donald Boyd at the National Center for Higher Education Management Systems and prior work by Harold Hovey, recessions are not the only economic factors affecting state support for higher education. All states are expected to face a gap between revenue growth and the growing costs of public services. Growth in demand for such services as Medicaid, K-12 education, and corrections will place pressure on states’ budgets and higher education support. In addition tax revenue is not expected to grow as fast as in the 1990s and federal grants to states are expected to decline substantially.

Maryland and the peer states are expected to see declining state revenues, but generally not a substantial as the national average and other states. Maryland has the 5th lowest loss among all 50 states.

<table>
<thead>
<tr>
<th>Table A-9</th>
<th>Projected State and Local Deficits</th>
<th>Percentage of Revenue</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2005-2013</td>
<td></td>
</tr>
<tr>
<td>US</td>
<td>-5.7</td>
<td></td>
</tr>
<tr>
<td>Maryland</td>
<td>-2.1</td>
<td></td>
</tr>
<tr>
<td>Connecticut</td>
<td>-3.8</td>
<td></td>
</tr>
<tr>
<td>Illinois</td>
<td>-5.6</td>
<td></td>
</tr>
<tr>
<td>Massachusetts</td>
<td>-2.3</td>
<td></td>
</tr>
<tr>
<td>Minnesota</td>
<td>-4.4</td>
<td></td>
</tr>
<tr>
<td>New Jersey</td>
<td>-1.0</td>
<td></td>
</tr>
<tr>
<td>New York</td>
<td>-5.2</td>
<td></td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>-5.6</td>
<td></td>
</tr>
<tr>
<td>Virginia</td>
<td>-4.2</td>
<td></td>
</tr>
<tr>
<td>Washington</td>
<td>-8.0</td>
<td></td>
</tr>
</tbody>
</table>


Higher Education Outcomes for Maryland and Peer States

Comparisons of key outcome measures for Maryland and the peer states can inform the discussions of appropriate alignment of the funding components. Several sources of data are used in the following sections, drawn from national research and policy organizations that have developed analyses that are useful for states in addressing key policy issues. These organizations provide the most useful and reliable comparative information and many of these studies are updated periodically so that states can monitor their progress and that of selected states.
Education Pipeline

One of the variables addressed in *Measuring Up 2004* by the National Center for Public Policy and Higher Education (NCPPHE) is participation in higher education. Maryland is among the states receiving an “A” for participation, along with peer states Connecticut, Illinois, Massachusetts, and Minnesota. The measures used are shown in Table A-10. Maryland ranks 21st among all states in the “chance for college by age 19”, which considers both high school graduation rates and college continuation rates. Eight of the nine peer states show higher chances. Maryland is close to the national and peer state average on the percent of young adults enrolled in college and among the top states in part-time enrollment of adults 25-49 years old.

<table>
<thead>
<tr>
<th>Table A-10</th>
<th>Education Pipeline</th>
<th>Transition and Completion Rates</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Chance for College by Age 19</td>
<td>18-24 year olds enrolled</td>
</tr>
<tr>
<td></td>
<td>Percentage 2000</td>
<td>Rank</td>
</tr>
<tr>
<td>Nation</td>
<td>38%</td>
<td>-</td>
</tr>
<tr>
<td>Peer State</td>
<td>44</td>
<td>-</td>
</tr>
<tr>
<td>Maryland</td>
<td>39</td>
<td>21</td>
</tr>
<tr>
<td>Connecticut</td>
<td>48%</td>
<td>8</td>
</tr>
<tr>
<td>Illinois</td>
<td>42</td>
<td>14</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>52</td>
<td>3</td>
</tr>
<tr>
<td>Minnesota</td>
<td>53</td>
<td>2</td>
</tr>
<tr>
<td>New Jersey</td>
<td>52</td>
<td>3</td>
</tr>
<tr>
<td>New York</td>
<td>34</td>
<td>32</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>45</td>
<td>11</td>
</tr>
<tr>
<td>Virginia</td>
<td>39</td>
<td>19</td>
</tr>
<tr>
<td>Washington</td>
<td>32</td>
<td>43</td>
</tr>
</tbody>
</table>

Source: *Measuring Up 2004*, State Data

Of particular interest is the contrast between the pipeline of Maryland students and the education levels of the state’s population. Maryland attracts substantial numbers of people with bachelor’s degrees to its national laboratories and technology enterprises. At 34 percent, Maryland ranks 5th in the percent of the population aged 25-44 holding a bachelor’s degree or higher despite the relatively low degree completion rate of native students. This is accounted for by the in-migration of college-educated adults. According to the National Center for Higher Education Management Systems, Maryland is a net importer of adults at all education levels, but particularly adults with bachelor’s and graduate/professional degrees.
### Table A-11
**Education Attainment Levels**

<table>
<thead>
<tr>
<th></th>
<th>Percent Degreed Population*</th>
<th>Rank Degreed Population*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nation</td>
<td>27</td>
<td>-</td>
</tr>
<tr>
<td>Maryland</td>
<td>34</td>
<td>5</td>
</tr>
<tr>
<td>Connecticut</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Illinois</td>
<td>35</td>
<td>2</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>30</td>
<td>11</td>
</tr>
<tr>
<td>Minnesota</td>
<td>39</td>
<td>1</td>
</tr>
<tr>
<td>New Jersey</td>
<td>32</td>
<td>6</td>
</tr>
<tr>
<td>New York</td>
<td>34</td>
<td>3</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>31</td>
<td>8</td>
</tr>
<tr>
<td>Virginia</td>
<td>27</td>
<td>17</td>
</tr>
<tr>
<td>Washington</td>
<td>32</td>
<td>7</td>
</tr>
</tbody>
</table>

*Percent of Population 25-44 with a Bachelor's Degree or Higher – 2000

---

**Participation by Race and Income**

Supplemental information provided by *Measuring Up 2004* shows college participation by race and by income level. Maryland is among the states with the highest participation rates among both the white and non-white 18-24 year olds. Although there is a substantial gap between white and non-white participation rates, both rates were above the national average in 2000-02 and showed improvement since 1990-92. With the exception of New York, Maryland ranks the highest among the model states in participation of non-white 18-24 year olds.

Despite the relatively high proportion of Maryland's non-white 18-24 year olds enrolled in college, enrollment of low income students in 2000-02 was below the national average, ranking 34th out of the 39 states for which data were available. Participation improved among both low and high income young adults between 1990-92 and 2000-02, but there was a substantial gap in participation between the two groups. Minnesota and Washington had better participation rates among the lowest income group and the narrowest gap between low and high income groups.
### Table A-12
#### Percent of 18-24 Year Olds Enrolled in College By Race

<table>
<thead>
<tr>
<th></th>
<th>1990-92</th>
<th>2000-02</th>
<th>Rank Among Reporting States 2000-02</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>white</td>
<td>non-white</td>
<td>white</td>
</tr>
<tr>
<td>US</td>
<td>35.5</td>
<td>25.3</td>
<td>37.2</td>
</tr>
<tr>
<td>Maryland</td>
<td>31.8</td>
<td>25.1</td>
<td>40.6</td>
</tr>
<tr>
<td>Connecticut</td>
<td>38.9</td>
<td>15.0</td>
<td>48.7</td>
</tr>
<tr>
<td>Illinois</td>
<td>36.3</td>
<td>27.5</td>
<td>37.6</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>37.7</td>
<td>26.5</td>
<td>40.3</td>
</tr>
<tr>
<td>Minnesota</td>
<td>43.4</td>
<td>36.7</td>
<td>37.7</td>
</tr>
<tr>
<td>New Jersey</td>
<td>41.4</td>
<td>27.6</td>
<td>47.2</td>
</tr>
<tr>
<td>New York</td>
<td>39.9</td>
<td>26.0</td>
<td>43.1</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>31.3</td>
<td>22.8</td>
<td>41.4</td>
</tr>
<tr>
<td>Virginia</td>
<td>30.3</td>
<td>33.0</td>
<td>33.5</td>
</tr>
<tr>
<td>Washington</td>
<td>32.1</td>
<td>45.5</td>
<td>37.5</td>
</tr>
</tbody>
</table>

Number of States Reporting: 49


### Table A-13
#### Percent of 18-24 Year Olds Enrolled in College By Income

<table>
<thead>
<tr>
<th></th>
<th>1990-92</th>
<th>2000-02</th>
<th>Rank Among Reporting States 2000-02</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Lowest 20%</td>
<td>Highest 20%</td>
<td>Lowest 20%</td>
</tr>
<tr>
<td>US</td>
<td>24.3</td>
<td>52.7</td>
<td>21.1</td>
</tr>
<tr>
<td>Maryland</td>
<td>15.3</td>
<td>50.3</td>
<td>19.4</td>
</tr>
<tr>
<td>Connecticut</td>
<td>13.8</td>
<td>46.2</td>
<td>Na</td>
</tr>
<tr>
<td>Illinois</td>
<td>20.5</td>
<td>48.3</td>
<td>25.4</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>23.8</td>
<td>52.4</td>
<td>27.0</td>
</tr>
<tr>
<td>Minnesota</td>
<td>40.4</td>
<td>65.0</td>
<td>38.4</td>
</tr>
<tr>
<td>New Jersey</td>
<td>27.3</td>
<td>48.3</td>
<td>17.1</td>
</tr>
<tr>
<td>New York</td>
<td>22.7</td>
<td>50.6</td>
<td>29.7</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>23.7</td>
<td>46.4</td>
<td>21.4</td>
</tr>
<tr>
<td>Virginia</td>
<td>27.2</td>
<td>44.0</td>
<td>24.0</td>
</tr>
<tr>
<td>Washington</td>
<td>29.7</td>
<td>52.1</td>
<td>34.1</td>
</tr>
</tbody>
</table>

Number of States Reporting: 39

Degree Completion

Maryland ranks 41st among all states and is tied for last among peers in the number of certificates and degrees awarded per 100 undergraduate students. In contrast, Maryland is among the top states in the completion rates of first-time, full-time students enrolled in bachelor’s degree-granting institutions and all of the peer states are at or above the national average on this measure. The seeming contradiction between these two measures is explained, at least in part, by the differences between the two groups of students involved. The bachelor’s degree measure includes only full-time students enrolling in four-year institutions, a group likely to include many traditional students. The total undergraduate enrollment includes many non-traditional students attending part time or intermittently.

<table>
<thead>
<tr>
<th>Degree Completion</th>
</tr>
</thead>
<tbody>
<tr>
<td>Table A-14</td>
</tr>
<tr>
<td>Degrees per 100 Undergrad Enrollment</td>
</tr>
<tr>
<td>US</td>
</tr>
<tr>
<td>Maryland</td>
</tr>
<tr>
<td>Connecticut</td>
</tr>
<tr>
<td>Illinois</td>
</tr>
<tr>
<td>Massachusetts</td>
</tr>
<tr>
<td>Minnesota</td>
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<tr>
<td>New Jersey</td>
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<tr>
<td>New York</td>
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<tr>
<td>Pennsylvania</td>
</tr>
<tr>
<td>Virginia</td>
</tr>
<tr>
<td>Washington</td>
</tr>
</tbody>
</table>

Source: Measuring Up 2004, State Data

Affordability

*Measuring Up* 2004 considers a variety of measures of affordability, several of which are summarized in the following table for Maryland and peer states. Maryland is 27th among the 50 states in overall affordability. Illinois, Minnesota, New Jersey, and Virginia are among the states with higher rankings. The percent of income needed to pay costs at community colleges in Minnesota and Virginia is among the lowest.

1 The affordability Index Score is based on students’ and families’ ability to pay for college (type of institution, financial aid, and income), the amount of need-based aid they receive, and loan burden. Ability to pay is weighted 50, aid 40, and loan burden 10 in calculating the index score.
Minnesota also shows a low percent of income needed to pay costs at public universities. Although the other states have relatively high tuition, the investment in student aid is relatively high as indicated by the comparison of state need-based aid to federal aid.

<table>
<thead>
<tr>
<th>Table A-15</th>
<th>Affordability of Higher Education</th>
<th>Maryland and Selected States 2004</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Overall Affordability</td>
<td>Com Colleges</td>
</tr>
<tr>
<td>US</td>
<td>57</td>
<td>-</td>
</tr>
<tr>
<td>Maryland</td>
<td>53</td>
<td>27</td>
</tr>
<tr>
<td>Connecticut</td>
<td>53</td>
<td>27</td>
</tr>
<tr>
<td>Illinois</td>
<td>66</td>
<td>4</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>51</td>
<td>35</td>
</tr>
<tr>
<td>Minnesota</td>
<td>72</td>
<td>3</td>
</tr>
<tr>
<td>New Jersey</td>
<td>64</td>
<td>6</td>
</tr>
<tr>
<td>New York</td>
<td>56</td>
<td>21</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>59</td>
<td>15</td>
</tr>
<tr>
<td>Virginia</td>
<td>61</td>
<td>11</td>
</tr>
<tr>
<td>Washington</td>
<td>56</td>
<td>21</td>
</tr>
</tbody>
</table>

Source: Measuring Up 2004, State Data
Maryland and Peer States
Trends, Characteristics, and Outcome Measures

Definitions, Limitations, and Sources of Data

Outcomes measures for Maryland and the peer states were drawn primarily from the databases developed for Measuring Up 2004 published by the National Center for Public Policy and Higher Education. All of the data and analyses are available on-line at http://measuringup.highereducation.org/default.cfm

The following are the definitions and sources of data used in this report drawn from this source. The Technical Guide for Measuring Up is available at http://measuringup.highereducation.org/docs/technicalguide_2004.pdf

**Chance for college by age 19** measures the probability that ninth grade students will finish high school within four years and go on to college immediately after high school based on high school completion rates and college continuation rates. The measure was developed by Thomas Mortenson and drawn from Postsecondary Education Opportunity, September 2002. The data for all components are from the National Center for Education Statistics (NCES).

**18-24 year olds enrolled in college** is the percent of this age group who are currently enrolled in education and training programs beyond high school including both full- and part-time enrollment. Data are drawn from the Current Population Survey, 2000, 2001, 2002.

**25-49 year olds enrolled part-time** in postsecondary education is the percentage of this age group with a high school credential who are currently enrolled. Data are drawn from NCES 2001 fall enrollment surveys and the Current Population Survey 2000, 2001, and 2002.

**Affordability Index Score** is based on students’ and families’ ability to pay for college (type of institution, financial aid, and income), the amount of need-based aid they receive, and loan burden. Ability to pay is weighted 50, aid 40, and loan burden 10 in calculating the index score.

**Family ability to pay** is the percent of income (average of all income groups needed to pay college expenses minus financial aid at a public two-year or four-year institution. Data are drawn from multiple sources.

Data on the trends in appropriations, tuition, and student aid were drawn from databases compiled as part of the Recession, Retrenchment, and Recovery project currently underway. The project is being conducted by the Center for the Study of Education Policy at Illinois State University in partnership with the State Higher Education Executive Officers and the National Association of State Student Grant and Aid Programs.
Aid-to-Tuition Ratio is a measure of the balance of state need-based aid allocated to students attending public institutions and weighted average tuition and fees at public institutions

\[ \text{ATR} = \frac{\text{Need-Based Aid per FTE}}{\text{Tuition and Fees}} \]

Data for tuition and fees were available for public four-year institutions and two-year institutions separately, but the available public student financial aid data did not provide a breakout for two- and four-year public institutions. To address this issue, a weighted Average Public Tuition and Fees (APTF) was calculated as follows:

\[ \text{APTF} = \frac{(2\text{yr T&F} \times 2\text{yr FTE}) + (4\text{yr T&F} \times 4\text{yr FTE})}{\text{Total Public FTE}} \]

Described in this section are limitations and considerations related to each of the data sets used in the ATI calculation. Each of the data sets are widely used and drawn from reliable sources. This analysis focuses on the factors that states can influence or control (tuition and fees at public institutions and state grant aid) and enrollment trends.

Consumer Price Index was used in this study to adjust dollars for inflation. The Index was obtained from the U.S. Department of Labor, Bureau of Labor Statistics.

Family Income is the average total income for a family converted to 2004 dollars using the Consumer Price Index. The data were provided by Pinkerton Computer Consultants, Inc. and were drawn from the Current Population Survey of the Bureau of Census March Supplement. In the calculation of the ACI, the 30\textsuperscript{th} percentile of family income was used. The income data are derived from samples taken by the Bureau of the Census. Because of the inherent nature of sample data, the variance of the data from year to year in the sample is likely to be greater than that in the population.

Full-Time Equivalent (FTE) Enrollment is undergraduate enrollment at public 2-year and 4-year institutions. FTE is calculated from historical fall headcount enrollment by sector and attendance pattern as follows:

\[ \text{FTE} = \text{Headcount Full-Time Enrollment} + \frac{1}{3} \text{Headcount Part-Time Enrollment} \]

Headcount data were obtained through a special request to the National Center for Education Statistics (NCES). While NCES has reported FTE enrollment since the early 1980s, the method of calculation changed twice in the time period under consideration in this study. Therefore, it was decided to use headcount data and to use a consistent method to estimate FTE enrollment, as recommended by NCES.
FTE enrollment was calculated from headcount data which included out-of-state students. In states where out-of-state students represent a significant portion of total enrollment in public institutions, appropriations and student financial aid would be understated. Data on residence of all students is not available. However, data on residence and migration of first-time freshmen gives some idea of the distribution of out-of-state students. According to 2002 residence and migration data, a majority of states fell within ±10 percentage points of the national average.

**Need-Based Aid** is the current dollars of need-based grant aid allocated to students attending public institutions. Historical expenditures of state funds for student financial aid were obtained from the National Association of State Student Grant and Aid Programs. The data include need-based program funds awarded to students attending in-state public institutions. Expenditures for non-grant aid—loans, loan forgiveness programs, conditional grants, work study, tuition waivers, and other non-grant aid programs are not included.

In this report, need-based aid per FTE was used to describe trends and to calculate indicators including comparisons of aid to tuition at public institutions. The need-based aid allocated to public institutions includes aid given to graduate students, but the other data are for undergraduates only. Nationally, grant aid to graduate students represents 3 to 5 percent of the total grant aid.

**State Appropriations for Higher Education** data were provided by the Center for the Study of Education Policy at Illinois State University.

**Tuition and Fees** are comprised of resident undergraduate annual tuition and required fees for flagship universities, state colleges and universities, and community colleges. A weighted average tuition and fees for public institutions in current dollars was calculated based on full-time-equivalent enrollment. The historical tuition and fees data were provided by the Washington Higher Education Coordinating Board. Data for state colleges and universities and community colleges are based on a sample of institutions within each state. “4-year tuition and fees” is the average annual undergraduate tuition and required fees at selected public regional universities and the flagship university in each state. “2-year tuition and fees” is the average for representative community college.

**Other Sources**


Appendix 2
Summary of State Postsecondary Education Financing Models
<table>
<thead>
<tr>
<th>State</th>
<th>Structure*</th>
<th>Appropriations</th>
<th>Tuition</th>
<th>Student Aid**</th>
<th>Alignment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Connecticut</td>
<td>Regulatory coordinating board with program approval authority and budget review/recommendation authority; student aid housed in separate agency.</td>
<td>Coordinating board sets budget guidelines and parameters. Systems develop budget requests that are incrementally based as well as driven by board priorities.</td>
<td>Set by institutions. Board policy limits annual increases to 15%. Board policy of 30-35% student cost share not being met.</td>
<td>68.5% need-based; 8% based on need and merit; 23.5% on special purpose. One centralized need-based aid program that is merit-screened (upper 20% of class). Other programs are decentralized and sector specific. Program for public universities requires state match 15% tuition set aside but not fully-funded. Program for privates requires state funding equal to 25% of appropriation to publics also not being met. 54% of need-based aid goes to public institution students; 66% to private and proprietary.</td>
<td>Board policy that 15% of tuition must be set aside for need-based aid.</td>
</tr>
<tr>
<td>Illinois</td>
<td>Regulatory coordinating board with program approval authority and consolidated or aggregated budget authority; separate student aid agency.</td>
<td>Coordinating board sets budget guidelines and parameters. Systems develop budget requests that are board policy driven.</td>
<td>Set by institutions. Statute requires tuition guarantee that tuition remain constant for students through four years of study.</td>
<td>95% need-based; 1% merit; 1% special purpose. One centralized program based on financial need with purpose of access and choice. Another program provides additional grant aid to $0 EFC freshmen. 52% of need-based aid goes to public institution students; 48% to private.</td>
<td>No formal alignment but coordinating board plays key role in decisions on appropriations, tuition, and student aid.</td>
</tr>
<tr>
<td>Maryland</td>
<td>Regulatory coordinating board with program approval authority and consolidated or aggregated budget authority; student aid administration housed with board.</td>
<td>Budget request formula driven. Appropriation allocations for other systems tied to Univ. System of Maryland appropriation.</td>
<td>Set by institutions.</td>
<td>59% need-based; 11% need and merit based; 6% merit; 24% special purpose. Centralized primary aid program based on financial need with eligibility capped at percent of remaining need. Supplemental campus-based funding for later-applying students and separate program for economically and educationally disadvantaged. 52% of need-based aid goes to public institution students; 48% to private.</td>
<td>No formal alignment. Funding levels examined each year based on economic and other factors.</td>
</tr>
<tr>
<td>State</td>
<td>Structure*</td>
<td>Appropriations</td>
<td>Tuition</td>
<td>Student Aid**</td>
<td>Alignment</td>
</tr>
<tr>
<td>------------</td>
<td>---------------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------------</td>
<td>------------------------------------------------------------------------</td>
<td>----------------------------------------------------------------------------------------------------------</td>
<td>-----------------------------------------------</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>Regulatory coordinating board with program approval authority and consolidated or aggregated budget authority; student aid administration housed with board.</td>
<td>Board developed funding formula with institutions to “close the gap” based on operating budgets minus state support and tuition. Plan is to close funding gap over seven years and in proposed legislation.</td>
<td>Board sets tuition rates. Institutions set fees that are now four times the amount of tuition. State “fair share” formula calls for state funding to equal 66% of costs; actual is nearing 40%.</td>
<td>27% need-based; 47% need and merit based; 26% special purpose. Primary need-based aid program is centralized and eligibility capped by EFC. Separate decentralized need-based programs for public universities – allocated in block grants -and private institutions. State-appropriated tuition waiver program helps offset tuition increases at publics. 57% of need-based aid goes to public institution students; 40% to private; remainder to students going out-of-state</td>
<td>No formal alignment; historical tuition caps resulted in high fees.</td>
</tr>
<tr>
<td>Minnesota</td>
<td>Consolidated governing board with two boards encompassing all institutions; a separate cabinet level student aid agency.</td>
<td>One system board request is enrollment driven; the other is policy-based. Tool developed so legislature could calculate tuition costs at different appropriation levels.</td>
<td>Tuition set by systems. The 2/3:1/3 ratio of state to student funding responsibility is in law. Current ratio estimated at 50:50.</td>
<td>54% need-based; 46% special purpose but latter includes state loan program. One centralized program with purpose of access and choice. Eligibility based on financial need with “shared responsibility” concept that requires student to be responsible for 46 percent of cost. 52% of need-based aid goes public institution students; 48% to private.</td>
<td>No formal alignment. Appropriation request shows proposed tuition increases. Student aid appropriation based on assumptions about cost and enrollment.</td>
</tr>
<tr>
<td>New Jersey</td>
<td>Regulatory coordinating board with program approval authority and budget review/recommendation authority; separate student aid agency.</td>
<td>Institutional requests policy and program driven; appropriations across-the-board based on state budget decisions. Law establishes funding levels for public universities but level has not been attained.</td>
<td>Set by institutions. Subject to annual legislative caps otherwise schools face penalties. Board policy that state to student funding ratio be 2/3:1/3 has now been disbanded.</td>
<td>88% need-based; 12% merit based; less than 1% special purpose. One centralized program based on financial need. Goals include access and choice and affordability. Supplemental program for economically and educationally disadvantaged. Helps cover additional college costs beyond tuition and support services. 65% of need-based aid goes to public institution students; 28% to private; 7% to proprietary.</td>
<td>No formal alignment. Currently working on recommended funding methodology for higher education.</td>
</tr>
<tr>
<td>State</td>
<td>Structure*</td>
<td>Appropriations</td>
<td>Tuition</td>
<td>Student Aid**</td>
<td>Alignment</td>
</tr>
<tr>
<td>---------</td>
<td>----------------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------------</td>
<td>------------------------------------------------------------------------</td>
<td>------------------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------</td>
</tr>
<tr>
<td>New York</td>
<td>Regulatory coordinating board with program approval authority; no statutory budget role; separate student aid agency.</td>
<td>SUNY institutional requests are programmatic and inflation driven. Also use a 12-cell enrollment driven matrix. CUNY’s new approach based on funding shares of 70% from state and city and remainder from school, student, or philanthropy.</td>
<td>SUNY sets tuition but legislative has to approve. All state universities subject to same tuition rates. State pattern is to keep tuition relatively flat for 8 years then make substantial increase.</td>
<td>98% need-based; 1.4% merit based; less than 1% special purpose. One large centralized need-based program based on family income. Cap on income. 50% of need-based aid goes to public institution students; 48% to private; 2% to proprietary.</td>
<td>No formal alignment. Student aid is an entitlement.</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>Planning/Services agency with no statutory budget or program approval roles; state-owned schools and state-related schools have separate governing boards; separate student aid agency.</td>
<td>Institutional requests are incremental around system priorities for state-owned institutions.</td>
<td>System board sets tuition for state-owned schools. State-related boards set their tuition also.</td>
<td>99% need-based; 1% special purpose. One large centralized program based on financial need with eligibility capped at percent of remaining need. Formula change in FY2007 to focus on students with least ability to pay. Award amounts in new formula determined by payment schedule with a cost cap. 48% of need-based aid goes to public institution students; 39% to private; 11% to proprietary; remainder out-of-state.</td>
<td>No formal alignment. Appropriation request shows proposed tuition increases. Student aid appropriation based on cost assumptions and enrollment increases.</td>
</tr>
<tr>
<td>Virginia</td>
<td>Regulatory coordinating board with program approval authority and budget review/recommendation authority; student aid administration housed with board.</td>
<td>New budget guidelines base institutional requests on student/faculty ratios by discipline. Goal is to reach 60% of peer group average in faculty salaries.</td>
<td>Institutional governing boards set tuition.</td>
<td>46% need-based; 26% based on need and merit; 28% special purpose. Four statewide need-based aid programs - one with a gpa requirement - decentralized and sector specific. Funding for public institution students appropriated directly to schools; private school funding goes to the board. 62% of need-based aid goes to public institution students; 1% to private; 37% unspecified.</td>
<td>No formal alignment. Appropriation request shows proposed tuition increases. Student aid appropriation based on estimates of unmet need.</td>
</tr>
<tr>
<td>State</td>
<td>Structure*</td>
<td>Appropriations</td>
<td>Tuition</td>
<td>Student Aid**</td>
<td>Alignment</td>
</tr>
<tr>
<td>-------</td>
<td>-----------------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------------</td>
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<td>-----------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Washington</td>
<td>Regulatory coordinating board with program approval authority and budget review/recommendation authority; student aid administration housed with board.</td>
<td>Board develops guidelines from statewide priorities in master plan. Institutions submit budget to board and Governor at same time. Both board and Governor make recommendations.</td>
<td>Board sets undergraduate resident tuition. Institutions set graduate tuition.</td>
<td>74% need-based; 1% merit-based; 25% special purpose. Merit funding eliminated in FY2007. One centralized need-based program tied to family income. Student aid goal is to help those below median state income. 87% of need-based aid goes to public institution students; 10% to private; 3% to proprietary</td>
<td>No formal alignment. Appropriation request shows proposed tuition increases. Common understanding that as tuition increases, so does student aid.</td>
</tr>
</tbody>
</table>

**Source: Percentage breakdown by type of aid and distribution of undergraduate need-based aid by school type from *FY2004 National Association of State Student Grant and Aid Programs Survey*. 
Appendix 3

Summary of Peer States Primary Need-Based Aid Program Attributes
### Summary of Peer States Primary Need-Based Aid Program Attributes

<table>
<thead>
<tr>
<th>State</th>
<th>Program Name</th>
<th>Application Deadline</th>
<th>Basis of Eligibility</th>
<th>Eligibility Limits</th>
<th>Maximum Award</th>
<th>Part-Time Eligibility</th>
<th>Administration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Connecticut</td>
<td>Capitol Scholarship</td>
<td>February 15</td>
<td>Ability to Pay (EFC)</td>
<td>Rank in upper 20% of class</td>
<td>$3000 in FY2007</td>
<td>No</td>
<td>Centralized</td>
</tr>
<tr>
<td>Illinois</td>
<td>Monetary Award</td>
<td>October 1*</td>
<td>Financial Need</td>
<td>$9000 EFC</td>
<td>$4968 in FY2007</td>
<td>Yes</td>
<td>Centralized with advanced payment to institutions</td>
</tr>
<tr>
<td>Maryland</td>
<td>Education Assistance Grant</td>
<td>March 1</td>
<td>Financial Need</td>
<td>$18,300 cost cap in FY2007; 60% of remaining need at public 2’s; 40% at four-year institutions</td>
<td>$3,000 in FY2007</td>
<td>Separate Program</td>
<td>Centralized</td>
</tr>
<tr>
<td>Massachusetts</td>
<td>MASS Grant</td>
<td>May 1</td>
<td>Ability to Pay (EFC)</td>
<td>$3,850 EFC</td>
<td>$2,300 in FY2006</td>
<td>Separate Program</td>
<td>Centralized</td>
</tr>
<tr>
<td>Minnesota</td>
<td>Minnesota Grant</td>
<td>30 days after start of the term</td>
<td>Financial Need</td>
<td>Student expected to cover 46% of college cost</td>
<td>$7,600 in FY2004</td>
<td>Yes</td>
<td>Formula centralized; application/awards decentralized; funds allocated to campus based on proportion of need</td>
</tr>
<tr>
<td>New Jersey</td>
<td>Tuition Assistance Grant</td>
<td>June 1 for renewals; October 1 for new students</td>
<td>Financial Need</td>
<td>None</td>
<td>In FY2005, $9000, $5000, and $2000 at privates, public 4’s, public 2’s</td>
<td>Separate Program</td>
<td>Centralized</td>
</tr>
<tr>
<td>State</td>
<td>Program Name</td>
<td>Application Deadline</td>
<td>Basis of Eligibility</td>
<td>Eligibility Limits</td>
<td>Maximum Award</td>
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<td>Administration</td>
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</tr>
<tr>
<td>New York</td>
<td>Tuition Assistance Program</td>
<td>Year round until May 1</td>
<td>Ability to Pay (Net Taxable Income)</td>
<td>$80,000 net tax. income for dependents, and independents with dependents; $10,000 for single independents</td>
<td>$5,000 in FY2006</td>
<td>Yes</td>
<td>Centralized</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>Pennsylvania State Grant</td>
<td>May 1 renewals and 4-year 1st time apps; August 1 new apps at 2-yr publics</td>
<td>Financial Need</td>
<td>$25,000 cost cap</td>
<td>$4,500 in FY2007</td>
<td>Yes</td>
<td>Centralized</td>
</tr>
<tr>
<td>Virginia</td>
<td>Sector specific programs</td>
<td>As funding permits</td>
<td>Financial Need</td>
<td>Two programs for public institution students, one with a 2.5 gpa requirement; one program for privates, and one for both public and private (LEAP match)</td>
<td>$5,000 in FY2004 in LEAP matching grant program; $2,500 in FY2005 for private school program</td>
<td>---</td>
<td>Decentralized</td>
</tr>
<tr>
<td>Washington</td>
<td>State Need Grant</td>
<td>Based on funding; usually through most of the school year</td>
<td>Ability to Pay (Family Income)</td>
<td>65% of state median income by family size</td>
<td>$5,000 in FY2006</td>
<td>Yes</td>
<td>Formula centralized; application/awards decentralized; funds allocated to campus based on proportion of need</td>
</tr>
</tbody>
</table>

- Effective deadline has been earlier in the past few years due to funding shortfalls.
ABOUT THE STUDY TEAM

Gordon B. Van de Water, Study Director. Dr. Van de Water is President of Van de Water Consulting LLC. He has conducted more than fifty higher education policy studies and research projects over the last three decades. He was a primary developer of New Jersey’s Tuition Aid Grant program, a lead consultant on higher education strategic planning studies in Arizona, Florida, Idaho, Iowa, New Mexico, and South Carolina, a lead evaluator on state agency and institutional evaluations, and a national leader in developing P-16 education initiatives across the country.

Kathleen F. Kelly, Senior Policy and Planning Consultant. Dr. Kelly has 25 years of experience in higher education planning and policy development. Now a consultant for higher education organizations and institutions, she was a member of the staff of the Illinois Board of Higher Education from 1983 to 1999. As Deputy Director for Academic Affairs, she provided leadership for policy studies in undergraduate education, graduate education, affordability, and statewide program priorities, quality and productivity. Dr. Kelly is currently serving as a member of the fiscal analysis project team for a multi-phased two-year project, Recession, Retrenchment, and Recovery: State Higher Education Funding and Student Financial Aid, sponsored by the Lumina Foundation for Education.

Sheila Pruden, Senior Student Financial Aid Consultant. Sheila Pruden has 25 years of experience in student financial aid program administration and policy analysis for the Illinois Student Assistance Commission. Now a student financial aid consultant, she is currently working on financial modeling for reauthorization for the National Council of Higher Education Loan Programs (NCHELP) and serving as a senior research analyst on the Lumina Foundation-funded Recession, Retrenchment, and Recovery project conducted by Illinois State University, SHEEO, and NASSGAP. Project responsibilities include a survey of state SHEEO and NASSGAP agencies regarding the impact of the 2001 recession on policies and priorities as well as a review of student aid policy for each state.

T.J. Bryan, Senior Policy Advisor. Dr. Bryan, Chancellor of Fayetteville State University in North Carolina, is a Maryland native who has served as a faculty member, department chair, and dean at Coppin State College and associate vice chancellor for academic affairs at the University System of Maryland. A graduate of Leadership Maryland, she was the primary author of Miles to Go: Maryland and The Road Taken. An accomplished Eugene O’Neill scholar, Dr. Bryan has also done extensive research and writing on minority achievement and faculty issues.