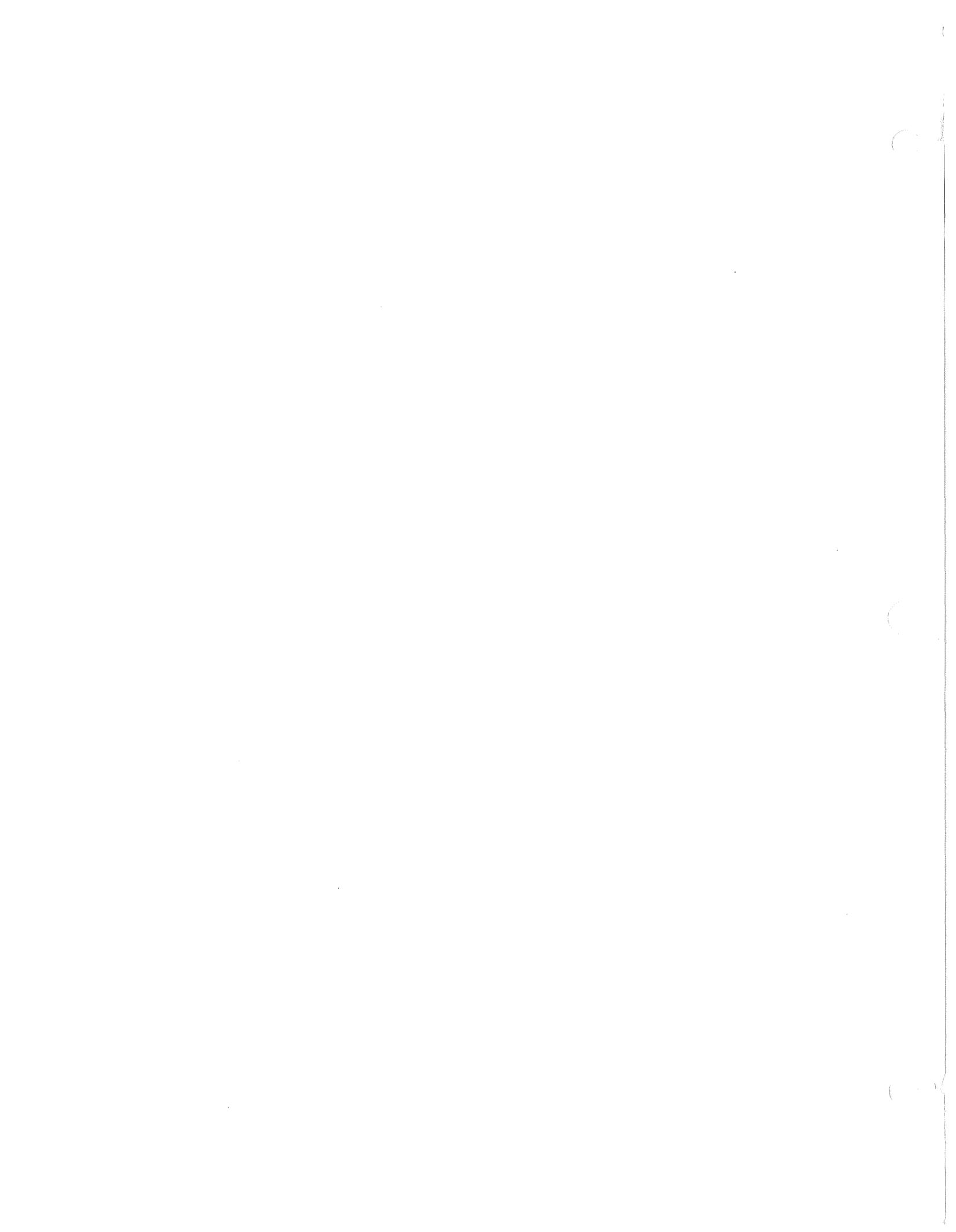


THE FINAL REPORT OF THE
TASK FORCE ON THE
FUTURE FUNDING OF POST-SECONDARY EDUCATION

January 4, 1983

Prepared by the Staff of the
Minnesota Higher Education Coordinating Board
400 Capitol Square Building
550 Cedar Street
St. Paul, Minnesota 55101



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SUMMARY OF TASK FORCE FINDINGS AND RECOMMENDATIONS

FINDINGS

1. Current funding policies will not preserve or enhance the quality of post-secondary education in Minnesota.
2. Current funding policies and governance structures do not encourage collaboration and coordination between institutions, systems, and sectors.
3. The distinction between the governing and management roles of the lay governing boards and the broad funding and policy roles of the legislature has been blurred.
4. The bulge funding policy accomplished its objective of reducing state funding requirements for the collegiate systems in a period of increasing enrollments.
5. Current funding policies do not consistently encourage innovative resource management.
6. Minnesota public post-secondary systems have been treated inequitably because there is no comprehensive funding policy.
7. Current funding policies do not consistently relate funding to levels of enrollment and the costs associated with those levels.
8. Current funding policies do not encourage systems to increase their productivity.
9. The current AVTI program funding policy is not an educationally or fiscally sound policy in a period of constrained resources and declining enrollments.
10. The split budget review and appropriations process for post-secondary education inhibits development of comprehensive policies for the systems of post-secondary education.
11. Tuition is the most powerful finance factor available for changing the state's funding obligation for post-secondary education.

RECOMMENDATIONS

1. A mechanism to reallocate one percent of all expenditures and all savings in order to encourage improvements in the quality and productivity of post-secondary education should be established.
2. Greater collaboration and coordination between institutions, systems, and sectors must be encouraged.
3. The state should honor the commitment of the bulge funding policy as enrollments decline.
4. The state should adopt a comprehensive cost related tuition policy for post-secondary education and adjust funding for need based financial aid to prevent loss of access by low income students.
5. The governing boards of the systems must have the maximum amount of responsibility and discretion with respect to policy and allocation decisions regarding their institutions. Legislative involvement in policy and allocation decisions regarding individual institutions should be discouraged.
6. Post-secondary education appropriations decisions should be unified under one committee in each legislative body.
7. Average cost funding should be the basic funding policy for Minnesota public post-secondary education systems. The policy should:
 - a. buffer funding changes associated with enrollment changes;
 - b. control for differential growth in programs and levels of instruction;
 - c. be applied uniformly to all four public systems and provide no special or separate legislative funding for specific institutions or programs.

EXECUTIVE SUMMARY

Following the annual meeting with governing boards in November 1979, the Minnesota Higher Education Coordinating Board established a task force on funding for post-secondary education to examine the implications of enrollment declines on current funding policies and to explore some alternative policies. The Task Force is comprised of representatives from the education community, government, and the public.

During 1981, the Task Force invited guest speakers from the education community and government to share their experiences and observations regarding funding for post-secondary education. Several speakers addressed the problems confronting state governments in funding post-secondary education. Other guests discussed specific funding approaches and methods. One speaker devoted his remarks to student financial aid.

The Task Force identified several methods currently used in Minnesota for funding public post-secondary education. The legislature has adopted certain funding methods for determining its appropriations to the post-secondary systems. The systems, in turn, have developed methods for allocating funds to individual institutions. Most methods are related to enrollments. Some of these recognize marginal costs, economies of size, and operational cores that assure specified minimum levels of support for institutions with low enrollments. Other methods provide funds for programs with less emphasis on enrollments.

The Task Force identified four alternative funding policies to investigate. They include average cost funding, fixed and variable cost funding, core funding, and program funding. An average cost policy would relate funding directly to enrollments. A fixed and variable cost policy would relate funding for variable expenditures directly to enrollments and provide stable funding for fixed expenditures. A core policy would provide stable funding to small institutions for a minimum program offering regardless of enrollment levels. A program policy would provide stable funding to all institutions on the basis of their program offerings, which would vary only as a result of drastic enrollment changes.

The Task Force reviewed projections of resources for Minnesota's post-secondary institutions derived by applying current and alternative funding policies to projected enrollments. Each alternative funding policy was simulated in conjunction with the current tuition policy and an alternative tuition policy. The current tuition policy held tuition rates at their constant dollar Fiscal Year 1983 level. The alternative tuition policy set tuition revenue equal to 33 percent of operating expenditures for the collegiate systems and 17 percent of operating expenditures for the AVIIs. The projections illustrate the effects of the state's fiscal crisis, reductions in state appropriations, and increases in tuition revenue.

Projections of current funding policies indicate that the overall decline in post-secondary enrollments will result in

declining resources for post-secondary education. Generally, the more responsive funding is to enrollment, the greater would be the reduction in resources. The effects, however, would vary among individual institutions. Small institutions, particularly those with a recognized operating core, would lose fewer resources. As a consequence, small institutions would receive more resources per student than larger institutions.

The average cost funding alternative would cause stable staffing ratios and levels of expenditures per student regardless of enrollment levels. Differences between institutions in expenditures per student and staffing ratios would be those which existed in the base year. For all systems, an average cost funding policy would provide fewer resources than any current funding policies or any other alternative. Consequently, required state appropriations would be lower with average cost funding than with any other funding policy under both the current and alternative tuition policies.

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A fixed and variable cost policy would cause decreases in staffing ratios and increases in expenditures per student in periods of enrollment decline. As enrollments increase, staffing ratios would rise and expenditures per student would decline. Thus, a fixed and variable cost funding policy would increase disparities between small institutions and large institutions. The collegiate systems would receive more resources under fixed and variable cost funding than under current funding policies because of stable funding for fixed costs. The AVIIs would

receive fewer resources under fixed and variable cost funding than under current funding policies because funding for variable costs would decline with enrollments. Consequently, a fixed and variable cost policy combined with the current tuition policy would require higher levels of appropriations for the collegiate systems but lower levels of appropriations for the AVTIs. If fixed and variable funding were combined with alternative higher tuition policy, however, levels of state appropriations would be lower than under current policies for all systems.

Program funding would cause significant decreases in staffing ratios and significant increases in expenditures per student as enrollments decline. Disparities in staffing and funding between large and small institutions would become larger under program funding than under any other funding policy for the collegiate systems. The collegiate systems also would receive more resources under program funding than under any other funding policy. When coupled with the current tuition policy, program funding would require levels of state appropriations which are higher than under any other funding policy. The alternative tuition policy, though, would reduce the required appropriations under program funding to levels below those of current funding policies.

A core funding policy would cause declining staffing ratios and rising expenditures per student in small institutions where it was implemented. Since it provides additional resources to small institutions only, core funding would increase staffing and

funding disparities between small and large institutions. Core funding would provide slightly higher staffing expenditures and appropriation levels than current funding policies for the Community College System. The alternative tuition policy would reduce required appropriations under core funding below levels of current policies.

The Task Force reviewed the Coordinating Board's Goals for Investment of Public Resources in Post-Secondary Education. To guide its evaluation of current and alternative funding policies, the Task Force defined five criteria consistent with those goals. The criteria include:

1. Providing Incentives for Innovative Resources Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.
2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems in an equitable manner.
3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, and program mix and that all costs are variable in the long run, but some costs are fixed in the short run.
4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.
5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

The Task Force evaluated current and alternative funding policies based on the policy's projected resource requirements and the extent to which each policy satisfied the evaluation criteria.

Current funding policies differ in the extent to which they promote innovative resource management. The State Board for Community Colleges has made allocation decisions to support small and high cost institutions out of existing resources. The Board of Regents of the University of Minnesota has developed an extensive internal planning process to guide budgeting and reallocation. On the other hand, the legislature has funded three of the seven state universities in a manner different from the others and, consequently, the State University Board has not had to reallocate funds internally. Program funding for the AVTIs fails to provide incentives for resource management because it is based on prior expenditures. Of the alternative funding policies, average cost funding best satisfies the resource management criteria by directly relating state appropriations to enrollments.

Current funding policies have not always been applied equitably. Core funding has been provided for Southwest State University only, although the University of Minnesota, Morris and several community colleges are confronted with similar enrollment and funding situations. The bulge funding policy, which provided only limited state support for enrollments above a 1977 base level has not been applied to the AVTIs, although they faced a similar enrollment pattern as the collegiate systems. The current tuition policy provides differing subsidies to the four systems. Each alternative to current funding policies could satisfy the equity criterion if there are adjustments for the

inequities in the current bulge policy, tuition policy, and recent funding reductions for post-secondary education.

Current funding policies differ in their recognition of cost patterns. The bulge policy correctly recognized that the marginal costs associated with temporary enrollment growth are less than average costs. Neither the duration of the policy nor the magnitude of the enrollment bulge was specified when the policy was adopted. The enrollment related funding policy in effect, prior to 1977, did not recognize that some expenditures are fixed and do not decline with enrollments. Conversely, the fixed funding for the AVTIs does not recognize that many expenditures are variable and do decline with enrollments. Of the alternatives, two--fixed and variable funding and core program funding--best recognize cost patterns.

None of the existing or alternative funding policies contains explicit incentives for providing high quality services or for increasing productivity. In fact, some disincentives for increased productivity do exist in the AVTI funding policy.

Several major educational policy issues were raised by the Task Force review of funding policies. These issues are size and number of institutions; program effectiveness; ways to increase productivity in instruction and support programs; the role of the private sector; implications of finance policies for student assistance; providing public services on a contractual basis; the appropriate role for legislators, the governor, and governing boards; and state responses to declining enrollments in

elementary and secondary education. Funding policies and decisions can have an impact, sometimes indirect, on these important educational issues. Decisions regarding funding policies must address these educational issues whenever possible.

None of the current funding policies reviewed directly addresses the issue of the size and number of Minnesota's public post-secondary institutions. The size and number of public institutions, however, could adversely affect the quality and vitality of public post-secondary education. Alternatively, the consolidation of some institutions might allow Minnesota to protect or even enhance the quality and vitality of public post-secondary education. Funding policies can be implemented which would provide an incentive to governing boards to consider alternative ways to organize institutions and programs.

None of the current or alternative funding policies reviewed would provide direct incentives to improve the effectiveness of public post-secondary institutions in Minnesota. Three of the alternative funding policies--fixed and variable cost funding, program funding, and core funding--would withdraw resources at a slower rate than enrollment declines and, consequently, would not necessarily hinder effectiveness. State decisionmakers should consider ways of providing funds which would directly encourage greater effectiveness.

The evaluation of current funding policies concluded that they contain no explicit incentives for increasing productivity. Increased productivity, however, would seem to be one way for

post-secondary institutions to respond to the challenge of declining enrollments and resources. It may be necessary to establish a policy separate from the primary funding policy to encourage increased productivity.

State funding and tuition policies for public post-secondary education also affect the private sector of post-secondary education. The private sector is an important part of post-secondary education in Minnesota. Private institutions face the same prospects of declining enrollments and resources as the public institutions. The impact of state funding and tuition policies on the private sector must be considered.

Coordination of post-secondary education in Minnesota is neither encouraged nor discouraged by the current or alternative funding policies reviewed. Coordination is desirable since it could expand educational opportunities and make more effective use of existing programs and facilities. Since neither the current nor the alternative funding policies would provide direct incentives for coordination, a policy separate from the primary funding policy might address this issue best.

For many students, tuition represents a major component of educational costs. Whether tuition is raised on an ad hoc basis in response to state shortfalls, or in response to explicit policy considerations, additional funds should be invested in financial aid to maintain the commitment to assist economically disadvantaged students.

There is growing pressure to reduce public expenditures and improve the effectiveness of public programs. Contracting has been suggested as one way to improve effectiveness and reduce the cost of public services. Decisionmakers might consider contracting as part of a new funding policy.

The review of the appropriations process in Minnesota post-secondary education has revealed wide variation in roles between the legislature and governing boards in the appropriations process. In view of very serious funding and educational choices in the next decade, clarification of the roles to be played by the three would contribute to more effective policy making and governance.

The manner in which the state of Minnesota has responded to enrollment declines in public elementary and secondary education may provide insight which would be useful in formulating policies for post-secondary education. The state has responded to declining enrollments in public elementary and secondary education in three basic ways. First, the manner in which levels of state aid were determined was modified. Second, school districts were required to do long-range program and fiscal planning. Finally, state statutes and regulations were modified to simplify the procedure for consolidation of school districts.

PART I: FORMATION AND PROCEEDINGS OF THE
TASK FORCE ON FUTURE FUNDING

INTRODUCTION AND BACKGROUND

Minnesota has a vital interest in how state funding policies and procedures affect the quality and variety of post-secondary education in the 1980s and beyond. Minnesota's current funding policies and procedures were developed in a time of enrollment growth and fiscal prosperity. The issue posed by declining enrollments and fiscal constraint in the 1980s and 1990s is whether the maintenance of current policies or the development of alternatives will best serve the public interest.

The annual meeting of governing boards, sponsored by the Coordinating Board in November 1979, examined the implications of enrollment declines on current funding policies and explored some alternative policies.¹ Based on the governing boards' meeting and the priority attached to the issue by the governor, the Coordinating Board invited leading figures involved in the funding of post-secondary education to serve on a task force. Because of the serious financial implications for all systems and sectors of post-secondary education, the Board felt that participation by these persons in policy formulation would be desirable. Accordingly, in January 1980, the Coordinating Board established the Task Force.

¹ Minnesota Higher Education Coordinating Board, State Funding of Post-Secondary Education in the 1980s and Beyond: Working Paper and Proceedings, Annual Meeting with Governing Boards (November 29, 1979).

CHARGE TO THE TASK FORCE

In May 1980, the Coordinating Board gave the Task Force its charge for the study of funding.

The Task Force shall:

- A. Be convened and staffed by the Coordinating Board and chaired by the executive director of the Board or his designee.
- B. Assess the implications of continuing existing funding policies and implications of alternative funding policies, including those alternatives which recognize fixed and variable cost behavior.
- C. For purposes of evaluation, precisely define the funding policies to be considered, including a description of how each policy should be implemented.
- D. Define criteria, consistent with the state's goals for post-secondary education, for evaluating the advantages and disadvantages and costs of funding policies.
- E. Recommend feasible alternative funding policies for post-secondary education in a period of declining enrollments and constrained resources. The recommended policies should recognize and enhance the mission of the systems of post-secondary education in order to provide the highest quality of opportunities to Minnesota citizens.
- F. Make an interim report on its progress and findings to the Coordinating Board and respective governing boards.
- G. Make a final report on feasible policy alternatives to the Coordinating Board.

MEMBERSHIP

The Task Force on Future Funding of Post-Secondary Education has 16 members representing the education community, government, and the public.

Education and Government

- o Dr. John Feda, Commissioner of Education;
- o Dr. Garry Hays/Dr. Jon Wefald, Chancellor of the State University System;
- o Dr. Philip C. Helland, Chancellor of the Community College System;
- o Mr. James Krause, Member of the Higher Education Coordinating Board;
- o Dr. C. Peter Magrath, President of the University of Minnesota;
- o Mr. Wilbur Nemitz, Representative of the Minnesota Association of Private Post-Secondary Schools on the Higher Education Advisory Council;
- o Dr. Marion Shane, Executive Director of the Private College Council.
- o Mr. Allen L. Rudell, Commissioner of Finance

Legislature

- o Representative Lyndon R. Carlson, Chairman of the Education Division, House Appropriations Committee;
- o Senator Jerome M. Hughes, Chairman of the Senate Education Committee;
- o Representative Carl M. Johnson, Chairman of the House Education Committee;
- o Senator Tom A. Nelson, Chairman of the Education Subcommittee, Senate Finance Committee;

Lay Members

- o Mr. James Hetland, Vice President, First Bank Minneapolis;
- o Mr. Norman Indall, Winona, former mayor of Winona and head of Social Science Department, Winona public schools;

- o Mr. Verne Johnson, Vice President for Strategic Planning, General Mills Corporation, Governor's Representative;
- o Dr. Hazel Reinhardt, Director of Research, Minneapolis Star and Tribune.

PROCEEDINGS

Following the first Task Force meeting in October 1980, a workshop was conducted in December for Task Force members, post-secondary governing board members, and other interested parties. A representative of each post-secondary system discussed the system's funding method and practices, its current level of funding, and the factors other than enrollment used for determining state support for the system and member institutions. Governor Quie addressed workshop participants.

During 1981 the Task Force on Future Funding of Post-Secondary Education invited guest speakers from the education community and government to share their experiences and observations. Summaries of their remarks appear in the Interim Report of the Task Force on Future Funding². The full texts of their remarks are contained in Appendix C of this document, which is available under separate cover.

² Minnesota Higher Education Coordinating Board, Interim Report of the Task Force on Future Funding (April 1982).

PART II: SUMMARY OF CURRENT FUNDING POLICIES
AND PROJECTED EFFECTS

REVIEW OF CURRENT FUNDING POLICIES

The legislature has adopted several policies for providing funds to the post-secondary systems. Each system, in turn, has internal policies for allocating state funds to individual institutions. This chapter contains a discussion of several financial policy issues followed by a description of current funding policies. The chapter concludes with summaries of the projected resource requirements of current policies.

GENERAL QUESTIONS OF FINANCE

Public post-secondary education receives revenue from four major sources--tuition, direct state appropriations, federal funds, and private gifts. The importance of each source varies by system. Tuition as a portion of costs associated with instruction amounts to about 17.0 percent at AVTIs, 30.4 percent at community colleges, 25.8 percent at the state universities, and 30.4 percent at the University of Minnesota in F.Y. 1983. State appropriations have covered most of the remaining costs. Federal funds and private gifts constitute major sources of revenue at the University of Minnesota. Although much of the federal effort has supported research and other non-instructional activities, the federal government has provided direct support to the University for instruction in expensive health science programs. The federal government also has provided resources to

AVTIs for special services such as counseling and guidance for handicapped students. In the community colleges and state universities, federal funds mostly have been available for student aid rather than institutional operations and educational activity.

Reductions in government support will have severe consequences for the financing of post-secondary education. Decreases in federal funds will force the state either to assume financial responsibility for certain programs or to reduce or terminate them. Decreases in state resources could either shift the burden of supporting educational services to students through higher tuition or erode the quality of educational services. Declining enrollments will exacerbate matters as fewer students will generate less tuition revenue if tuition rates remain stable. In response, the state once again would have to determine whether to reduce services, increase appropriations, or raise tuition rates.

Decisionmakers must also bear in mind that changes in tuition policy would have an impact on the funding required for financial aid. The state provides a significant appropriation, \$36 million in 1982, for financial aid. A tuition policy which resulted in substantial increases in tuition rates could necessitate increased levels of state funding for financial aid.

Consideration of funding methods should take into account the impact on finance, particularly on tuition. As enrollments decline, different combinations of funding methods and tuition policies will affect the proportions of educational costs borne respectively by the state and by the students. For example, if

total resources are allowed to decline in direct relationship to enrollment, costs per student will remain relatively constant. Because cost per student would be constant, both tuition rates paid by the student and tuition as a percent of educational costs would remain constant. If, on the other hand, total resources are maintained at a stable level as enrollments decline, costs per student will increase. This would present a choice. Tuition rates could remain stable, thereby decreasing the portion of educational costs paid directly by students. This, in turn, would require increased state appropriations to make up the growing difference between cost per student and tuition per student. In contrast, tuition as a percentage of costs could be fixed, thereby maintaining the portion of educational costs paid directly by students. As costs per student grow, tuition rates paid by students would grow proportionately. State appropriations per student, thus, would not have to increase as much to meet increasing costs.

Determining the total amount of state appropriations for post-secondary education and the distribution of those funds is a critical policy issue facing state decisionmakers. In recent years, state funding for post-secondary education has constituted between 11 and 12 percent of the total state budget. In a period of prosperity, the state was able to provide steadily increasing levels of appropriations to post-secondary education. However, the current fiscal environment, combined with projected enrollment declines, may make it difficult for post-secondary education to maintain its current percentage of the state budget.

Alternatively, post-secondary education may maintain its current percentage of a shrinking state budget. The state's investment in post-secondary education must also be allocated between funds provided to institutions and funds to students. In 1982, funds provided for institutional operation constituted 92.42 percent of the state's investment. Funds provided to students for financial aid constituted 5.82 percent of the state's investment. Changes in the distribution of funds between institutional support and financial aid could affect access to post-secondary education and the distribution of enrollments between systems. Consequently, the nature of this relationship should be carefully considered and modified only on the basis of policy objectives rather than in an ad hoc manner.

Legislative Funding Policies

Legislative Appropriations Process

Before reviewing legislative funding policies, a brief description of appropriations process may be helpful. Appropriations for collegiate systems and for AVTIs undergo different processes. Within the legislature, responsibility for recommending collegiate appropriations rests solely with the House Appropriations Committee and the Senate Finance Committee. Each committee reviews proposed systemwide budgets and considers requests for changes in funding levels. Although the committees seldom challenge existing activities and funding levels (the budget base), they scrutinize requests to expand or establish programs and activities. For example, the legislature may have

to approve additional faculty positions and appropriate money for salaries in order to start or expand an instructional program. The legislature, thus, retains some direct control over the level of services offered by the collegiate systems.

Responsibility for recommending AVTI appropriations rests primarily with the education committees of the House of Representatives and the Senate. Because local school boards operate AVTIs, the education committees determine funding for AVTIs with financial aids to local school districts. In theory, the aids are entitlements to school districts to cover the operating costs of AVTIs. In reality, the State Department of Education apportions AVTI aids according to a process which the legislature has authorized the department to establish. The education committees of the legislature, however, do not review operating budgets, nor do they authorize changes in funding for specific activities. After each education committee has drafted its aids bill, it sends the bill to the respective appropriations committee in each house for the actual appropriation of funds. Neither the House Appropriations Committee nor the Senate Finance Committee reviews AVTI aids extensively. As a consequence, there is little coordination in funding of collegiate and vocational education and dramatically different policies result.

Enrollment Bulge Funding

In 1977, the legislature adopted the enrollment bulge policy for the collegiate systems. Anticipating that enrollments would decline after the early 1980s, the legislature decided

essentially to freeze basic appropriations at 1977 levels. Except for inflationary increases and specially approved new items, there were to be no additional state funds for the systems.¹ The additional tuition revenue was deemed sufficient to meet the extra costs of the short-term increases in enrollments. Neither the length nor the size of the enrollment bulge to be funded in this manner was determined. The policy was not applied to area vocational-technical institutes.

Core Funding

For several biennia, the legislature has provided funding for Southwest State University and Metropolitan State University on a separate basis from the other campuses in the State University System. In the case of Southwest, the purpose of this special treatment has been to provide a level of support staff that is greater than its enrollment would otherwise justify. This minimal level, or core, is designed to accommodate about 2,000 full-time equivalent students as compared to recent enrollments of 1,500-1,800. No change in funding for support services will result from increases or decreases in enrollment when enrollment is below 2,000. Should enrollment ever rise above 2,000, Southwest would be treated in the same manner as other state university campuses. Metropolitan is a non-traditional, upper division institution. The legislature

¹ The 1981 Legislature modified the bulge policy by appropriating funds to the State University System and the Community College System for enrollments exceeding certain levels. Further details about this change can be found in the Appendix A.

provides fixed funding for a range of enrollments. The legislature, however, has not provided core funding for the University of Minnesota or small community colleges. The University of Minnesota-Morris has enrollment levels below those of Southwest State University. Several small community colleges have enrollments below the level which would justify their staffing complements based on system staffing ratios.

Program Funding

In 1979, the legislature approved a new funding policy for the area vocational-technical institutes. The legislature substituted program-based funding for the previous enrollment-based funding. Starting in Fiscal Year 1981, AVTIs have received funds for instructional programs based on the cost of the programs. The purpose of this approach is to provide stable funding for vocational education. Changes in institutions' enrollments are considered, but they constitute a minor factor in the calculation of funding levels.² Appropriations for support services and other expenditures are determined independently of instructional costs based on historic expenditure patterns and institutional circumstances.

² Funding levels are only affected by enrollment changes of more than 5 percent over two years. If the percent change in enrollments is more than 5 percent, funding is changed by that percent minus 5 percent. For example, if enrollments decline by 7 percent, funding is reduced by 2 percent.

Special Appropriations

The legislature has been making special appropriations to the University of Minnesota and, to a much lesser degree, to the other public systems. These state specials are separate from regular operating budgets. They cover items which the legislature considers to be of short duration or high priority such as medical and agricultural research or women's intercollegiate athletics.

System Allocation Policies

The governing boards of the various post-secondary systems have the responsibility for allocating funds to individual campuses. The legislature makes most appropriations on a system-wide basis for governing boards to distribute at their discretion. Levels of discretion vary and each governing board has its policies for allocating resources.

Community Colleges

The Community College System allocation policy consists of a series of complex formulae for allocating resources among its campuses. The State Board for Community Colleges has wide discretion in the allocation of its Maintenance and Equipment state appropriations. Many of the formulae are enrollment-based, while others are based on historical experiences. Some formulae also recognize economies of size by allocating fewer instructional resources per student over certain enrollment thresholds. A large institution would enroll more students than would a small

institution in order to be allocated another faculty position. The State Board for Community Colleges recognizes an instructional and support core in its allocation methods to assure small campuses a minimum level of resources. Funding for the core has come at the expense of larger community colleges. In this manner, the Community College System internally maintains core funding for small institutions.

State Universities

Southwest State University and Metropolitan State University receive core funding as a result of legislative action. The State University Board has wide discretion in the allocation of its Maintenance and Equipment state appropriations. The remaining traditional campuses receive allocations of resources, except for physical plant, primarily in proportion to enrollments. Bemidji State University has received funding in addition to its allocation in order to avoid faculty layoffs. The State University Board recognizes the notion of core funding and staffing to a limited extent in support programs. It does not, however, have to fund the core through reallocation. After allocating a core of administrative positions to each institution, the system allocates additional administrative positions according to the proportion of systemwide enrollment at each traditional campus. Allocation of instructional positions to each campus, except Southwest State and Metropolitan State, reflects a fixed ratio of students to staff. Small campuses

receive resources at the same rate as large ones. This allocation policy recognizes virtually no economies of scale, as large and small campuses experience the same treatment.

University of Minnesota

The University of Minnesota does not allocate resources to its various campuses and units on the basis of a formula. The Board of Regents has wide discretion in the allocation of its Operations and Maintenance state appropriations. Traditionally, the University appears to have made allocations by adjusting resources for instructional units in proportion to changes in enrollments and changes in amounts of available funding levels. Within the past two years, the University has attempted to reallocate resources internally to reflect changing priorities. The University of Minnesota Board of Regents does not explicitly maintain core funding internally, but a core program has been defined by the Morris campus.

Area Vocational-Technical Institutes

Area vocational-technical institutes receive state funds in the manner prescribed in statute. The State Board for Vocational Education has limited discretion in apportioning instructional aids to AVTIs because distribution of those aids, by statute, must be related to previous instructional activity at each institution. The State Board can exercise more discretion in non-instructional aids. Allocation of instructional aids follows school district salary patterns for programs which have been

offered previously. Allocation of other aids (support, supplies, heavy equipment) follows historic patterns of need plus special needs as they arise at individual institutions.

The Effects of the Bulge Policy and Appropriations Reductions

The bulge funding policy and reductions in state appropriations have had significant impacts on levels of instructional expenditures, state appropriations, and tuition revenue between Fiscal Years 1977 and 1983. Enrollment growth since 1977 has been significant, and it has not been uniform. The bulge policy was not applied to the AVTIs. The AVTI program funding policy, however, has limited growth in funding for instructional faculty since 1981. The effects of differing enrollment growth have been compounded by reductions in state appropriations. All four public systems have been subject to significant reductions in state appropriations as a result of Minnesota's fiscal crisis.

Enrollment growth since 1977 has not been uniform across the four public systems. Enrollments at the University of Minnesota have increased since 1977 from 48,570 full-time equivalents to 49,808 in 1983, or 2.5 percent. By comparison, regular enrollments in the community colleges have increased from 19,403 full-time equivalents to 23,679, or 22 percent. Enrollments in the state universities have increased from 33,625 full-time equivalents to 37,660 in 1983, or 12 percent. Enrollments in the AVTIs have increased from 30,534 average daily membership to 35,650 in 1983, or 17 percent.

In order to soften the fiscal effects of the bulge policy, the 1981 Legislature modified the bulge funding policy for the community colleges and state universities. The State University System received \$1.5 million in F.Y. 1982 and \$1.8 million in F.Y. 1983 for support of 2,270 FTE students in the first year of the biennium and 2,711 students in the second year. The Community College System received \$861,900 in each year of the biennium to cover 1,617 FTE students. No supplementary funds were appropriated for the University of Minnesota.

During the last two years, there have been several reductions in state support for post-secondary education. These reductions have been offset, in part, by tuition increases. Thus, the 1977 budget base has been modified by two developments--the bulge funding policy and reductions in state appropriations. The data below present the compound effects of these two factors on the 1977 budget base for each system in current and constant dollars.

The data in the tables reveal that the public post-secondary systems have been affected in very different ways by state funding policies and enrollment trends since 1977. The major findings are:

1. Tuition revenue as a percentage of instructional expenditures has increased in all public systems. However, the proportion of instructional costs paid for by tuition varies. Among the collegiate systems, tuition as a percentage of instructional expenditures is lower in the State University System than in the community colleges and University of Minnesota. Tuition revenue constitutes a significantly lower percentage in the AVTIs. This is largely due to the fact that tuition charges for all students were not implemented in the AVTIs until 1979.

TUITION AS A PERCENT
OF INSTRUCTIONAL EXPENDITURES

<u>Year</u>	<u>Community Colleges</u>	<u>State Universities</u>	<u>University of Minnesota</u>	<u>AVTIs</u>
1977	25.7%	21.0%	24.2%	2.9%
1978	24.8	21.4	25.8	3.5
1979	24.1	20.2	25.7	12.6
1980	25.0	20.8	27.4	11.8
1981	29.2	23.5	27.4	11.9
1982	28.4	22.4	29.9	13.6
1983 ^e	30.6	25.9	32.0	17.0

e = estimated.

- In constant dollars, the total instructional budget in the state universities and community colleges has increased between 1977 and 1983 and decreased for the University of Minnesota and the AVTIs.

TOTAL INSTRUCTIONAL EXPENDITURES IN CONSTANT DOLLARS
(MILLIONS)

<u>Year</u>	<u>Community Colleges</u>	<u>State Universities</u>	<u>University of Minnesota</u>	<u>AVTIs</u>
1977	\$33.8	\$70.6	\$150.0	\$78.0
1978	34.8	73.4	147.5	76.0
1979	34.6	74.9	146.9	78.2
1980	35.6	73.5	145.9	78.6
1981	34.3	70.3	142.8	76.7
1982	37.0	73.4	136.0	73.0
1983 ^e	37.6	75.2	136.0	68.6

e = estimated.

- State appropriations for instruction have increased slightly in the community colleges, remained stable in the state universities, and declined significantly in the University of Minnesota and AVTIs.

STATE APPROPRIATIONS FOR INSTRUCTION
IN CONSTANT DOLLARS
(MILLIONS)

<u>Year</u>	<u>Community Colleges</u>	<u>State Universities</u>	<u>University of Minnesota</u>	<u>AVTIs</u>
1977	\$25.1	\$55.8	\$113.7	\$70.1
1978	26.2	57.7	109.5	67.4
1979	26.3	59.8	109.1	57.6
1980	26.6	58.2	108.9	56.1
1981	24.3	53.8	103.0	62.9
1982	26.5	56.2	95.4	63.1
1983e	26.1	55.7	92.5	56.8

e = estimated.

- Expenditures per student in constant dollars have declined in all four post-secondary systems between 1977 and 1983. However, the percentage decrease has varied considerably.

INSTRUCTIONAL EXPENDITURES PER STUDENT
IN CONSTANT DOLLARS

<u>Year</u>	<u>Community Colleges</u>	<u>State Universities</u>	<u>University of Minnesota</u>	<u>AVTIs</u>
1977	\$1,742	\$2,100	\$3,088	\$2,554
1978	1,791	2,197	3,125	2,420
1979	1,846	2,225	3,131	2,522
1980	1,729	2,115	3,043	2,478
1981	1,549	1,893	2,881	2,232
1982	1,569	1,921	2,738	2,087
1983e	1,588	1,997	2,730	1,924

e = estimated.

In summary, the effects of the bulge policy and the appropriation reductions since 1977 are:

- Tuition revenue has accounted for an increasing share of the cost of instruction.
- The state share of expenditures for instructional services has declined in all systems, but has declined unevenly.
- Instructional expenditures per student have declined in constant dollars in all systems, but unevenly.

The bulge funding policy by itself would have affected expenditures and revenues in a similar, but less pronounced, manner in the collegiate systems. The program funding policy combined with significant enrollment growth in the AVTIs has had a similar effect on that system. The reductions in state appropriations have significantly exacerbated the trends.

PROJECTED RESOURCE REQUIREMENTS
OF CURRENT FUNDING POLICIES

The Task Force has reviewed resource projections for 1982 through 2001 based on current funding policies. The projections show staffing, expenditures, and revenue for each public post-secondary system and institution. The methodologies and assumptions incorporated in the projections, summary tables, and a description of the results appear in Appendix A. A summary of the results is presented here.

Assessing the long-range consequences of maintaining current funding policies has been the object of these projections. The projections reveal several patterns. First, the funding reductions and tuition rate increases of the 1981-83 biennium have significantly altered the pattern of funding post-secondary education during the projection period. Operating expenditures and state appropriations per student would decline substantially in all systems. Tuition rate increases would result in significant increases in the percentage of operating expenditures

which tuition revenue constitutes. And state appropriations per student for the University of Minnesota and the Community College System would not exceed 1980 levels during the projection period.

Second, in the collegiate systems which have enrollment-related funding, the decline in resources would be of less magnitude than anticipated declines in enrollment. One reason for this is that many expenditures are not related to enrollments and would, therefore, remain stable. Another reason is that when enrollments begin to decline, the systems will lose only tuition revenue and supplemental appropriations. The bulge policy would hold state appropriations stable until enrollments slip below 1977 levels. The result would be increasing expenditures per student in each collegiate system until enrollments slip below 1977 levels. For individual institutions, however, the situation likely would vary. Large community colleges would have their resources withdrawn in proportion with enrollments. Small community colleges would not have resources withdrawn in proportion with enrollments because of minimum allocations in the system allocation policies. The result would be greater expenditures per student at small community colleges than at larger ones. Another aspect of this would be richer staff to student ratios at smaller community colleges. Larger community colleges, thus, would bear most of the burden, in effect giving up resources to maintain smaller institutions.

Finally, the situation for the area vocational-technical institutes would be somewhat different from the collegiate systems. The current policy of program-based funding would

provide relatively stable levels of resources to the AVTIs despite declining enrollments. In fact, lower tuition revenue resulting from declining enrollments would require additional state resources to maintain stable funding levels. Some AVTIs are projected to experience rising enrollments. Because of stable funding, however, these AVTIs would not experience matching increases in resources. As a result, expenditures per student at growing AVTIs would decline while expenditures per student would increase at AVTIs with falling enrollments.

PART III. ALTERNATIVE FUNDING POLICIES AND PROJECTED EFFECTS

The Task Force has examined alternative funding policies. These include policies not now used in Minnesota as well as the extension to other systems of policies which are used in one or more of the state's post-secondary systems. This chapter contains a discussion of the environment that will affect funding for post-secondary education in the future. Next, there is a description of the four alternative funding policies which the Task Force examined in detail--average cost funding, fixed and variable cost funding, core funding, and program funding. The chapter concludes with summaries of the projected resource requirements of the alternative funding policies.

THE ENVIRONMENT: PROSPECTS FOR POST-SECONDARY EDUCATION

Over the next 15 years post-secondary education in Minnesota faces the prospect of declining enrollments and resources. The two are inextricably related. Enrollments are projected to decline because there will be fewer 18-22 year olds, the traditional pool of post-secondary students. At the very least, fewer students will mean less tuition revenue. Beyond that, lower enrollments will weaken post-secondary education's claim to public resources. Government funds already have become scarcer due to economic conditions, federal policies and public sentiment, and there is little evidence of a major turnabout to

restore previous levels of government activity. In the coming years, special programs, transportation, and environmental activities will compete with education for state funds.

The situation facing post-secondary education calls for an assessment of funding methods. If the state relies too greatly on enrollment-related funding while attempting to maintain existing services, it risks providing insufficient support to institutions with low enrollments. The primary virtue of any funding method should be its suitability for estimating resource requirements and then distributing actual resources. To a considerable degree, circumstances such as enrollment trends, may determine what is suitable. A method that operates well during an era of expansion may function poorly during an era of contraction. During periods of growth and prosperity, issues such as institutional size, mission, performance and operating efficiency may seem unimportant in the race to meet burgeoning demands for education. When fiscal resources and demand dwindle, however, such matters may become very important in determining levels of support for post-secondary education.

REVIEW OF ALTERNATIVE POLICIES

Funding policies for post-secondary education essentially are rules by which resources are made available for the delivery of educational services. These rules may apply to any or all of the three major phases of the funding process. The first phase is the formulation of a request for resources by the post-secondary institutions and systems. The second phase is the

determination of actual funding levels by the legislative and executive branches of state government. The third phase is the allocation of appropriated resources to the institutions providing educational services.

Since the 1950s, funding for post-secondary education increasingly has been related to measurable levels of educational activity or performance. Measures of activity may include enrollment, number of programs, and identifiable improvements in educational effectiveness or operational efficiency. Three categories of funding policies are the subject of the following discussion. Two of the categories, average cost funding and marginal cost, are related directly to enrollments. There are variations of each policy. The other category is program funding. Some of the policies are or were in use in Minnesota. Others are in use elsewhere. The choice regarding funding policies, thus, may include the extension of existing policies to all systems as well as the adoption of new policies.

Average Cost

Funding on the basis of average costs provides a specified amount of money for each enrolled student or full-time equivalent student. This approach rests on three assumptions. First, the cost per student for providing educational services may be derived or estimated prior to the calculation of aggregate costs. Costs and resource requirements are supposed to be built upon the basis of actual or anticipated enrollments. Second, the cost of services may be allocated equally to every student. Each

student, regardless of academic program or individual need, is supposedly provided with the same amount of resources by the state. Third, the cost per student is constant regardless of institutional size. Within the same system, for example, the cost per student at an institution with an enrollment of 10,000 would be the same as the cost per student at an institution with an enrollment of 1,000. Average cost funding does not recognize economies of size, minimum levels of support for small institutions, or fixed costs.

Funding may incorporate recognized differences among post-secondary systems on the basis of mission or other characteristics. Thus, research universities, offering programs from lower division instruction to professional training and advanced research, would incur high average total costs in comparison to community colleges which essentially are limited to lower division instruction. Variations in funding levels per student for these different institutions may reflect functions and costs as well. Two variations of average cost funding are described below.

Average Total Cost

Funding on the basis of average total cost provides resources for every student based on the costs of all services and activities occurring at educational institutions. These services and activities may include instruction, research, academic support services (e.g., libraries), student support services (e.g., counseling), public service, institutional

support (e.g., president's office), and physical plant operations. The calculation of resources to be provided to post-secondary systems or institutions involves multiplying the average cost per student by the number of students.

Differential Average Costs

Funding on the basis of differential average costs provides resources for every student based on the separate cost of each program, service, and activity occurring at educational institutions. Separate cost figures may be derived for instruction, research, academic support services, student support services, public service, institutional support, and physical plant. With these broad areas, costs may be calculated for each program or function. There could be separate costs designated for lower division, upper division, and graduate instruction; for business, liberal arts, and nursing programs; for admissions and records, student counseling and foreign student services.

This policy, in effect, combines program-based and average cost approaches to funding. The calculation of resources to be provided to post-secondary systems or institutions occurs in three phases. First, the cost per student for each program and function is determined. The greater the number of separately funded programs and functions, the greater will be the number of distinct costs which must be computed. Second, the cost per student for each program or function is multiplied by the number of students in the particular program or function. This yields a total cost for each activity. Third, the total costs for each

program and function are added together. The result is estimated total operating costs which becomes the basis for a funding request.

Marginal Costs

Funding on the basis of marginal costs rather than average costs usually results in the appropriation of less money per student as enrollments increase and more money per student as enrollments decrease. With a marginal approach, resources increase or decrease only to the extent that total cost would change as a result of having to educate more or fewer students. For example, an institution with 1,000 students might require \$1,000,000 to operate. The addition or subtraction of one student might only require a change in expenditures for supplies amounting to \$100. This marginal cost of \$100 would be the amount provided to or withdrawn from the institution using marginal funding. Funding by average total cost, in contrast, would result in a change of \$1,000 for each student (\$1,000,000 divided by 1,000 students).

Marginal funding implicitly assumes the existence of fixed and variable costs. Marginal funding essentially applies only to variable costs. Fixed costs are the start-up and on-going costs that must be incurred regardless of enrollments. Basic administrative functions and physical plant operations must be in place whether an institution has 1,000 or 10,000 students. Variable costs are the costs that change at the same rate or by the same amount for each student.

Fixed and Variable Costs

Funding on the basis of fixed and variable costs involves separate support for each type of cost described above. Offering any educational service at all would require full funding of those costs defined as fixed. Provision of other resources would depend on costs generated by enrollments.

The variable portion would, in reality, reflect average variable costs. It would resemble average total costs in that a specified amount of resources would be provided for each student. Average variable costs, however, would be less than average total costs because the fixed items already would have been covered.

Core Costs

Core funding requires that small institutions must be sustained with a prescribed minimum level of resources. This level of support is based on a minimum breadth of instructional and support activities deemed necessary for fulfilling an institution's mission. The instructional and support core, in effect, may be the fixed cost of an institution capable of servicing a specified number of students. At or below this enrollment, the institution would be assured of the prescribed amount of resources. Enrollments above that level would generate additional resources based on the funding policy in existence for other institutions.

The Coordinating Board retained a consultant to develop a working definition of a core staffing level for a small baccalaureate college. As part of an earlier study, a similar

report was prepared for two-year transfer program colleges. These reports are contained in Appendix D of this document, which is available under separate cover.

Program Funding

Program funding provides resources based on the cost of individual instructional programs and, perhaps, support activities. All costs covered by this funding policy may be viewed, in effect, as fixed. There is no recognized variation in cost based on enrollment. Another way to view it is a core funding procedure for every program. Each program is a self-contained unit to receive either full funding or no funding at all. Partial support would be considered inadequate. Changes in enrollment may be accommodated by altering the number of fully funded programs. Area vocational-technical institutes are operating under program funding for instruction.

PROJECTED RESOURCE REQUIREMENTS OF ALTERNATIVE FUNDING POLICIES

Projections of resource requirements under four alternative funding policies were reviewed by the Task Force.¹ The projections estimated staffing, expenditure, and revenue based on the alternative policies for applicable systems and institutions. The methodologies and assumptions incorporated in the projections, summary tables, and a description of the results appear in Appendix A. A summary of the results is presented here.

¹ A description of the methodologies and assumptions incorporated in the projections appears in Appendix A.

The collegiate systems do not receive full state support for enrollments above the 1977 base. Consequently, current funding policies were simulated until system enrollments declined below the base. The first year that system enrollments declined below 1977 levels became the base year for the alternative funding policy. Since the AVTIs were not subject to the bulge policy, alternative funding policies were implemented in this system in the year after peak projected enrollment levels.

The alternative funding policies were simulated under each of two tuition policies. Current tuition policy retains tuition rates at their constant dollar 1983 levels. The alternative simulates the Coordinating Board's recommended tuition policy, but sets tuition revenue equal to 33.33 percent of operating expenditures in the collegiate systems and 16.67 percent of operating expenditures for the AVTIs.

Consequences of Alternative Funding Policies

Projections of resource requirements for alternative funding policies have been prepared to allow the Task Force to compare the effects of alternative funding policies with those of current funding policies.

Average Cost Funding

Average cost funding would vary all staffing and expenditures proportionately with enrollments. Staffing ratios and levels of expenditures per student would remain stable regardless of enrollment levels under average cost funding. If the policy

is implemented at the institution level, it would vary resources with enrollments for all institutions in a similar manner. Differences between institutions in expenditures per student and staffing ratios would be those which existed in the base year. For all systems, an average cost funding policy would provide fewer total resources than any alternative or current funding policies.

When compared to current funding policies for the AVTIs, average cost funding would provide the most dramatic contrast in resource requirements. Current policies for the AVTIs provide stable staffing and funding. Required state appropriations are lower with average cost funding than with any other funding policy.

Fixed and Variable Cost Funding

A fixed and variable cost policy would provide stable staffing and funding for fixed activities but change staffing and funding for remaining activities proportionately with enrollments. In periods of enrollment decline, such a policy would cause increases in expenditures per student as a result of the stable funding for fixed activities. In periods of enrollment increases, expenditures per student would decline. Thus, a fixed and variable cost funding policy would increase disparities between small institutions and large institutions. The collegiate systems would receive more resources under fixed and variable cost funding than under current funding policies. After enrollments decline below 1977 levels, current policies would

withdraw resources from the collegiate systems more directly in proportion with enrollments than would fixed and variable cost funding. The AVTIs would receive fewer resources under a fixed and variable cost funding policy. The current AVTI funding policy would provide stable funding while a fixed and variable policy would withdraw variable resources as enrollments decline. Consequently, a fixed and variable cost policy would require higher levels of appropriations for the collegiate systems but lower levels of appropriations for the AVTIs.

Program Funding

Program funding would provide collegiate systems the stable staffing and funding levels of the current funding policy for the AVTIs. The result would be significant decreases in staffing ratios and significant increases in expenditures per student as enrollments decline. Disparities in staffing and funding between large and small institutions would become larger under program funding than under any other funding policy for the collegiate systems. The collegiate systems would receive more resources under program funding than under any other funding policy. Program funding would require higher levels of state appropriations than any other funding policy.

Core Funding

Core funding would provide small institutions with a fixed level of resources regardless of enrollment levels. The resources would be sufficient to enable the institution to offer

a minimum array of instructional and support programs required by its mission. Such a policy would cause declining staffing ratios and rising expenditures per student in institutions where it was implemented. Since it provides additional resources to small institutions only, core funding would increase staffing and funding disparities between small and large institutions. Core funding would provide slightly higher staffing expenditures and appropriation levels than current funding policies for the Community College System.

PART IV. EVALUATION OF CURRENT AND ALTERNATIVE FUNDING POLICIES

The Task Force evaluated current and alternative funding policies based on the policies' projected resource requirements and the extent to which each policy satisfied a set of evaluation criteria. This chapter contains a description of the criteria, the evaluations of current and alternative funding policies, and a discussion the costs of alternative policies.

CRITERIA

Funding methods are mechanisms with which the state seeks to attain its goals for post-secondary education¹. Every funding method has inherent characteristics that affect the way in which resources are provided, distributed, and used. These, in turn, affect educational activities and outcomes.

The Task Force defined five criteria, consistent with the goals described above, to guide its evaluation of state funding policies. The criteria include:

1. Providing Incentives for Innovative Resources Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.
2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems in an equitable manner.

¹ Appendix B describes the Coordinating Board's goals for the investment in post-secondary education.

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, and program mix and that all costs are variable in the long run but some costs are fixed in the short run.
4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.
5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

Each funding policy was scored on each criterion. Possible scores ranged from 0 to 3. A score of 0 meant that the policy did not satisfy the criteria. At the other extreme, a score of 3 meant that the policy fully satisfied the criteria. The first and third criteria were judged to be significantly more important than the others. The amount of resources a system receives and how these resources are managed by the system are important factors in how a system fulfills its mission. Innovative resource management may enable systems to maintain and even improve the quality of their services despite constrained resources. There are limits, however, to the use of resource management. Systems must have a basic level of funding which is sufficient to enable them to fulfill their missions. Consequently, scores on the first and third criteria were doubled. A score of two, for example, was converted to four.

EVALUATION OF FUNDING POLICIES

This section contains eight evaluation sheets and a summary of the evaluations. Current funding policies were evaluated separately for each system because of their variety. Each alternative funding policy was evaluated for all systems.

Evaluation of the Current Funding Policy for
the Area Vocational-Technical Institutes

Criteria for evaluation of funding alternatives:

1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

State funding for instruction is not related to enrollments. The State Board has no discretion for allocation of instructional aids because the formula is specified in statute. The Board has some discretion in allocation of non-instructional aids, which have been partially related to enrollments.

Evaluation Score: 2

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

Tuition revenue is between 11 and 13 percent of instructional expenditures as opposed to a minimum of 25 percent in the collegiate systems. Legislative committees do not review operating budgets or authorize specific changes in funding for the AVTIs. In comparison, the legislative appropriations committees do review operating budgets and authorize changes in funding for the collegiate systems.

Evaluation Score: 0

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

The instructional portion of the AVTI funding policy does not recognize changing cost patterns as they relate to enrollment changes. Instructional costs are essentially fixed given projected enrollment patterns. Non-instructional aids have been partially related to cost patterns. Both institutions with increasing and declining enrollments receive fixed levels of instructional support.

Evaluation Score: 2

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

No explicit incentives exist for providing or measuring the quality of services.

Evaluation Score: 0

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

The funding formula does not relate resources to outputs or enrollments. It relates resources to past expenditures. Consequently, there are few incentives for increasing productivity.

Evaluation Score: 1

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not	Satisfies Criteria	Satisfies Criteria	Fully Satisfies
Satisfy Criteria	to a Small Degree	to a Large Degree	Criteria

Total Evaluation Score: 5

Evaluation of the Current Funding Policy
for the Community College System

Criteria for evaluation of funding alternatives:

-
1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

Prior to 1977, state funding was related to enrollments. The bulge policy provided no additional state funding for enrollments beyond the 1977 base. The Board has discretion in the allocation of resources and the organization of institutions and programs and has used these powers to formulate allocation and management policies to respond to changing conditions and needs.

Evaluation Score: 6

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

Legislative funding policies for the community colleges have not recognized the costs of operating many small institutions. The community colleges operate vocational and occupational programs. Those programs have not been funded on the same basis as those in the AVTIs.

Evaluation Score: 1

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

Funding in the community colleges for base enrollments does not change with enrollments. The bulge funding policy recognizes cost patterns related to small increases in enrollments over short time spans. Internal allocation procedures recognize that costs vary with factors such as size and program mix. However, the enrollment levels beyond which the bulge policy must be modified have not been defined.

Evaluation Score: 4

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

No explicit incentives exist for providing or measuring the quality of services.

Evaluation Score 0

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

Although there are no explicit incentives for increasing productivity, resources can be used for this purpose without penalty or loss of resources.

Evaluation Score: 1

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not	Satisfies Criteria	Satisfies Criteria	Fully Satisfies
Satisfy Criteria	to a Small Degree	to a Large Degree	Criteria

Total Evaluation Score: 12

Evaluation of the Current Funding Policy
for the State University System

Criteria for evaluation of funding alternatives:

-
1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

Prior to 1977, state funding was related to enrollments. The bulge policy provides no additional state funding for enrollments above the 1977 base. The Board has discretion in the allocation of resources and the organization of institutions and programs. The Board has asked that Southwest State University and Metro State University be placed on separate funding basis. Consequently, the Board has not had to make internal reallocation decisions to address the special needs of these institutions.

Evaluation Score: 2

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

Legislative funding policies recognize the unique costs of Southwest State University and Metro State University. While instructional costs are higher, tuition rates paid by students in the system are comparable to rates in the community colleges.

Evaluation Score: 1

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

State funding is related to enrollments up to the 1977 base. The bulge policy recognizes cost patterns related to small enrollment increases over short time periods. The application of the bulge funding policy has not been defined with respect to the size and duration of bulge enrollments. Internal allocation policies for instruction do not recognize economies of scale. However, a core program has been defined for support services.

Evaluation Score: 4

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

No explicit incentives exist for providing or measuring the quality of services.

Evaluation Score: 0

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

Although there are no explicit incentives for increasing productivity, resources can be used for this purpose without penalty or loss of resources.

Evaluation Score: 1

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not	Satisfies	Satisfies	Fully Satisfies
Satisfy Criteria	to a Small Degree	to a Large Degree	Criteria

Total Evaluation Score: 8

Evaluation of the Current Funding Policy
for the University of Minnesota

Criteria for evaluation of funding alternatives:

1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

Prior to 1977, state funding was related to enrollments for instructional programs. The bulge policy provided no additional state funding for enrollments above the 1977 base. The Board of Regents has discretion in the allocation of resources and the organization of University programs. The internal planning process has recommended re-allocations based on university-wide priorities.

Evaluation Score: 4

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

Legislative funding policies have not recognized the costs of operating Morris. Revenue from tuition changes will be more than 31 percent of instructional costs in F.Y. 1983, which is higher than any other system.

Evaluation Score: 1

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

State funding is related enrollments up to the 1977 base. The bulge policy recognizes the cost pattern related to small enrollment increases over a short time period. Tuition rates and internal allocation policies recognize that costs vary with factors such as size and program mix.

Evaluation Score: 4

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

No incentives exist for providing or measuring the quality of services.

Evaluation Score: 0

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

Although there are no explicit incentives for increasing productivity, resources can be used for this purpose without penalty or loss of resources.

Evaluation Score: 1

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not	Satisfies Criteria	Satisfies Criteria	Fully Satisfies
Satisfy Criteria	to a Small Degree	to a Large Degree	Criteria

Total Evaluation Score: 10

Evaluation of the Average Cost Funding Policy
for All Public Systems

Criteria for evaluation of funding alternatives:

-
1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

Average cost funding would base all funding directly on enrollments. As enrollments decrease, state funds would be reduced proportionately. It would be necessary for the governing board to have complete discretion in allocation decisions. Clearly, this policy would provide a strong incentive for governing boards to manage resources in accordance with program priorities.

Evaluation Score: 6

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

Equitable implementation of this policy would require that all budget review and appropriation decisions be placed under the same committee in each legislative body. In order to ensure equitable application, this policy should be coupled with a tuition policy which relates tuition revenue to a uniform percentage of instructional costs, and adjustments for effects of the bulge policy and recent funding reductions.

Evaluation Score: 3

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

Average cost funding does not recognize changing cost patterns or differences related to size. It ignores fixed costs in the short-run and assumes that all institutions, regardless of size or enrollment pattern, have similar costs. Average cost funding could be designed in a way to recognize the mix of programs in a system or institution.

Evaluation Score: 2

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

No specific incentives exist in this alternative to encourage quality. Budget reductions do create an environment in which priorities must be established to guide allocation decisions. As such, it would be possible to re-allocate resources to high priority programs, thereby encouraging the development of high quality programs.

Evaluation Score: 0

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

If funding is enrollment related and declines in proportion to enrollments, and if governing boards have discretion to allocate funds, there would be an incentive to implement productivity-increasing measures. However, collective bargaining agreements may inhibit such changes.

Evaluation Score: 2

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not	Satisfies	Satisfies	Fully Satisfies
Satisfy Criteria	to a Small Degree	to a Large Degree	Criteria

Total Evaluation Score: 13

Evaluation of the Fixed and Variable Cost Funding Policy
for All Public Systems

Criteria for evaluation of funding alternatives:

-
1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

Fixed and variable funding relates a significant portion of funding directly on enrollments. Costs not related to enrollments are fixed. Therefore, as enrollments decline funding would be reduced, but at a slower rate. Incentives for innovative resource management would exist under this policy. However, since some costs are fixed, incentives would not be as great as under average cost funding.

Evaluation Score: 2

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

This policy can be equitably implemented in all systems providing (1) it is a comprehensive tuition policy, (2) budget review decisions are placed under one committee in each house of the legislature, and (3) the effects of the bulge policy and recent funding reductions are accounted for.

Evaluation Score: 3

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

Fixed and variable funding specifically addresses the problem of funding changing cost patterns caused by fluctuating enrollments. It does this by distinguishing between costs that vary with enrollments and those which do not. The policy also relates funding to the mix of programs in each system.

Evaluation Score: 6

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

Fixed and variable funding does not provide explicit incentives for high quality services.

Evaluation Score: 0

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

Since fixed and variable funding provides sufficient resources to accommodate changing cost patterns caused by declining enrollments, there is little incentive to increase productivity.

Evaluation Score: 0

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not Satisfy Criteria	Satisfies to a Small Degree	Satisfies to a Large Degree	Fully Satisfies Criteria

Total Evaluation Score: 11

Evaluation of the Program Funding Policy
for All Public Collegiate Systems

Criteria for evaluation of funding alternatives:

-
1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

Program funding would provide a fixed level of support regardless of the number of students served. While governing boards would continue to have discretion in allocating funds, program funding would provide little incentive for reallocation and innovative resource management. In a period of declining enrollments, this funding policy would provide systems with increased resources per student and, consequently, enable systems to begin new or improved programs

Evaluation Score: 0

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

If the program funding policy was implemented in a manner which accounted for the effects of the bulge policy, recent budget reductions and tuition rates, it would be an equitable funding method. It is assumed that the appropriations process would be consolidated under the same committee in each house and would be uniformly applied to all systems.

Evaluation Score: 3

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

Program funding does take into account different program costs. If enrollments decline by more than 5 percent in two years, funding would be reduced. However, enrollment projections suggest that this would not occur very often. Consequently, this policy does not recognize changing cost patterns.

Evaluation Score: 2

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

Under this policy, systems would have an opportunity to reallocate excess program funding to enhance quality, although there are no explicit incentives to do so.

Evaluation Score: 1

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

This funding method does not provide any incentives for increased productivity because funding levels are fixed.

Evaluation Score: 0

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not	Satisfies Criteria	Satisfies Criteria	Fully Satisfies
Satisfy Criteria	to a Small Degree	to a Large Degree	Criteria

Total Evaluation Score: 6

Evaluation of the Core Funding Policy for
the Two and Four-Year Collegiate Institutions

Criteria for evaluation of funding alternatives:

-
1. Provide Incentives for Innovative Resource Management. The funding method should encourage governing boards to anticipate changing needs for education and training and to develop procedures for the reallocation of resources based on priorities.

Minimum core funding would provide small collegiate institutions with a sufficient resource base to offer a program consistent with their stated mission, regardless of the number of students enrolled. Since resources are fixed at these institutions, no incentives exist for innovative resource management. The governing board presumably would not have discretion to reallocate core resources to other institutions.

Evaluation Score: 0

2. Provide Resources in an Equitable Manner. The funding method should provide funds to systems and institutions in an equitable manner.

There are small institutions in all three collegiate systems. If a policy was established to provide resources for a core program in all of these institutions, it would probably require additional state funding in order to assure equity. It would not be equitable to fund core programs out a resources from larger institutions because small institutions are not equally distributed in all systems.

Evaluation Score: 3

3. Recognize Differing Cost Patterns. The funding method should recognize that costs differ based on factors such as size, mission, program mix and that all costs are variable in the long run, but some costs are fixed in the short run.

At some point, enrollments decline below the level at which resources can be provided on the basis of the number of students served. Core funding addresses this by providing a minimum resource base.

Evaluation Score: 6

4. Encourage Quality. Funding policies should contain explicit incentives for providing high quality services as demonstrated by clearly identifiable measures of performance.

While this policy may protect minimum program standards, it does not contain explicit incentives for providing high quality services.

Evaluation Score: 0

5. Encourage Increased Productivity. Funding policies should include incentives for increasing productivity.

This policy does not encourage increased productivity.

Evaluation Score: 0

Key to Evaluation Scores:

<u>0</u>	<u>1</u>	<u>2</u>	<u>3</u>
Does Not	Satisfies Criteria	Satisfies Criteria	Fully Satisfies
Satisfy Criteria	to a Small Degree	to a Large Degree	Criteria

Total Evaluation Score: 9

SUMMARY OF FUNDING POLICY EVALUATIONS

The summary of evaluations presented below is organized by the criteria used to evaluate each funding alternative. The summaries are intended to highlight (1) aspects of current policies which both satisfy and fail to satisfy the criteria, and (2) those funding alternatives which best satisfy each criterion. Table 1 contains a summary of the evaluation scores.

Innovative Resource Management

Current funding policies vary significantly across systems, resulting in disparate capacities for innovative resource management. Funding policies for the AVTIs and the state universities provide fewer incentives for innovative resource management than funding policies for the other public systems. Program funding for the AVTIs fails to provide incentives for resource management because it is based on prior expenditures rather than enrollments. Moreover, allocation procedures for instructional resources are specified in statute, which undermines the management discretion of the governing board.

Since 1978, the State University Board has received separate funding for Southwest State University. The Board also has received special funding for Metro State University. In 1982, additional legislative support was received for Bemidji State University. As a result of these funding decisions, the State University Board has not had to reallocate internally to support these institutions.

TABLE 1

SUMMARY OF EVALUATION SCORES: CURRENT AND PROPOSED FUNDING POLICIES

Criteria	Current Funding Policies				Average Cost Funding	Program Funding	Fixed/Variable Funding	Core Funding
	AVTIs	Community Colleges	State Universities	University of Minnesota	All Systems	Collegiate Systems	All Systems	Collegiate Systems
1. Management Incentives	2	6	2	4	6	0	2	0
2. Equity	0	1	1	1	3	3	3	3
3. Cost Patterns	2	4	4	4	2	2	6	6
4. Encourage Quality	0	0	0	0	0	1	0	0
5. Increase Productivity	1	1	1	1	2	0	0	0
TOTAL EVALUATION SCORE	5	12	8	10	13	6	11	9

Key to evaluation scores: 0 does not satisfy criteria 1 satisfies criteria to a small degree 2 satisfies criteria to a large degree 3 fully satisfies criteria

Criteria 1 and 3 were judged to be twice as important as the other criteria. Therefore, these scores were multiplied by 2.

The State Board for Community Colleges, however, has made allocation decisions to support small and high-cost institutions out of existing resources. In response to limited resources, the Community College Board also has reorganized and consolidated five small institutions serving northeastern Minnesota.

The Board of Regents of the University of Minnesota has developed an extensive internal planning process to guide budgeting. The process has been used by the Regents to reallocate funds based on program priorities.

Of the alternative funding policies, average cost funding best satisfies the resource management criterion. Average cost funding directly relates state appropriations to enrollments. By limiting resources in this manner, average cost funding provides a strong incentive for governing boards to develop procedures for the reallocation of resources based on priorities within their respective systems.

Although fixed and variable cost funding would provide sufficient resources to systems for supporting fixed costs, it would reduce resources for those costs which vary with enrollments. Consequently, fixed and variable cost funding would provide some incentives for innovative resource management.

Since funding is set at a base level for programs and does not change as enrollments decline, program funding would provide little incentive for innovative resource management. Excess funding would, however, providing governing boards with an opportunity to respond to changing educational needs.

Core funding is intended to preserve minimum educational services at small institutions. Resources would be provided on the basis of programs requirements, not the number of students served. If funding for such a policy were provided on a separate basis, governing boards would not be required to maintain and support these institutions with existing resources. As such, there are no incentives for innovative resource management. If governing boards were required to support core programs out of existing resources, incentives for innovative resource management would exist.

Equity

Current funding policies for post-secondary education have not been equitably applied to all systems. The policies were developed in a period of enrollment growth and growing state revenue. As a result, it was possible to provide additional resources to post-secondary education as problems arose. This resulted in the development of a variety of funding policies that are not uniformly applied to all systems. Conditions have changed. State revenue is no longer growing as fast as projected expenditures. Enrollments are projected to decline, in the aggregate, in post-secondary education by 20 to 24 percent by the mid-1990s. Problems which occurred on an isolated basis in the past will become more widespread in the future. It will no longer be possible to address these problems on an individual basis. Comprehensive and equitable policies will have to be developed for all systems and institutions.

The legislature uses two different procedures for budget review and appropriations decisionmaking for post-secondary education. Appropriations' decisions for the AVTIs essentially are made by the education policy committees of the House and Senate. Appropriations' decisions for the public collegiate systems are made by the House Appropriations Committee and Senate Finance Committee. The nature and extent of these reviews are different. The instructional appropriation formula for the AVTIs specified in statute and appropriations are an entitlement based on the formula. Appropriation levels for the collegiate systems are determined by a review of proposed system budgets with close scrutiny of requested increases. These variations in the appropriations' process have resulted in differential application of state funding policies to the post-secondary systems. The situation has inhibited the development of comprehensive and equitable policies for public post-secondary education.

The state does not currently have a formal policy regarding tuition levels in public post-secondary systems. In the absence of a tuition policy, the state has provided different levels of subsidy to the public post-secondary systems. Under current practices, tuition revenue as a percent of instructional expenditure ranges from 17 percent in the AVTIs to 32 percent at the University of Minnesota in F.Y. 1983.

During the last three years, tuition was raised in response to mandated budget reductions. As enrollments decline, so will tuition revenue. There will be additional pressure to raise tuition in order to offset revenue losses from declining

enrollments. Equity considerations suggest a comprehensive tuition policy under which systems would receive similar proportions of state subsidy for instructional programs.

The bulge policy was implemented in 1977 to cope with temporary enrollment growth in the public collegiate systems. The policy provided no state funds for enrollments above 1977 levels. The AVTIs were not subject to this policy even though they faced a similar enrollment pattern.

To promote access, the state of Minnesota has built an extensive array of public post-secondary education institutions. Many of these institutions are small by national standards and will become smaller as enrollments decline. At some point, enrollments in these institutions will go below the level which justifies sufficient resources to offer a minimum academic program. If these institutions are to continue to provide basic services they must have a minimum resource base which is fixed regardless of enrollment levels. Although the state has implemented such a core funding policy, it has not done so consistently. For example, Southwest State University receives a fixed legislative resource base while the University of Minnesota-Morris, an institution of comparable size, does not. Further, small community colleges which are confronted with problems similar to Southwest are not provided with a separate legislative funding base. This requires the Community College Board and the Board of Regents to allocate funds internally in order to provide

sufficient resources to these small campuses. Equity considerations would suggest that core funding should be applied to all systems or none.

Each alternative to current funding policies can attain favorable levels of equity if there are adjustments for inequalities in the current bulge policy, tuition policy, and recent reductions for post-secondary education.

Recognition of Cost Patterns

In 1977, the legislature adopted the bulge funding policy for the collegiate systems of post-secondary education. This policy recognized the temporary enrollment growth facing collegiate institutions would be followed by more than a decade of declining enrollments. Consequently, collegiate systems were required to fund enrollment growth above 1977 levels out of additional tuition revenue. No permanent state funding has been provided. Thus, the bulge policy correctly recognized that the marginal costs associated with temporary enrollment growth are less than average costs. When the policy was adopted, however, neither the duration of the policy nor the magnitude of the enrollment bulge was specified. In fact, enrollment growth has exceeded expectations by a sizeable margin. In addition, the budget policy may have been undermined further by the funding reductions during the last three years. Further reductions in base funding for the collegiate systems could erode the quality and diversity of educational programs and services. It would be

prudent to maintain the intent of the bulge policy until enrollments decline below the 1977 base, then alternative funding policies could be implemented.

When enrollments were growing, state support was provided in relation to the number of students served. As enrollments drop below the 1977 base, funding for the collegiate systems presumably could be withdrawn in a similar manner. This method of enrollment-related funding does not recognize that some costs are fixed and do not decline as enrollments decrease. On the other hand, funding for the AVTIs is essentially fixed at current levels. This policy does not recognize that many costs are variable and do decline as enrollments drop. Neither of these policies recognizes that some costs are variable and some are fixed in the short run.

Of the alternative funding policies, two--fixed and variable funding and core program funding--best recognize cost patterns. During periods of declining enrollments, fixed and variable funding prevents severe loss of funds by distinguishing between costs that vary with enrollments and costs that do not. Core program funding ensures that small institutions will be provided with sufficient resources to offer a program consistent with their stated mission, regardless of enrollment levels.

Average cost funding does not recognize differences in cost patterns resulting from changing enrollment levels. Furthermore, it would ignore fixed costs. While program funding recognizes fixed costs, it is not responsive to changes in cost patterns with enrollments.

Quality

None of the existing or proposed alternative funding policies contains explicit incentives for providing high quality services. This does not mean that high quality programs do not exist in Minnesota institutions or that current policies inhibit the offering of high quality programs. However, they do not specifically address the issue of defining and measuring the quality of services being provided.

Productivity

There are no explicit incentives in current funding policies for increasing productivity with alternative educational technologies or procedures. In fact, some disincentives exist. If an AVTI, for example, wanted to substitute a computer for a faculty member, the institution would lose the funds which supported that faculty member two years later.

As enrollments decrease, it is probable that some positions will be lost and others reallocated to new or higher priority programs. With pressures to reduce spending yet save jobs, obtaining funds for implementing alternative technologies and procedures may be difficult. Nonetheless, alternative technologies should be supported in the educational process as a means of enhancing quality and improving productivity.

None of the proposed alternatives directly supports increased productivity. However, average cost funding, by reducing funding directly with enrollments, provides an indirect but strong incentive to increase productivity.

Summary of Costs

When compared to current funding and tuition policies, some alternative policies would cost the state significantly more and others significantly less. This section summarizes the savings or costs of the alternative funding and tuition policies. Tables 2 through 6 contain summaries for each system and one for all four systems. The savings for a particular alternative are the reduced levels of state appropriations for operations compared to those levels under current funding and tuition policies. The costs displayed in the tables in parentheses are the increased levels of state appropriations that would be required by a given combination of policies. These savings and cost estimates do not include the additional appropriations that might be required for financial aid as a result of tuition increases.

The tables show that average cost funding would yield more savings than any other current or alternative funding policy. This would be expected since average cost funding would vary resources in proportion with enrollment. Savings for all systems resulting from an average cost funding policy would be as high as \$24 million annually under the current tuition policy. Fixed and variable cost funding would yield savings for the state if implemented for the AVTIs with the current tuition policy. The same combination would cost the state additional funds if implemented in the three collegiate systems. Fixed and variable cost funding and current tuition policies implemented in all four post-secondary systems would cost the state as much as \$9.7 million more than current policies annually. The implementation

TABLE 2

ESTIMATED SAVINGS AND COSTS OF
ALTERNATIVE FUNDING AND TUITION POLICIES
AS COMPARED TO PRESENT FUNDING AND TUITION POLICIES
IN CONSTANT DOLLARS¹ (IN MILLIONS)
AREA VOCATIONAL-TECHNICAL INSTITUTES

<u>Year</u>	<u>Average Cost Funding</u>		<u>Fixed and Variable Cost Funding</u>	
	<u>Current</u>	<u>Alter- native</u>	<u>Current</u>	<u>Alter native</u>
1984	-	\$ 1.7	-	\$1.6
1986	\$ 1.8	5.4	-	3.9
1988	3.0	6.6	\$.4	4.4
1990	2.4	5.9	.3	4.2
1992	6.0	9.4	1.3	5.4
1994	11.3	19.3	2.3	6.8
1996	13.0	15.9	2.8	7.4
1998	13.6	16.4	3.0	7.2
2000	14.5	17.3	3.0	7.8

1 Constant F.Y. 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

TABLE 3

ESTIMATED SAVINGS AND COSTS OF
ALTERNATIVE FUNDING AND TUITION POLICIES
AS COMPARED TO PRESENT FUNDING AND TUITION POLICIES
IN CONSTANT DOLLARS¹ (IN MILLIONS)
COMMUNITY COLLEGE SYSTEM

<u>Year</u>	<u>Fixed and Variable Cost Funding</u>		<u>Program Funding</u>		<u>Core Funding</u>	
	<u>Current</u>	<u>Alter- native</u>	<u>Current</u>	<u>Alter- native</u>	<u>Current</u>	<u>Alter- native</u>
1984	-	\$1.1	-	\$1.1	-	\$.9
1986	-	2.7	-	2.7	\$.2	2.5
1988	-	2.7	\$ (.4)	2.6	(.4)	2.5
1990	\$(.2)	2.4	-	2.5	(.3)	2.3
1992	(.3)	3.1	(.3)	2.7	(.4)	2.7
1994	(.6)	3.6	(1.2)	2.4	(.4)	3.0
1996	.5	3.6	(1.5)	2.3	(.5)	3.0
1998	.5	3.6	(1.4)	2.3	(.4)	3.0
2000	.5	3.5	(1.3)	2.3	(.4)	3.0

1 Constant F.Y. 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

TABLE 4

ESTIMATED SAVINGS AND COSTS OF
ALTERNATIVE FUNDING AND TUITION POLICIES
AS COMPARED TO PRESENT FUNDING AND TUITION POLICIES
IN CONSTANT DOLLARS¹ (IN MILLIONS)
STATE UNIVERSITY SYSTEM

<u>Year</u>	<u>Average Cost Funding</u>		<u>Fixed and Variable Cost Funding</u>		<u>Program Funding</u>	
	<u>Current</u>	<u>Alter- native</u>	<u>Current</u>	<u>Alter- native</u>	<u>Current</u>	<u>Alter- native</u>
1984	-	\$2.7	-	\$2.7	-	\$2.7
1986	-	5.4	-	5.4	-	5.4
1988	\$1.0	6.5	\$ (.3)	5.6	\$(2.3)	4.3
1990	1.3	6.7	(.4)	5.6	(2.7)	4.1
1992	1.9	7.3	(.5)	5.6	(3.5)	3.6
1994	4.0	9.0	(1.3)	5.4	(6.0)	2.3
1996	4.5	9.4	(1.5)	5.4	(6.7)	1.9
1998	3.6	8.6	(1.1)	5.5	(5.3)	2.7
2000	3.4	8.5	(.9)	5.6	(4.6)	3.2

1 Constant F.Y. 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

TABLE 5

ESTIMATED SAVINGS AND COSTS OF
ALTERNATIVE FUNDING AND TUITION POLICIES
AS COMPARED TO PRESENT FUNDING AND TUITION POLICIES
IN CONSTANT DOLLARS¹ (IN MILLIONS)
UNIVERSITY OF MINNESOTA

<u>Year</u>	<u>Average Cost Funding</u>		<u>Fixed and Variable Cost Funding</u>		<u>Program Funding</u>	
	<u>Current</u>	<u>Alter-native</u>	<u>Current</u>	<u>Alter-native</u>	<u>Current</u>	<u>Alter-native</u>
1984	-	\$ 2.4	-	\$2.4	-	\$ 2.4
1986	\$3.3	7.4	\$ (1.4)	4.3	\$ (2.8)	3.4
1988	4.9	9.1	(4.3)	2.9	(7.0)	1.2
1990	5.1	9.4	(5.2)	2.5	(8.5)	.3
1992	5.2	9.5	(5.5)	2.3	(8.3)	-
1994	6.1	10.5	(8.9)	.5	(13.3)	(2.4)
1996	6.7	11.3	(11.5)	(.5)	(16.6)	(4.2)
1998	6.6	11.2	(11.2)	(.7)	(16.1)	(3.9)
2000	6.4	11.0	(10.4)	(.3)	(14.6)	(3.1)

1 Constant F.Y. 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

TABLE 6

ESTIMATED SAVINGS AND COSTS OF
ALTERNATIVE FUNDING AND TUITION POLICIES
AS COMPARED TO PRESENT FUNDING AND TUITION POLICIES
IN CONSTANT DOLLARS¹ (IN MILLIONS)
ALL PUBLIC SYSTEMS

Year	Average Cost Funding		Fixed and Variable Cost Funding		Program Funding		Core Funding	
	Current	Alter-native	Current	Alter-native	Current	Alter-native	Current	Alter-native
1984	-	\$ 6.8	-	\$ 7.8	-	\$ 6.2	-	\$.9
1986	\$ 5.1	18.2	\$(1.4)	16.3	\$(2.8)	11.5	\$.2	2.5
1988	8.9	22.2	(4.2)	15.6	(9.7)	8.1	(.4)	2.5
1990	8.8	22.0	(5.5)	14.7	(11.2)	6.9	(.3)	2.3
1992	13.1	26.2	(5.0)	16.4	(12.1)	6.3	(.4)	2.7
1994	21.4	38.8	(8.5)	16.3	(20.5)	2.3	(.4)	3.0
1996	24.2	36.6	(9.7)	15.9	(24.8)	-	(.5)	3.0
1998	23.8	36.2	(8.8)	15.6	(22.8)	1.1	(.4)	3.0
2000	24.3	36.8	(7.8)	16.6	(20.5)	2.4	(.4)	3.0

1 Constant F.Y. 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

of the AVTI program funding policy in the collegiate systems with the current tuition policy would be the most expensive alternative. This combination would cost the state up to an additional \$25 million annually. Finally, core funding for the Community College System would cost the state up to \$.5 million annually under the current tuition policy.

The alternative tuition policy implemented in conjunction with any alternative funding policy would generate significant savings for the state when compared to the current tuition policy. An average cost funding policy implemented with the alternative tuition policy would generate annual savings as high as \$39 million. If a fixed and variable cost funding policy were combined with the alternative tuition policies, savings totaling as much as \$16.6 million annual for the four systems could be achieved. The program funding alternative most clearly illustrates the revenue generating ability of the alternative tuition policy. Program funding and the alternative tuition policy would provide stable staffing and funding for the collegiate systems at no additional cost to the state. In fact, savings of up to \$11 million also could be achieved. Finally, core funding for the Community College System would save the state up to \$3 million under the alternative tuition policy.



PART V. EDUCATIONAL ISSUES RELATED TO FUNDING POLICIES

Funding policies and decisions have an impact, sometimes indirect, on many important educational issues. Decisions regarding educational finance must address these issues whenever possible so they can be considered and addressed by financing methods. This chapter reviews the major educational policy issues which were raised by the Task Force review of funding policies. These issues are size and number of institutions; program effectiveness; ways to increase productivity in instruction and support programs; the role of the private sector; implications of finance policies for student assistance; providing public services on a contractual basis; the appropriate role for legislators, the governor, and governing boards; and state responses to declining enrollments in elementary and secondary education.

THE SIZE AND NUMBER OF POST-SECONDARY INSTITUTIONS

None of the current or alternative funding policies reviewed directly addresses the issue of the size and number of Minnesota's public post-secondary institutions. The size and number of public institutions, however, could adversely affect the quality and vitality of public post-secondary education. Minnesota decisionmakers have chosen to provide access to post-secondary education by establishing 63 public campuses throughout the state. Many of these institutions are small by

national and regional standards. Small institutions, however, are not inherently inferior. But they tend to be much more expensive to operate than large institutions. Small institutions are unable to achieve significant economies of scale in either instructional or support activities. Further, they are typically unable to provide the same breadth of academic offerings as large institutions.

The enrollment declines and fiscal constraint of the 1980s will make it difficult for Minnesota to maintain this array of public post-secondary institutions at acceptable levels of quality. System revenues will shrink as a result of enrollment declines and fiscal stringency. Small institutions likely will become even more expensive on a per student basis as enrollments decline and, consequently, place an even greater financial burden on systems. Core funding for all small institutions, while necessary to ensure a minimal program, would require additional resources or additional strain on large institutions. The maintenance of all 63 institutions in their present form could weaken the quality and vitality of public post-secondary education in Minnesota. Alternatively, the consolidation of some institutions might allow Minnesota to protect or even enhance the quality and vitality of public post-secondary education. Fewer, but larger, institutions likely would be able to provide less expensive education and a wider array of program offerings. Fewer institutions would not necessarily reduce participation in post-secondary education. Many counties in Minnesota without institutions have higher participation rates to post-secondary

education than do counties with one or more institutions. Obviously, geographic proximity does not ensure greater participation in post-secondary education. Funding policies can be implemented which would provide an incentive to governing boards to consider alternative ways to organize institutions and programs.

EFFECTIVENESS

None of the current or alternative funding policies reviewed would provide direct incentives to improve the effectiveness of public post-secondary institutions in Minnesota. Effectiveness relates to the outputs of education and to the differences resulting from this process. The concept of effectiveness should encourage institutions to establish objectives and measure their achievements. Effectiveness, as such, is not advanced by current funding policies. In fact, if the current funding policies and all existing institutions and programs are maintained, effectiveness could be affected adversely. Funds, however, could be provided to institutions and programs in ways which would directly encourage greater effectiveness.

PRODUCTIVITY

The evaluation of current funding policies concluded that they contain no explicit incentives for increasing productivity. Disincentives for productivity improvement in the AVTI funding

policy were cited. Further, none of the alternatives reviewed necessarily would provide explicit incentives for productivity improvement.

Increased productivity, however, would seem to be one way for post-secondary institutions to respond to the challenge of declining enrollments and resources. Despite funding reductions, institutions conceivably could maintain or even expand course offerings through improvements in productivity. Productivity could be encouraged through a separate funding policy.

THE PRIVATE SECTOR

State funding and tuition policies for public post-secondary education also affect the private sector of post-secondary education. The private sector is an important part of post-secondary education in Minnesota. Minnesota private colleges, professional and vocational schools number approximately 115. These institutions enrolled 53,000 students, or 21 percent of Minnesota's enrollment in post-secondary education in fall 1981. The state has recognized the contributions of the private sector through two programs. The State Scholarship and Grant Program provides financial aid to Minnesota residents attending either public or private post-secondary institutions. The state also appropriates a small level of funding to private institutions under the Private College Contract Program.

Private institutions face the same prospects of declining enrollments and resources as the public institutions. Private institutions also draw a large portion of their enrollments from

the declining pool of traditional college age students. The fiscal implications of declining enrollments are very direct for private institutions. Since they typically receive two-thirds of their revenues from student charges, that revenue will decline proportionately with enrollments.

A recent study of costs and revenues in Minnesota private colleges has concluded that tuition revenue will have to increase from \$75 million to \$142 million by 1987 in order to offset anticipated reductions in state and federal financial aid, despite vigorous efforts to raise additional income from private sources.

The Coordinating Board recently recommended a state policy toward private post-secondary education. The policy included the following recommendation:

That the dual system of public and private higher education is essential to the vitality of educational services in the state of Minnesota, and that decisions made at the state level should reflect the interests of maintaining and promoting a strong private sector.

Since state funding and tuition policies for the public sector could affect adversely the private sector, these impacts should be considered in the development of state finance policy.

¹ Minnesota Higher Education Coordinating Board, Public Policy Toward Private Post-Secondary Education in Minnesota (April 14, 1982).

COORDINATION

Coordination of post-secondary education in Minnesota is neither explicitly encouraged nor discouraged by the current or alternative funding policies reviewed. Coordination is defined here as cooperation between post-secondary education institutions. This could be cooperation between institutions within a system, between institutions in different systems, or between institutions in different sectors. Examples of coordination might include the offering of joint programs, the coordination of existing offerings, or the sharing of facilities or support services. In fact, present funding arrangements and the organizational features they create and sustain discourage increased coordination.

Coordination is desirable since it could expand educational opportunities and make more effective use of existing programs and facilities. Since neither the current nor the alternative funding policies would provide direct incentives for coordination, a separate policy would address this issue best.

RELATIONSHIP BETWEEN EDUCATIONAL COSTS AND FINANCIAL AID

How the state finances post-secondary education has a significant impact on students and their need for financial aid. Educational costs are composed of tuition, required fees, educational books and supplies, and living costs. For many students, tuition represents a major component of educational costs. For financially disadvantaged students, rising costs

directly impede their ability to finance and attend post-secondary education. Whether tuition is raised on an ad hoc basis in response to state shortfalls, or in response to explicit policy considerations, additional funds should be invested in financial aid to maintain the commitment to assist economically disadvantaged students.

ALTERNATIVE PROVISION OF EDUCATIONAL SERVICES THROUGH CONTRACTING

There is growing pressure to reduce public expenditures and improve the effectiveness of public programs. One way to improve effectiveness and perhaps reduce the cost of public services is to contract for these activities in a competitive manner. Under this approach, both public and private institutions could bid for the right to operate a needed service. Presumably, these contracts would be provided on a fixed term basis. Contracts would only be renewed if the services provided were deemed to be of acceptable high quality. This approach would result in public institutions being treated more like private entities and incentives would exist to provide high quality services. By contracting for services, it would also be easier for the state to reduce or eliminate programs if they were no longer needed.

CLARIFICATION OF LEGISLATIVE, EXECUTIVE AND GOVERNING BOARD ROLES IN FUNDING PROCESS

The review of the appropriations process in Minnesota post-secondary education has revealed wide variation in roles of the legislature and governing boards. At one end of the

spectrum, the Community College System exercises wide discretion in the allocation of funds among the institutions and functions under its jurisdiction. At the other extreme is the AVTI System with a detailed formula determined by the legislature establishing appropriation levels and very little discretion left to the governing board, the State Board for Vocational-Technical Education. Between these two extremes fall the University of Minnesota and the State University Board. While the Board of Regents retains wide discretion over finance policy for the University, more than \$35 million in state funds are dedicated to special programs and cannot be used for other purposes. The State University System falls closest to the AVTI pattern with specific legislative decisions on funding levels for individual institutions including Southwest State, Metropolitan State and Bemidji State Universities.

The key issue is the extent to which the legislature and the executive are going to hold governing boards accountable for managing funds most effectively. Or, in contrast, the extent to which the legislature and the governor will attempt to make managerial decisions and, in effect, assume the role of the governing board.

In view of serious funding and educational choices in the next decade, clarification of the roles to be played by the three parties would contribute to more effective policy making and governance. If the legislature insists upon making the management and governing decisions, then the legislature should not be surprised at inadequate governance from the boards. Likewise, if

the governing boards insist upon shifting the hard decisions to the legislature, they should not be surprised at legislative and executive involvement in decisions which the governing boards might more appropriately be expected to perform.

In view of the difficult conditions ahead, further confusion or mixing of these roles is likely. This confusion is not likely to contribute to good management, governance, and policymaking. As resources are constrained, there will be pressure to make uniform reductions across all institutions and programs in an effort to preserve all services and avoid political controversy. These pressures will work to preserve the status quo rather than make selective funding and budget reduction decisions. This tendency will only serve to undermine all programs and reduce quality throughout post-secondary education in Minnesota.

STATE RESPONSES TO DECLINING ENROLLMENTS IN ELEMENTARY AND SECONDARY EDUCATION

The manner in which Minnesota has responded to enrollment declines in public elementary and secondary education may provide insight useful in formulating policies for post-secondary education. The state has responded to declining enrollments in public elementary and secondary education in three ways. First, the manner in which levels of state aid were determined was modified. Second, school districts were required to do long-range program and fiscal planning. Finally, state statutes and regulations were modified to simplify the procedures for consolidation of school districts.

State aid formulas for elementary and secondary education related levels of aid directly to the number of pupils enrolled in a district. The formulas were modified several times to reduce the adverse effects of declining enrollments on aid levels.² Aid levels were originally determined by the number of pupils in a single year. When enrollments began to decline, the state shifted to an average of enrollments in the year being funded and the year immediately prior to that year. As enrollments continued to decline, the formula went from a 2-year average to a 3-year average, a 3 1/4-year, and finally a 4-year average. The effect of the averaging was to reduce school district revenues at a slower rate than enrollments were declining. This approach recognizes that reductions in spending could not be achieved at the same rate as reductions in enrollments because of fixed costs. The slower rate of decline also provided time for school districts to plan expenditure reductions.

The fact that aids were tied to enrollments, though, has tended to result in declining levels of expenditures as enrollments decline. Although school districts do have the option of increasing property taxes, levies are limited by state statute. Thus, the effect of declining enrollments in school districts has been reductions in expenditures and ultimately the closing of schools. This trend has been exacerbated by funding reductions resulting from the state's fiscal difficulties.

² Minn. Stat. 124.17.

As a second response to declining enrollments, the state required each school district to undertake two major planning efforts. First, all school districts were required to develop plans for the efficient and effective delivery of educational programs and services.³ The plans were to specifically address alternative methods of organization management for elementary and secondary education. Regional educational planning task forces were established to review the district plans and develop a regional plan. A State Department of Education review of this Educational Planning Task Force legislation concluded that:⁴

1. The legislation was implemented successfully;
2. The major trend in the organization of school districts will be to maintain status as independent school districts;
3. Fourteen percent of the school districts felt that the concept of school district pairing or consolidation may be a possible alternative; and
4. The most preferred alternative method of school district management was expanded coordination.

The second effort required all school districts to develop educational goals, a process for achieving the goals, and procedures for monitoring progress in achieving the goals.⁵ The school boards were required to annually review the goals and the progress in achieving them. A State Department of Education

³ Minn. Stat. 122.86.

⁴ Minnesota State Department of Education, A Review of the Educational Planning Task Force Legislation M.S. 122.86-122.89 (August 31, 1979).

⁵ Minn. Stat. 123.74.

report on this Local Curriculum Planning, Evaluation and Reporting Legislation reached the following three conclusions regarding the process:⁶

1. Plans for school improvement were a direct outgrowth of the annual evaluation in 54 percent of the school districts reporting;
2. The process appears to be resulting in local citizens being more capable of determining the quality of programs and services being provided; and
3. The process is being used to assist in budget and program reductions because many local districts are experiencing fiscal difficulty.

The third state response to declining enrollments was an effort to simplify and update statutes governing the consolidation of school districts.⁷ An extensive review of state statutes and regulations was conducted. Statutes and regulations which allow for consolidation of school districts were revised to simplify the consolidation process. Although the effort was successful in simplifying the process, it has not necessarily encouraged consolidations.

In responding to enrollment declines in elementary and secondary education, the state has not mandated specific fiscal or programmatic solutions for local school districts. Rather, the state has provided incentives, through buffered enrollment related funding, required planning activities, and simplified state statutes for school boards to exercise their management authority.

⁶ State of Minnesota Department of Education, A Report on the Department of Education's 1981 Review of the Local Curriculum Planning, Evaluation and Reporting Legislation (PER)

⁷ M.S. 123.74-123.742 (January 30, 1982).
Minn. Stat. 122.23.

PART VI. FINDINGS AND RECOMMENDATIONS

Current funding policies for Minnesota post-secondary education were designed in an era of growth. The state and its post-secondary education institutions, however, are entering an era of contraction. There is continuing pressure to curtail public expenditures and taxation. Post-secondary education enrollments are starting to decline. The Task Force strongly believes that maintaining and enhancing the quality of post-secondary education in Minnesota is critical to the future health of the state. Since these fiscal and enrollment trends could adversely affect the quality and vitality of post-secondary education, the Task Force on Future Funding has thoroughly reviewed current and alternative funding policies. The findings and recommendations of the Task Force are presented in this chapter.

Post-secondary education is entering a period of long-term and pervasive enrollment decreases. Total public enrollment are projected to decline by 20-24 percent by 1996. Minnesota historically has related funding for post-secondary education to the number of students enrolled. If this policy is maintained during the next 15 years, there will be a significant reduction in state appropriations for institutional operations. Institutional revenues will be reduced further as tuition declines with falling enrollments.

Enrollment and financing policies also will be affected by the state's financial condition. State revenues have not kept pace with projected spending obligations. Many fiscal obligations have been deferred to future dates. Reductions have been made in state appropriations for public programs, including post-secondary education in 1981, 1982, and 1983. It is likely that state resources will continue to be limited.

X As enrollments decline, post-secondary education will have a declining claim on state dollars. As a result, post-secondary education may not be able to compete as successfully as it has in the past with other programs for the now limited state dollars. If the limited dollars available are spread over all existing institutions and programs in the future, the quality of post-secondary education will be eroded.

FINDINGS

1. Current funding policies will not preserve or enhance the quality of post-secondary education in Minnesota.

Current funding policies contain no explicit incentives for the provision of high quality educational services. Lack of incentives may not have adversely affected the quality of post-secondary education in an era of growth. A lack of incentives for quality in an era of contraction, however, could result in an erosion of the quality of post-secondary education.

Post-secondary education in Minnesota plays an important role in the state's economy. A trained workforce is vital to maintain a healthy and growing economy. Without high quality educational services, Minnesota will lose one of its foremost public resources at a time when the state must enhance its competitive position for economic growth. Therefore, it is imperative that the quality of post-secondary education in Minnesota be preserved and, wherever possible, enhanced. This will insure the continued contributions of post-secondary education to improving the health of the state's economy and to the quality of life in Minnesota.

2. Current funding policies and governance structures do not encourage collaboration and coordination between institutions, systems, and sectors.

Current funding policies for post-secondary education contain few incentives for collaboration and coordination in the provision of educational services. Differing funding policies and organizational structures have tended to encourage competition which has further inhibited collaboration. The lack of incentives becomes obvious upon a review of the collaboration and coordination efforts in the state. Although there are many instances of institutions in close geographic proximity, collaborative efforts between these

institutions tend to be only in the form of the joint provision of support services. There are few instances of joint or shared instructional programs.

3. The distinction between the governing and management roles of the lay governing boards and the broad funding and policy roles of the legislature has been blurred.

The Task Force has identified the wide variation among the public post-secondary systems in the roles of the legislature and the governing boards. The State Board for Community Colleges is at one extreme with wide discretion in the governance of its institutions. The State Board for Vocational-Technical Education is at the other extreme with a formula specified in statute and the least discretion in governing its system. This blurring of roles also tends to blur accountability. In an era of declining enrollments and constrained resources, roles could easily become more blurred. Such blurring of roles and accountability is not conducive to effective governance.

4. The bulge funding policy accomplished its objective of reducing state funding requirements for the collegiate systems in a period of increasing enrollments.

The bulge funding policy provided, initially, no state support and later only partial state support for enrollments above a 1977 base in the three collegiate systems. The systems were to provide educational services to the additional students by hiring temporary faculty with the tuition revenue generated by the

students. The objectives of the policy were (1) to reduce state funding requirements in a period of increasing enrollments and (2) to reduce the need for fiscal contraction and layoffs of permanent staff until system enrollments declined below base levels.

The bulge policy accomplished the objective of reducing state funding requirements. Constant dollar state appropriations per student have declined in all three collegiate systems since 1977. The declines range from a high of 20 percent at the University of Minnesota to a low of 11 percent for the State University System. The effects of the bulge policy, however, have been exaggerated by two factors. First, enrollment growth in the State University System and Community College System has been larger than expected. Second, significant funding reductions have occurred in Fiscal Years 1981, 1982, and 1983. If the bulge policy is to achieve the objective of reducing the need for fiscal contraction until enrollments decline below base levels, it must remain in effect.

5. Current funding policies do not consistently encourage innovative resource management.

Current funding policies differ in the extent to which they have encouraged innovative resource management. For example, the University of Minnesota and Community College System receive no special funding for institutional operations. Small or special

institutions are funded out of the base budget for each system. This policy has encouraged the University to establish comprehensive plans and priorities and to make allocation decisions. The State Board for Community Colleges has an internal allocation policy which provides core funding for small institutions. In comparison, the State University System has not had to develop such plans because it has been provided with special funding for small or special institutions. The AVTI system has been placed on a stable funding policy for all institutions. These policies have discouraged effective internal planning and the development of priorities as the basis for budget allocations.

The policy, which requires that unexpended funds revert to the state at the end of each fiscal year, reduces or eliminates incentives for the post-secondary systems to generate savings. In a period of enrollment declines and fiscal constraint, it is essential that the state's post-secondary educational services be provided in the most effective and efficient manner possible. Innovative resource management in the public post-secondary systems could generate significant resources. If all savings generated by such management must revert to the state, however, it is unlikely that significant amounts of funds will be saved.

6. Minnesota public post-secondary systems have been treated inequitably because there is no comprehensive funding policy.

Current funding policies have not been applied equitably to all systems. For example, in the absence of a formal tuition policy, the state has provided different levels of state subsidy to each system. The bulge funding policy was applied to the collegiate institutions and not the AVTIs. The State University System receives special funding for Southwest State University, Metropolitan State University, and Bemidji State University. In comparison, the University of Minnesota receives no special funding for Morris and the community colleges receive no additional funding for small, high-cost institutions. In an era of enrollment and revenue growth, the state could afford special policies for particular systems and institutions. In an era of contraction, the state should not continue such preferential treatment.

7. Current funding policies do not consistently relate funding to levels of enrollment and the costs associated with those levels.

Prior to 1977, the collegiate systems were funded primarily on the basis of enrollments. The bulge funding policy recognized the marginal costs associated with temporary enrollment growth since 1977 and directed the collegiate systems to support the enrollment bulge with tuition revenue only. On the other hand, program

funding for the AVTIs does not address this development or the cost implications of the projected enrollment decline.

8. Current funding policies do not encourage systems to increase their productivity.

There are no explicit incentives in current funding policies for increasing productivity. In fact, the AVTI funding policy includes a disincentive. If an AVTI replaced a faculty member with a more productive alternative technology, the current funding policy would withdraw the funds which supported that faculty member two years later. The funding policies for the collegiate systems are neutral with respect to increasing productivity. In an era of contraction, however, increased productivity is one means systems can use to maintain quality and program breadth.

9. The current AVTI program funding policy is not an educationally or fiscally sound policy in a period of constrained resources and declining enrollments.

Program funding provides few incentives for resource management or coordination with other public institutions because funding levels are essentially stable. The policy is inherently inequitable given current funding policies for the public collegiate systems. Stable funding in a period of enrollment decline and constrained resources is not an educationally or fiscally sound policy.

10. The split budget review and appropriations process for post-secondary education inhibits development of comprehensive policies for the systems of post-secondary education.

The budget review process for post-secondary education is split between collegiate institutions and the AVTIs. While responsibility for recommending collegiate appropriations rests solely with the House Appropriations and the Senate Finance Committees, responsibility for recommending AVTI appropriations rests primarily with the education committees of the House of Representatives and the Senate. This split process has resulted in differential application of funding policies and inhibited the development of comprehensive and equitable funding and tuition policies. The current policy for AVTIs relates funding primarily to program offerings and costs with enrollments as a secondary consideration. The collegiate systems have been funded primarily on the basis of enrollments. The collegiate systems have also been subject to the bulge policy since Fiscal Year 1977 while the AVTIs have not. While the collegiate systems have a long history of tuition charges, AVTI students have only recently been required to pay tuition. AVTI students pay approximately 17 percent of their instructional costs through tuition charges. Students in the collegiate systems, however, provide from 26 to 32 percent of their instructional costs through tuition charges.

11. Tuition is the most powerful finance factor available for changing the state's funding obligation for post-secondary education.

The level of tuition can have a much greater effect on the state funding obligation than the implementation of any alternative funding policy. It would be possible to select the most costly funding option-- program funding--couple it with a slightly higher tuition rate, and still reduce state appropriations for post-secondary education. Implementation of any funding policy, other than average cost funding, under present tuition levels, would cost more than current policies.

RECOMMENDATIONS

To address the concerns identified in its findings, the Task Force makes seven recommendations regarding state policies for post-secondary education.

1. A mechanism to reallocate one percent of all expenditures and all savings in order to encourage improvements in the quality and productivity of post-secondary education should be established.

None of the current funding methods or alternative funding methods examined by the Task Force explicitly encourages quality and increased productivity. Yet these are important goals for post-secondary education. Quality must be achieved and enhanced throughout the total system. Productivity must be increased in a period of declining resources. If staff are reduced and funds for supplies and equipment cut, it will be

imperative for systems and institutions to find ways to stretch limited resources. This is particularly true for small institutions which do not have a large budget base and are operating close to the minimum core program.

To address this concern, the legislature and governor should require each governing board to set aside one percent of its operating budget to support specific program proposals and procedures which will either increase quality or productivity. One percent of operating budgets would amount to \$5 million per year. These funds should be set aside annually and supplemented with budget savings that would otherwise revert to the treasury at the end of the fiscal year. The fund for quality and productivity could be controlled by each governing board and be used for equipment purchases, permanent staffing positions, guest appointments, travel, and staff training. Funds awarded under this proposal could be permanent or temporary. Projects receiving funds should demonstrate through measured evaluations that quality was improved and productivity was enhanced.

2. Greater collaboration and coordination between institutions, systems and sectors must be encouraged.

Collaboration and coordination in the provision of educational services is a primary way to improve the efficiency and effectiveness of the services.

Efficiency and effectiveness are particularly important in a period of limited resources and declining enrollments. Collaboration and coordination need not be limited to post-secondary education. Elementary, secondary, and post-secondary education institutions could benefit from increased cooperation. Consequently, funding policies must provide incentives for increased collaboration and coordination in the provision of educational services.

3. The state should honor the commitment of the bulge funding policy as enrollments decline.

The bulge funding policy originally required the collegiate systems to enroll students beyond a 1977 base level with no additional state funding. The implicit commitment was that no state funds would be withdrawn until enrollments declined below the bulge funding base. Some state funding was provided for a part of bulge enrollments in the State University System and the Community College System. This state funding should be withdrawn on the same basis it was provided as enrollments decline. State funding for base enrollments, however, should not be withdrawn as a result of enrollment declines until enrollments go below the 1977 bulge level. The years in which system enrollments are projected to drop below the bulge base level vary. University of Minnesota enrollments are projected to drop below the bulge enrollment level in

F.Y. 1985. State University System enrollments in the five campuses to which the bulge policy has been applied are projected to drop below their bulge enrollment level in F.Y. 1988. Enrollments in the Community College System are not projected to drop below its bulge enrollment level.

State decisionmakers may wish to implement a new funding policy before all systems' enrollments drop below their respective bulge enrollment levels. In this case, the expenditure base to which the new policy is applied should be adjusted to reflect the effects of the bulge funding policy.

4. The state should adopt a comprehensive cost related tuition policy for post-secondary education and adjust funding for need based financial aid to prevent loss of access by low income students.

The current state tuition policy provides differing percentages of state subsidy to post-secondary systems. This policy clearly does not provide similar rates of subsidy to systems or students. The Task Force recommends that tuition revenue at the system level should be related to the cost of providing instruction. Tuition revenue should constitute a uniform percentage of instructional expenditures in each system. The percentages should be used by the legislature in setting levels of state appropriations. The percentage should not apply to governing boards as they establish tuition rates within their systems.

Such a comprehensive tuition policy could result in increases in tuition rates in some cases. To prevent loss of access to post-secondary education by low income students, the state should adjust funding for need based financial aid.

The amount of state appropriations required is directly related to the levels of expenditures and tuition revenue. Once system expenditure levels are set, tuition revenue becomes a direct offset to state appropriations. This relationship raises several issues in the development and implementation of funding methods for post-secondary education.

If state funds are reduced but expenditure levels maintained, systems will look to higher tuition revenue as the source of additional money. In fact, this trade-off was made in 1982 and 1983 when state revenue did not meet projections. If state revenue continues to lag behind approved expenditures and spending levels are reduced and if further cuts are necessary, the relationship between budgets and revenue should be clarified. It is neither good policy nor fair to continue to ask students to pick up the state's reduced share automatically. A comprehensive statewide tuition policy would alleviate this problem and could be used to specify the funding responsibility of taxpayers and students.

5. The governing boards of the systems must have the maximum amount of responsibility and discretion with respect to policy and allocation decisions regarding their institutions. Legislative involvement in policy and allocation decisions regarding individual institutions should be discouraged.

In its review of current funding policies, the Task Force identified a recent trend toward legislative involvement in policy and allocation decisions regarding individual institutions. The decisions in which the legislature became involved are those typically made by governing boards. The legislative involvement has come through governing board initiative in some instances. An example is legislative involvement in funding and staffing levels for Southwest State University. The legislative involvement has come through legislative initiative in other instances. An example is the special funding provided to Bemidji State University. The ultimate consequence of legislative involvement in governing board decisions is inevitably a diminution of the governing authority of the board and an obfuscation of roles.

In view of the difficult conditions facing post-secondary education, the Task Force feels that governing boards should have maximum amount of discretion in the management of their institutions. It is not likely that the state will have resources sufficient to maintain all post-secondary services at their current levels. The post-secondary governing boards are in the best position

to make judgments regarding the number and type of educational services to be offered by their systems and to manage those systems effectively and to ensure the preservation and enhancement of quality.

6. Post-secondary education appropriations decisions should be unified under one committee in each legislative body.

The Task Force report has identified the dual budget review and appropriations process for post-secondary education that exists in the Minnesota House of Representatives and Senate. The public collegiate systems budget requests are reviewed by the House Appropriations Committee and the Senate Finance Committee. The budget request for area vocational-technical institutes is reviewed by the House Education and Senate Education committees. This procedure has resulted from the fact that the AVTIs are governed by the State Board of Education and locally controlled. They are, however, a post-secondary education system and receive the second largest appropriation of the four public post-secondary education systems.

The divided budget review process for post-secondary education has resulted in inequitable treatment of post-secondary education systems and their students and the implementation of very different funding methods. Resolution of these inequities and the adoption of comprehensive, equitable, and efficient policies could

be facilitated if post-secondary education appropriations decisions were consolidated under one committee in each legislative body.

7. Average cost funding should be the basic funding policy for Minnesota public post-secondary education systems. The policy should:
 - a. buffer funding changes associated with enrollment changes;
 - b. control for differential growth in programs and levels of instruction;
 - c. be applied uniformly to all four public systems and provide no special or separate legislative funding for specific institutions or programs.

Levels of expenditures should be related directly to the volume of activity. Particularly in a period of constrained public resources, state funding for post-secondary education must decline with enrollments. Consequently, an enrollment related funding policy is recommended.

A pure average cost funding policy would relate all funding directly to enrollments. For example, a five percent drop in enrollments would be translated directly into a five percent drop in expenditures. By constraining resources, an average cost policy would encourage resource management. In constraining resources, however, a pure average cost policy would ignore fixed costs, including core staffing and funding for small institutions. A pure average cost funding policy would also have severe impacts on systems with declining enrollments since they would be required to reduce expenditure levels directly in proportion to

enrollment declines. Although funding policies must provide incentives to encourage resource management, a pure average cost funding policy would treat systems too harshly. Consequently, a buffered average cost funding policy has been recommended.

A buffered average cost funding policy would reduce the adverse impacts of a pure average cost funding policy. The policy would be buffered by relating resources to a two-year moving average of full year equivalent enrollments. The average of enrollments in the two years immediately preceding the year being funded would determine funding levels. The lagging of funding changes behind enrollment changes would provide systems and governing boards time to plan the implementation of staffing and funding changes.

The buffered average cost funding policy would control for differing growth in programs and levels of instruction. This is necessary because costs vary significantly by program and level of instruction. The largest differences occur at the University of Minnesota where, for example, costs for graduate instruction in dentistry are 11 times higher than the costs of lower division instruction in the liberal arts. The AVTIs, the state universities and, to a lesser degree, the community colleges also have significant variations in average cost of instruction by program and/or level of instruction. If a system is funded on the basis of

system level average cost but enrollments are declining in the lowest cost programs, the system will be forced to cut expenditures in programs with stable or growing enrollments. To avoid such difficulties, the recommended policy would categorize instructional activities on the basis of (1) level of instruction (lower division, upper division, graduate and professional) and (2) program cost (low cost, medium cost and high cost). Funding for each category would be based on its average costs and full-year equivalent enrollments. Funding for a given year would be based on the prior years' costs adjusted for inflation.

The recommended policy would be a comprehensive funding policy for public post-secondary education in Minnesota. It would be applied to all four public systems uniformly. The policy would provide funds for all institutions in each system. Consequently, no special or separate legislative funding arrangements for specific institutions would be needed. The policy would be used by the governor and legislature to derive system expenditure levels. Governing boards would have discretion in the allocation of funds to their institutions.

The policy would provide funding for instructional activities and their support functions. It would not address funding for the following activities for support attributable to them:

- a. repairs and betterments,
- b. financial aid matching,
- c. separately budget research,
- d. public service,
- e. program development in the Community College System,
- f. learning centers in the Community College System,
and
- g. non-instructional special appropriations for the
University of Minnesota.

It is the judgment of the Task Force that the implementation of these seven recommendations will help ensure the continued quality and vitality of Minnesota's public post-secondary education systems in an era of declining enrollments and constrained resources.

APPENDICES

APPENDIX A: PROJECTED RESOURCE REQUIREMENTS OF CURRENT AND ALTERNATIVE FUNDING POLICIES

This section describes the methodologies, assumptions, and results of the projections of future expenditures, staffing levels, and appropriations for Minnesota's four public systems of post-secondary education.

METHODOLOGIES AND ASSUMPTIONS

Current Funding Policies

Area Vocational-Technical Institutes

The methodology used to simulate future expenditures, staffing levels, and required appropriations for the AVTIs is based on current funding policies and a set of assumptions about the behavior of AVTIs and the revenues provided to AVTIs.

State funding for the AVTIs consists of several categories of aid to which the state appropriates money. AVTIs receive aids based on formulas specified in state statutes and policies used by the State Board for Vocational-Technical Education in allocating funds to the institutes. Instructional aid, the largest category of aid, is allocated on the basis of a formula which takes into account:

1. Average statewide program costs.
2. The number of full-time equivalent licensed instructional faculty in the AVTI.
3. Average staff compensation at an AVTI compared to the average for all AVTIs.
4. Inflation.

5. Changes in enrollments by more than 5 percent in two years.

The other categories of aid are supply aid, support services aid, equipment aid, and repair and betterment aid. The State Board for Vocational-Technical Education is responsible for allocating these aids to the AVTIs. Allocations by the State Board are based on expenditures covered in each category, tuition revenue, the level of available federal aid and, the amount of state appropriations for these aids.

Expenditures in post-secondary institutions are determined by many factors including enrollments, staffing, institutional mission, inflation, and available funds. Since the primary objective of these simulations is to assess the consequences of current state funding policies as enrollments decline, factors other than enrollment changes are held constant in the first set of simulations. Several assumptions are made in order to isolate the effects of enrollment declines. These assumptions may be changed in subsequent simulations of current policies or alternative policies. The assumptions for the AVTIs include:

1. All 33 AVTIs will continue to operate with no physical plant expansion or contraction.
2. Each AVTI will continue to offer its current mix of programs.
3. The number of instructional staff in each AVTI will not change unless enrollments in an AVTI decrease or increase sufficiently beyond the 5 percent enrollment buffer to result in a decrease or increase in the AVTI's instructional aid equal to or greater than the AVTI's average program cost.
4. Instructional supply expenditures will vary proportionately with enrollments.

5. Non-instructional supply expenditures, support service expenditures, and capital expenditures will be held fixed at Fiscal Year 1980 levels in constant dollar simulations.
6. Total revenue will equal total expenditures. Thus, revenue from all sources will increase at the same rate as expenditures.
7. Federal revenue, sales revenue, and revenue categorized as other will remain fixed at Fiscal Year 1980 levels in the constant dollar simulations.
8. Tuition revenue will vary proportionately with enrollments.

Enrollment projections from the Higher Education Coordinating Board and expenditure and revenue data from the State Department of Education are used in preparing these simulations. Expenditures, tuition revenue, and state appropriations were adjusted to reflect the changes in Fiscal Year 1982 and 1983 resulting from the state's fiscal crisis. It was assumed that the changes are permanent. Due to a lack of information on the exact effect of the funding reductions on staffing, no adjustments have been made in staffing levels. Finally, the most current enrollment projections have been included in the simulations of current funding policies.

Community College System

The methodology used to simulate future expenditures, staffing levels, and required appropriations for the community colleges is based on current legislative funding policies, the allocation procedures used by the State Board for Community

Colleges, and a set of assumptions about (1) the behavior of community colleges and (2) the revenues received by community colleges.

Historically, staffing of the Community College System has been enrollment related. Since Fiscal Year 1974, funding has been based on an enrollment level which has been smaller than actual enrollments. Thus, the Community College System has received state funds and tuition revenue for enrollments up to the legislative enrollment base and tuition revenue only for enrollments above that base. This policy, known as the bulge policy, was modified by the 1981 Legislature due to unanticipated enrollment increases. The system now receives state funding and tuition revenue for enrollments up to a base of 20,235 full year equivalent (FYE). Enrollments from 20,236 FYE through 21,247 FYE are supported by tuition revenue only. Partial state funding of \$533 per FYE and tuition revenue support enrollments from 21,248 FYE through 22,864 FYE. Enrollments above 22,864 FYE are supported by tuition revenue only.

The Community College System receives state funds through seven accounts. The Maintenance and Equipment account is the largest and covers most operating expenditures of the colleges and the system office. The other accounts include the Repair and Betterment account, the Learning Center account, the Program Development account, the Student Loan account, the Work-Study account, and the Contingency account. The State Board for Community Colleges allocates funds from these accounts to the

colleges. The allocations to the colleges are based on enrollments, the volume of student activities, the number and type of occupational programs, and the size of the physical plant.

Expenditures in post-secondary institutions are determined by many factors including enrollments, staffing, institutional mission, inflation, and available funds. Since the primary objective of these simulations is to assess the consequences of current state funding policies as enrollments decline, factors other than enrollment changes are held constant in the first set of simulations. Several assumptions are made in order to isolate the effects of enrollment declines. These assumptions may be changed in subsequent simulations of current policies or alternative policies.

The assumptions for the Community College System include:

1. All 18 community college campuses will continue to operate with no expansion or contraction of physical plant.
2. Each community college will continue to offer approximately the same proportion of academic and occupational instruction as it did in Fiscal Year 1980.
3. Although Community College System expenditures, as a whole, are related to enrollments, expenditures and staffing in certain categories will remain at Fiscal Year 1980 levels. The categories include:
 - a. community education,
 - b. academic and administrative data processing,
 - c. financial aid,
 - d. student help, and
 - e. physical plant operations.
4. Total revenue will equal total expenditures. Thus, revenue from all sources will be available in sufficient amounts to match the projected expenditure levels.
5. Fee revenue will remain at Fiscal Year 1980 levels.
6. Tuition revenue will vary directly with enrollments.

Enrollment projections from the Higher Education Coordinating Board and data on expenditure, staffing, and revenue from the Community College System office were used in preparing these simulations. However, expenditures, tuition revenue, and state appropriations were adjusted to reflect the changes in Fiscal Years 1982 and 1983 resulting from the state's fiscal crisis. It was assumed that the changes are permanent. Due to a lack of information on the exact effect of the funding reductions on staffing, no adjustments have been made in staffing levels. Finally, the most current enrollment projections have been included in the simulations of current funding policies. Changes in staffing or expenditures resulting from the reorganization of five northeastern Minnesota community colleges are not included in the simulations.

State University System

The methodology used to simulate future expenditures, staffing levels, and required appropriations for the state universities is based on current legislative funding policies, the allocation procedures used by the State University Board, and a set of assumptions about (1) the behavior of state universities and (2) the revenues received by state universities.

Historically, staffing and, consequently, a majority of funding for the State University System have been enrollment related. However, since Fiscal Year 1977, state funding for Bemidji, Mankato, Moorhead, St. Cloud, and Winona State Universities has not been provided for enrollments above 30,005

full-year equivalent (FYE). Enrollments above this base at the five universities have been funded by tuition revenue only. This policy, known as the bulge policy, was modified by the 1981 Legislature due to unanticipated enrollment increases. The system now receives state funding and tuition revenue for enrollments at the five universities up to a base of 30,005 FYE. Enrollments from 30,006 FYE through 31,505 FYE are supported by tuition revenue only. Partial state funding of \$653 per FYE and tuition revenue support enrollments from 31,506 FYE through 33,775 FYE in Fiscal Year 1982 and 31,506 through 34,216 FYE for Fiscal Year 1983. Enrollments at the five universities above 33,775 FYE in Fiscal Year 1982 and 34,216 FYE in Fiscal Year 1983 are supported by tuition revenue only.

Southwest and Metropolitan State Universities have been funded separately by the state. Because of relatively low enrollment levels and enrollment fluctuations, Southwest and Metropolitan have been provided a fixed staff and a basic budget which do not vary within broad enrollment ranges.

The State University System receives state funds through six accounts. The Maintenance and Equipment account is the largest and covers most operating expenditures of the universities and the system office. The other accounts include the Repairs and Betterment account, the Open Appropriations account, the Federal Student Loan State Matching account, the Federal Work Study State Matching account, and the State University Board Contingent account. The State University Board allocates funds from these accounts to the universities and the system office. The

allocations to the universities are based on enrollments, program offerings, size of physical plant, and actual expenditures in certain categories.

Expenditures in post-secondary institutions are determined by many factors including enrollments, staffing, institutional mission, inflation, and available funds. Since the primary objective of these simulations is to assess the consequences of current state funding policies as enrollments decline, factors other than enrollment changes are held constant in the first set of simulations. Several assumptions are made in order to isolate the effects of enrollment declines. These assumptions may be changed in subsequent simulations of current policies or alternative policies.

The assumptions for the State University System include:

1. All seven state universities will continue to operate with no expansion or contraction of physical plant.
2. Each state university will continue to offer approximately the same mix of academic programs as it did in Fiscal Year 1980.
3. Although State University System expenditures, as a whole, are related to enrollments, expenditures and staffing in certain categories will remain at Fiscal Year 1980 levels. The categories include:
 - a. summer session,
 - b. public service,
 - c. academic and administrative data processing,
 - d. financial aid,
 - e. student help,
 - f. physical plant operations,
 - g. separately budgeted research,
 - h. library acquisitions, and
 - i. supplemental staffing and funding for high-cost programs.
4. Total revenue will equal total expenditures. Thus, revenue from all sources will be available in sufficient amounts to match the projected expenditure levels.

5. Fee revenue will remain at Fiscal Year 1980 levels.

6. Tuition revenue will vary directly with enrollments.

Enrollment projections from the Higher Education Coordinating Board and data on expenditure, staffing, and revenue from the State University System office are used in preparing these simulations. The simulations are based on Fiscal Year 1980 expenditure, staffing, and revenue data. Expenditures, tuition revenue, and state appropriations were adjusted to reflect the changes in Fiscal Years 1982 and 1983 resulting from the state's fiscal crisis. It was assumed that the changes are permanent. Due to a lack of information on the exact effect of the funding reductions on staffing, no adjustments have been made in staffing levels.

University of Minnesota

The methodology used to simulate future expenditures, staffing levels, and required appropriations for the University of Minnesota is based on legislative funding policies and a set of assumptions about (1) the allocation policies used by the Board of Regents, (2) the behavior of the University of Minnesota, and (3) the revenues received by the University of Minnesota.

Historically, staffing and, consequently, a majority of funding for instructional activities at the University of Minnesota have been related to enrollment. For purposes of the enrollment bulge funding policy, the base enrollment level for the University of Minnesota is set at 48,742 full-year equiv-

alents (FYE). Enrollments above this level are to be funded by tuition revenue only. However, FYE enrollment at the University of Minnesota did not exceed that base level until Fiscal Year 1981. Further, the University was not allowed to retain all of the bulge tuition when the bulge enrollments materialized. Since University of Minnesota FYE enrollments are not projected to exceed 105 percent of the bulge enrollment base in the current biennium, no partial state support is provided for bulge enrollments.

The University of Minnesota receives two types of state appropriations. The Operations and Maintenance (O&M) appropriation is the largest and funds most of the instructional and support activities. State special appropriations are made for specific instruction, research, or public service activities. The O&M appropriations and tuition revenue are allocated in an annual internal budget which is developed by the University administration through a series of budget hearings. The allocations are based on legislative intent, student demand, and the decisions and principles developed in the long-term planning process. The final step in the allocation process is the review, modification, and approval of the internal budget by the Board of Regents.

Expenditures in post-secondary institutions are determined by many factors including enrollments, staffing, institutional mission, inflation, and available funds. A large portion of expenditures at the University of Minnesota is devoted to its research and public service missions. The expenditures,

staffing, and revenues simulated here are only those in regular instruction. Expenditures, staffing, and revenues for summer session and extension instruction; for separately budgeted research and public service; and for the support programs attributable to these activities are not simulated.

Since the primary objective of these simulations is to assess the consequences of current state funding policies for instruction as enrollments decline, factors other than enrollment changes are held constant in the first set of simulations. Several assumptions are made in order to isolate the effects of enrollment declines. These assumptions may be changed in subsequent simulations of current policies or alternative policies.

The assumptions for the University of Minnesota include:

1. All five campuses of the University of Minnesota will continue to operate with no physical plant expansion or contraction.
2. Each unit and campus will continue to offer approximately the same mix of programs as it did in Fiscal Year 1980.
3. Although instructional expenditures, as a whole, are related to enrollments, expenditures and staffing for certain activities will remain at their Fiscal Year 1980 levels. The activities include:
 - a. academic and administrative data processing,
 - b. library acquisitions,
 - c. physical plant operations
4. Total revenue will equal total expenditures. Thus, revenue from all sources will be available in sufficient amounts to match the projected expenditure levels.
5. Other revenue, which includes indirect cost recoveries and other dedicated income, will remain at Fiscal Year 1980 levels.

6. Tuition revenue will vary directly with enrollments within each college and campus.
7. Allocations to colleges and campuses will be based on their Fiscal Year 1980 cost per student.

The FYE enrollments used in the simulations are those projected by the University of Minnesota Management Planning and Information Services (MPIS). However, MPIS only projects enrollments for five years beyond the current year. Enrollment levels beyond Fiscal Year 1986 are based on the MPIS Fiscal Year 1986 projection and the percent change in the HECB projected FYE enrollments. MPIS expenditure, staffing, and revenue data for the University of Minnesota are used in preparing the simulations. The simulations are based on Fiscal Year 1980 expenditure, staffing, and revenue data. Projected expenditures and revenues are adjusted to reflect the effects of funding reductions and tuition increases in the current biennium. Staffing levels, however, are not adjusted. Expenditures, staffing, and revenues are simulated at the campus level for the coordinate campuses at Duluth, Morris, Crookston, and Waseca. Due to its size and complexity, simulations for the Twin Cities campus are prepared for each of the following units:

1. biological sciences,
2. health sciences,
3. law,
4. management,
5. veterinary medicine, and
6. all colleges which admit freshmen.

Alternative Funding Policies

The simulations of alternative funding policies were based on the same data as were the simulations of current policies. The policies were implemented in the collegiate systems after each system's projected enrollments went below the F.Y. 1977 "bulge" enrollment base. When system enrollments do go below the base, the system theoretically receives full state funding for all enrollments. The full state funding, however, has been reduced by the funding cuts. The first fiscal year that the system was below the enrollment base became the base year for the alternative funding policy. The base year for the AVTIs was the year of peak system enrollment.

Average costs and staffing ratios were calculated for each institution (each college at the Twin Cities campus of the University of Minnesota) in the base year. Each institution's average cost and staffing ratios were multiplied by its full-year equivalent or average daily membership enrollment in subsequent years to determine expenditure and staffing levels.

The program funding alternative consisted of applying the AVTI funding policies to the collegiate systems. Funding for instructional programs was based on the number of faculty rather than the number of students. However, the instructional funding varied with changes in enrollments of more than five percent over two years. Funding for instructional supplies was varied directly with enrollments. Funding for support programs was held fixed.

The fixed and variable cost funding policy consisted of dividing all costs and staff in an institution into those which are fixed and those which are variable. The fixed costs and staff remained at their level in the base year. The variable costs and staff varied directly with enrollments after the base year.

The fixed core funding policy consisted of holding all staffing and expenditure levels in an institutions at a minimum level regardless of how low enrollments decline. This policy was simulated in the Community College System. The policy is part of current policies for the State University System.

Two tuition policies were used to calculate tuition revenue under the alternative funding policies. The first tuition option, labeled current tuition policy, consisted of holding tuition rates at constant dollar 1983 levels. The alternative tuition policy established tuition revenue at 33.33 percent (16.67 percent for the AVTIs) of instructional expenditures. This tuition policy was implemented in F.Y. 1984 at the college level for the University of Minnesota and at the system level for the AVTIs, community colleges, and state universities.

PROJECTED RESOURCE REQUIREMENTS OF CURRENT FUNDING POLICIES

Area Vocational-Technical Institutes

The current AVTI funding policy provides relatively stable levels of funding for post-secondary vocational education. The object is to fund programs while reducing the effect of changing levels of enrollments. Using this method, projected resources

for AVTIs would not decrease proportionately with projected enrollments. The data in Table 1 through 3 illustrate the consequences. The selection of institutions is intended to compare the effects on a large institution, St. Cloud AVTI, with projected enrollment growth to a small institution, Canby AVTI, with projected enrollment decline.

During the 1980s and 1990s, AVTI instructional staff on a statewide basis would decrease at a slower rate than enrollments. As a result, there would be a richer ratio of students to instructional staff--14.2 students for every staff member in 1982, dropping to 12.5 students for every staff in 2000. Funds per student would decline initially due to funding reductions and then increase as enrollments decline. In constant Fiscal Year 1980 dollars, net revenue per student for AVTI operations and state appropriations per student would rise 5 and 3 percent respectively above their 1980 levels. At the same time, lower enrollments would produce less tuition revenue, leading to a decline in tuition revenue as a proportion of operating revenue. Tuition revenue will increase as a percent of operating revenue in F.Y. 1983 because of increases in tuition rates in response to funding reductions in the 1981-83 biennium. Lower enrollments would produce less tuition revenue leading to a decline in tuition revenue as a percent of operating revenue.

The effect of the AVTI funding policy would vary by institution. According to projections, St. Cloud AVTI would experience enrollment increases during the 1980s before a decrease would occur during the 1990s. Stable staffing combined with this

TABLE 1

PROJECTED AVERAGE DAILY MEMBERSHIP ENROLLMENTS, STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO,
NET EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
AREA VOCATIONAL-TECHNICAL INSTITUTES

Fiscal Year	Average Daily Membership Enrollments (ADM)	ADM as a Percent of F.Y. 1980	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	32,264	101.72%	14.20:1	\$3,379	98.33%	\$2,460	99.55%	10.57%
1983	32,877	103.66	14.40:1	3,175	92.40	2,208	89.36	13.10
1984	32,821	103.48	14.42:1	3,171	92.27	2,203	89.14	13.11
1986	32,031	100.99	14.13:1	3,222	93.76	2,241	90.67	12.90
1988	31,658	99.81	13.97:1	3,257	94.77	2,269	91.82	12.76
1990	31,907	100.60	14.08:1	3,236	94.15	2,252	91.14	12.84
1992	30,662	96.67	13.55:1	3,343	97.27	2,336	94.53	12.43
1994	28,626	90.25	12.87:1	3,516	102.31	2,468	99.84	11.82
1996	28,101	88.60	12.68:1	3,570	103.88	2,510	101.54	11.64
1998	27,961	88.16	12.62:1	3,587	104.38	2,524	102.12	11.58
2000	27,473	86.62	12.45:1	3,632	105.69	2,557	103.47	11.44

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

TABLE 2

PROJECTED AVERAGE DAILY MEMBERSHIP ENROLLMENTS, STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO,
NET EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
ST. CLOUD AVTI

Fiscal Year	Average Daily Membership Enrollments (ADM)	ADM as a Percent of F.Y. 1980	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	1,635	107.42%	16.61:1	\$2,512	94.57%	\$1,873	89.82%	13.56%
1983	1,679	110.32	16.89:1	2,355	88.67	1,668	80.01	16.84
1984	1,687	110.84	17.14:1	2,331	87.77	1,646	78.92	17.01
1986	1,713	112.55	17.41:1	2,301	86.63	1,620	77.68	17.23
1988	1,783	117.15	18.12:1	2,224	83.72	1,554	74.51	17.83
1990	1,855	121.88	18.85:1	2,150	80.96	1,491	71.51	18.44
1992	1,746	114.72	17.74:1	2,254	84.87	1,579	75.70	17.59
1994	1,646	108.15	16.73:1	2,372	89.33	1,680	80.56	16.71
1996	1,708	112.22	17.36:1	2,307	86.84	1,625	77.92	17.19
1998	1,761	115.70	17.90:1	2,247	84.61	1,574	75.48	17.64
2000	1,647	108.21	16.91:1	2,363	88.96	1,670	80.10	16.78

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

TABLE 3

PROJECTED AVERAGE DAILY MEMBERSHIP ENROLLMENTS, STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO,
NET EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
CANBY AVTI

Fiscal Year	Average Daily Membership Enrollments (ADM)	ADM as a Percent of F.Y. 1980	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	401	87.75%	12.45:1	\$3,584	107.43%	\$2,648	87.47%	11.52%
1983	386	84.46	11.63:1	3,582	107.36	2,557	84.48	13.43
1984	374	81.84	11.61:1	3,611	108.24	2,569	84.87	13.32
1986	337	73.74	10.80:1	3,894	116.71	2,790	92.17	12.35
1988	316	69.15	10.13:1	4,127	123.70	2,982	98.51	11.65
1990	318	69.58	10.19:1	4,126	123.67	2,985	98.62	11.66
1992	302	66.08	9.68:1	4,315	129.33	3,139	103.70	11.15
1994	295	64.55	9.46:1	4,405	132.03	3,212	106.13	10.92
1996	305	66.74	9.78:1	4,279	128.24	3,109	102.73	11.24
1998	320	70.02	10.26:1	4,104	123.00	2,967	98.01	11.72
2000	291	63.68	9.64:1	4,380	131.29	3,178	105.00	10.98

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

enrollment pattern would cause increases in the staffing ratio in the 1980s and declines in the ratio in the 1990s at St. Cloud AVTI. Because of the funding reductions, net revenues and state appropriations per student will decrease for several years and then rise as enrollments decline. By Fiscal Year 1994, however, declining enrollments would result in net revenues per student and state appropriations per student rising to 80 percent of Fiscal Year 1980 levels. Tuition revenue as a percent of operating expenditures increases as enrollments increase.

Canby AVTI, in contrast to St. Cloud AVTI, would experience considerable enrollment decline over the entire period. By Fiscal Year 1994, there would be a much richer ratio of students to instructional staff, 9.5 students for every staff compared to 12.5 students for every staff in the early 1980s. Net revenues per student and state appropriations per student would rise 31 percent and 5 percent respectively over Fiscal Year 1980 levels.

On a per student basis, Canby AVTI would be almost twice as well off as St. Cloud AVTI. Canby would have a doubly rich ratio of students to staff, 9.5:1 compared to 16.7:1 at St. Cloud. Canby would receive nearly twice as much net revenue and state appropriations per student than St. Cloud would. Finally, Canby students would bear a significantly smaller share of institutional costs through tuition than would their counterparts at St. Cloud, 10.9 percent compared to 16.7 percent in Fiscal Year 1994.

Community Colleges

Historically, funding for community colleges has been related to enrollments. Until Fiscal Year 1977, the legislature made appropriations based primarily on anticipated need for personnel in the system. The number of faculty and staff positions reflected a specified ratio of students to staff. Appropriations for many non-personnel items reflected historical expenditure patterns not based on enrollments. Upon initiation of the bulge policy, the legislature froze enrollment-related appropriations at 1977 levels. In the event of declines in enrollments below 1977 levels, appropriations would revert to the earlier method. Within the system, allocations to individual institutions reflect some economies of size. The selection of institutions in Tables 5 and 6 is intended to compare the effects of current funding methods of Anoka-Ramsey Community College, a large institution, and Rainy River Community College, a small institution.¹

The commitment of resources to the community colleges would be expected to respond to declining enrollments. This, to a degree, is the case. As Table 4 shows, the student faculty staffing ratio would decrease slightly with declining enrollments. This would occur because community college enrollments would remain close to Fiscal Year 1977, or pre-bulge levels. Losses in staffing would be limited to those resulting from the loss of bulge tuition revenue. Funding reductions in the 1981-83

¹ Rainy River Community College has since become a campus of Arrowhead Community College.

TABLE 4

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENTS, STUDENT FACULTY STAFFING RATIO,
EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
COMMUNITY COLLEGE SYSTEM

<u>Fiscal Year</u>	<u>Full-Year Equivalent Enrollments (FYE)</u>	<u>FYE as a Percent of F.Y. 1980</u>	<u>Student Faculty Staffing Ratio²</u>	<u>Maintenance and Equipment Expenditures (M & E)/ FYE</u>	<u>M & E/FYE as a Percent of F.Y. 1980</u>	<u>State Appropriations/ FYE</u>	<u>State Appropriations/ as a Percent of F.Y. 1980</u>	<u>Tuition Revenue as a Percent of Net M & E Expenditures</u>
1982	23,615	110.08%	18.96:1	\$2,162	92.28%	\$1,450	88.35%	25.60%
1983	23,672	110.34	18.97:1	2,102	89.73	1,347	82.08	28.30
1984	23,586	109.94	18.96:1	2,108	89.97	1,353	82.41	28.22
1986	22,760	106.09	18.82:1	2,165	92.43	1,407	85.70	27.44
1988	22,499	104.87	18.77:1	2,176	92.87	1,416	86.26	27.30
1990	22,931	106.88	18.84:1	2,146	91.62	1,389	84.60	27.69
1992	22,111	103.06	18.69:1	2,208	94.25	1,446	88.12	26.89
1994	20,846	97.17	18.45:1	2,283	97.45	1,515	92.30	25.97
1996	20,841	97.14	18.45:1	2,283	97.47	1,515	92.32	25.97
1998	20,851	97.19	18.46:1	2,282	97.43	1,515	92.27	25.98
2000	20,983	97.80	18.48:1	2,271	96.96	1,504	91.64	26.11

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

TABLE 5

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENTS, STUDENT FACULTY STAFFING RATIO,
EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
ANOKA-RAMSEY COMMUNITY COLLEGE

<u>Fiscal Year</u>	<u>Full-Year Equivalent Enrollments (FYE)</u>	<u>FYE as a Percent of F.Y. 1980</u>	<u>Student Faculty Staffing Ratio²</u>	<u>Maintenance and Equipment Expenditures (M & E)/ FYE</u>	<u>M & E/FYE as a Percent of F.Y. 1980</u>	<u>State Appropriations/ FYE</u>	<u>State Appropriations/ FYE as a Percent of F.Y. 1980</u>	<u>Tuition Revenue as a Percent of Net M & E Expenditures</u>
1982	2,179	111.06%	19.64:1	\$1,880	96.40%	\$1,191	93.60%	29.60%
1983	2,144	109.28	20.20:1	1,787	91.64	1,053	82.79	33.53
1984	2,154	109.79	20.65:1	1,755	89.99	1,022	80.29	34.18
1986	2,146	109.38	20.78:1	1,779	91.22	1,045	82.15	33.70
1988	2,160	110.09	20.68:1	1,793	91.91	1,059	83.25	33.43
1990	2,191	111.67	20.63:1	1,779	91.23	1,047	82.29	33.69
1992	2,136	108.87	20.72:1	1,809	92.73	1,074	84.43	33.12
1994	2,055	104.74	20.51:1	1,832	93.92	1,095	86.02	32.68
1996	2,037	103.82	20.29:1	1,852	94.96	1,114	87.56	32.30
1998	2,021	103.01	20.20:1	1,860	95.36	1,121	88.13	32.16
2000	2,032	103.57	20.45:1	1,835	94.07	1,097	86.18	32.62

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

TABLE 6

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENTS, STUDENT FACULTY STAFFING RATIO,
EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
RAINY RIVER COMMUNITY COLLEGE

Fiscal Year	Full-Year Equivalent Enrollments (FYE)	FYE as a Percent of F.Y. 1980	Student Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/FYE	M & E/FYE as a Percent of F.Y. 1980	State Appropriations/FYE	State Appropriations/FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	332	100.00%	12.52:1	\$3,359	104.49%	\$2,684	104.88%	16.25%
1983	325	97.89	12.66:1	3,264	101.54	2,544	99.41	17.95
1984	325	97.89	12.86:1	3,233	100.58	2,514	98.21	18.13
1986	309	93.07	12.68:1	3,354	104.34	2,631	102.81	17.46
1988	302	90.96	12.54:1	3,416	106.26	2,692	105.16	17.13
1990	308	92.77	12.61:1	3,364	104.64	2,641	103.17	17.41
1992	303	91.27	12.72:1	3,399	105.73	2,675	104.50	17.22
1994	286	86.14	12.43:1	3,578	111.31	2,850	111.36	16.34
1996	280	84.34	12.44:1	3,597	111.90	2,868	112.04	16.25
1998	281	84.64	12.46:1	3,585	111.53	2,856	111.59	16.30
2000	276	83.13	12.00:1	3,695	114.95	2,965	115.83	15.81

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

biennium will result in declines in constant dollar operating expenditures and state appropriations per student to 89.7 and 82.1 percent respectively of their 1980 levels in 1983. Enrollment declines that are projected by 1996 would result in an increase in operating expenditures and state appropriations per student to 97.5 and 92.3 percent respectively of their 1980 levels. Tuition revenue as a percent of operating expenditures increases in 1983 as a result of tuition rate increases and declines as enrollments decline.

Continuation of current funding policies would maintain or reinforce contrasting financial patterns among institutions. Rainy River Community College, a small institution projected to experience consistent and proportionally large decreases in enrollment, would receive greater resources per student than Anoka-Ramsey Community College, a large institution with fluctuating and slightly declining enrollments. Staffing at Rainy River would be much richer with one staff for every 12 students compared to Anoka-Ramsey with one staff for every 20 students by Fiscal Year 1996. Operating expenditures per student at Rainy River would be almost twice that at Anoka-Ramsey. At the same time, students at Rainy River would pay for 16.3 percent of their institution's operating expenditures while their counterparts at Anoka-Ramsey would bear 32.3 percent of operating expenditures through tuition. Compared to 1980 levels, increases in operating expenditures and state appropriations per student at Rainy River would be 14.9 percent and 15.8 percent respectively. At Anoka-

Ramsey, decreases would occur, -5.9 percent in operating expenditures per student and -13.8 percent in state appropriations per student.

State Universities

In two major respects, state university funding is similar to community college funding. State appropriations historically have been related to staffing requirements as calculated with student-staffing ratios. Since Fiscal Year 1977, state appropriations based on enrollments have been frozen, as tuition covers the cost of increased enrollments under the bulge policy.

There are two major differences in funding, however. First, the legislature provides separate funding for two state universities--Southwest State University and Metropolitan State University. Second, the State University System allocates instructional resources to each institution equally on the basis of enrollment. Small state universities, such as Bemidji and Winona, receive the same amount of resources per student as the larger state universities. There are no explicitly recognized economies of size.

As a result of bulge funding through tuition only and of core funding for Southwest State University and Metropolitan State University, expenditures per FYE for the State University System would not decline proportionately with enrollments. Declines in resources, however, would accelerate as system enrollments drop below Fiscal Year 1977 levels. At that point, state funding again would vary more directly with enrollment.

Results of projections appear in Tables 7 through 9. By Fiscal Year 1996, the system would have a slightly richer ratio of students to staff, as there will be one staff for fewer than 17 students. Operating expenditures per student will decline 5.9 percent and state appropriations per student will decline by 13.8 percent over 1980 levels by 1983 due to funding reductions. As system enrollments decline, operating expenditures per student would increase 12.9 percent and state appropriations would increase 16.6 percent over Fiscal Year 1980 levels. Tuition revenue would increase to 29.3 percent of operating expenditures by 1983 as a result of tuition rate increases and would decline as enrollments decline.

The effects of regular state university funding policies at most campuses would contrast dramatically with the effects of core funding at Southwest State University. For example, Bemidji State University, a small, regularly funded institution, would experience significant decreases in enrollment and significant decreases in resources. There would be a slightly richer ratio of students to staff during the period of enrollment declines. Compared to Fiscal Year 1980 levels, operating expenditures per student would increase 13.2 percent and state appropriations per student would increase 11.2 percent by Fiscal Year 1996.

Southwest State University would experience a relatively greater decrease in enrollment than Bemidji State University. However, Southwest's staffing levels would remain virtually unchanged. This would result in one staff for every nine students, almost twice as rich as Bemidji's ratio, by Fiscal Year

TABLE 7

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENTS, STUDENT FACULTY STAFFING RATIO,
EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
STATE UNIVERSITY SYSTEM

<u>Fiscal Year</u>	<u>Full-Year Equivalent Enrollments (FYE)</u>	<u>FYE as a Percent of F.Y. 1980</u>	<u>Student/Faculty Staffing Ratio²</u>	<u>Maintenance and Equipment Expenditures (M & E)/FYE</u>	<u>M & E/FYE as a Percent of F.Y. 1980</u>	<u>State Appropriations/FYE</u>	<u>State Appropriations/FYE as a Percent of F.Y. 1980</u>	<u>Tuition Revenue as a Percent of M & E Expenditures</u>
1982	36,639	105.46%	18.30:1	\$2,611	95.34%	\$1,883	92.18%	25.60%
1983	36,481	105.01	18.19:1	2,576	94.06	1,761	86.24	29.30
1984	35,011	100.78	17.58:1	2,655	96.95	1,837	89.93	28.47
1986	32,679	94.06	17.22:1	2,765	100.98	1,942	95.10	27.35
1988	30,849	88.80	17.04:1	2,837	103.61	2,010	98.41	26.66
1990	30,640	88.20	17.03:1	2,845	103.90	2,018	98.79	26.58
1992	30,121	86.70	17.00:1	2,865	104.62	2,036	99.70	26.39
1994	28,114	80.92	16.91:1	2,944	107.49	2,109	103.27	25.71
1996	27,690	79.70	16.89:1	2,962	108.15	2,126	104.10	25.55
1998	28,575	82.25	16.94:1	2,924	106.78	2,092	102.42	25.85
2000	28,939	83.30	16.93:1	2,912	106.35	2,081	101.88	25.96

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional faculty positions and program supplement unclassified positions.

TABLE 8

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENTS, STUDENT FACULTY STAFFING RATIO,
EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
BEMIDJI STATE UNIVERSITY

Fiscal Year	Full-Year Equivalent Enrollments (FYE)	FYE as a Percent of F.Y. 1980	Student/Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/FYE	M & E/FYE as a Percent of F.Y. 1980	State Appropriations/FYE	State Appropriations/FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	4,080	98.36%	18.40:1	\$2,846	100.92%	\$2,166	99.46%	23.50%
1983	3,960	95.47	18.35:1	2,831	100.41	2,065	94.81	26.66
1984	3,853	92.89	17.71:1	2,859	101.38	2,092	96.06	26.41
1986	3,598	86.74	17.35:1	2,962	105.06	2,195	100.79	25.48
1988	3,349	80.74	17.14:1	3,059	108.51	2,291	105.20	24.67
1990	3,312	79.85	17.13:1	3,073	109.01	2,305	105.84	24.56
1992	3,241	78.13	17.11:1	3,101	109.97	2,332	107.08	24.34
1994	3,054	73.63	17.08:1	3,177	112.69	2,407	110.56	23.76
1996	3,023	72.88	17.08:1	3,191	113.19	2,421	111.20	23.65
1998	3,122	75.27	17.10:1	3,149	111.68	2,379	109.27	23.97
2000	3,154	76.04	17.10:1	3,136	111.21	2,366	108.67	24.07

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional faculty positions and program supplement unclassified positions.

TABLE 9

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENTS, STUDENT FACULTY STAFFING RATIO,
EXPENDITURES, AND STATE APPROPRIATIONS UNDER CURRENT FUNDING POLICIES
IN CONSTANT DOLLARS¹
F.Y. 1982 - F.Y. 2000
SOUTHWEST STATE UNIVERSITY

<u>Fiscal Year</u>	<u>Full-Year Equivalent Enrollments (FYE)</u>	<u>FYE as a Percent of F.Y. 1980</u>	<u>Student/Faculty Staffing Ratio²</u>	<u>Maintenance and Equipment Expenditures (M & E)/FYE</u>	<u>M & E/FYE as a Percent of F.Y. 1980</u>	<u>State Appropriations/ FYE</u>	<u>State Appropriations/ as a Percent of F.Y. 1980</u>	<u>Tuition Revenue as a Percent of M & E Expenditures</u>
1982	1,696	96.31%	15.87:1	\$3,624	101.37%	\$2,968	100.41%	17.86%
1983	1,543	87.62	14.44:1	3,897	108.99	3,156	106.77	18.76
1984	1,442	81.89	13.49:1	4,168	116.56	3,426	115.91	17.54
1986	1,245	70.70	11.65:1	4,823	134.88	4,079	138.01	15.16
1988	1,174	66.67	11.05:1	5,092	142.42	4,348	147.11	14.35
1990	1,156	65.64	10.88:1	5,171	144.62	4,427	149.77	14.13
1992	1,122	63.71	10.56:1	5,327	148.98	4,582	155.03	13.72
1994	1,060	60.19	9.98:1	5,637	157.66	4,892	165.50	12.97
1996	1,047	59.45	9.85:1	5,707	159.61	4,961	167.85	12.81
1998	1,080	61.33	10.16:1	5,533	154.75	4,788	161.99	13.21
2000	1,047	59.45	9.85:1	5,707	159.60	4,961	167.84	12.81

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional faculty positions and program supplement unclassified positions.

1996. At the same time, Southwest would have increases in operating expenditures per student and state appropriations per student of 59.6 percent and 67.9 percent respectively over Fiscal Year 1980 levels. These are well above the increases at Bemidji and the system as a whole.

University of Minnesota

The University of Minnesota, like the community colleges and the state universities, has had enrollment-related funding. Until 1977, the University of Minnesota received state appropriations, in large part, on the basis of enrollments. Since the adoption of the bulge policy, the University has had to depend on tuition revenue to cover the costs generated by enrollments over 1977 levels.

The University of Minnesota is unlike the two other public collegiate systems in several ways. It has adopted no formal procedure or mechanism for allocating instructional resources to individual campuses and major instructional units, though in practice enrollments are one of the bases for internal allocations and reallocations. Moreover, the University has no provision for core funding which assures certain minimal levels of support for small campuses. This is in contrast to the Community College System which has an internal core funding mechanism and the State University System which receives special appropriations for Southwest State and Metropolitan State. The effects of funding policies for the University of Minnesota appear in Tables

10 through 12 which allow comparison of projected resource allocation at the large Twin Cities campus with the allocations to the University of Minnesota-Morris, a small coordinate campus.

Because of enrollment-related funding, instructional resources for the University of Minnesota would decline closely in proportion to enrollments.² This is evident in Table 10 which shows relatively more stable ratios of students to instructional staff as enrollments decline. Constant dollar instructional expenditures per student would decline to 91.5 percent of 1980 levels in 1983 due to budget reductions and rise to 2.8 percent above 1980 levels by 1996 as enrollments decline. Similarly, state appropriations per student would decline to 82.4 percent of 1980 levels in 1983 and then rise to 95.4 percent of 1980 by 1996. The burden of tuition would increase early in the projected period as a result of tuition rate increases and then decline as enrollments decline. Tuition revenue would account for 31.9 percent of instructional expenditures by Fiscal Year 1983, but would slip to less than 28.7 percent by Fiscal Year 1996.

The systemwide pattern of resources declining with enrollments would apply to individual campuses of the University of Minnesota. As a result, there would be little enrichment in the ratio of students to staff. At the Twin Cities campus and the Morris campus the ratios would decline fractionally.

² The term "instructional" is used to denote resources used for direct instructional activity and support activities for instruction. Resources devoted to non-instructional activities, such as research and medical services, are excluded.

TABLE 10

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENT, STUDENT FACULTY STAFFING RATIO,
 INSTRUCTIONAL EXPENDITURES, AND STATE APPROPRIATIONS FOR INSTRUCTION UNDER CURRENT FUNDING POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA

Fiscal Year	Full-Year Equivalent Enrollments (FYE)	FYE as a Percent of F.Y. 1980	Student/Faculty Staffing Ratio ²	Instructional Expenditures/FYE ³	Instructional Expenditures/FYE as a Percent of F.Y. 1980	State Appropriations for Instruction/FYE	State Appropriations for Instruction/FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instr. Expenditures
1982	49,937	104.15%	14.30:1	\$3,527	91.82%	\$2,239	87.32%	28.64%
1983	49,320	102.87	14.26:1	3,514	91.48	2,114	82.42	31.85
1984	48,201	100.53	13.94:1	3,596	93.60	2,187	85.30	31.17
1986	45,136	94.14	13.79:1	3,720	96.84	2,288	89.24	30.23
1988	42,558	88.76	13.70:1	3,796	98.83	2,343	91.37	29.71
1990	41,965	87.53	13.69:1	3,813	99.25	2,354	91.80	29.59
1992	41,726	87.03	13.68:1	3,819	99.41	2,358	91.95	29.56
1994	39,294	81.96	13.59:1	3,890	101.26	2,405	93.77	29.11
1996	37,465	78.14	13.52:1	3,951	102.84	2,446	95.39	28.72
1998	37,621	78.47	13.53:1	3,946	102.72	2,444	95.30	28.73
2000	38,219	79.72	13.56:1	3,926	102.20	2,430	94.77	28.86

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 11

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENT, STUDENT FACULTY STAFFING RATIO,
 INSTRUCTIONAL EXPENDITURES, AND STATE APPROPRIATIONS FOR INSTRUCTION UNDER CURRENT FUNDING POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - TWIN CITIES

Fiscal Year	Full-Year Equivalent Enrollments (FYE)	FYE as a Percent of F.Y. 1980	Student/Faculty Staffing Ratio ²	Instructional Expenditures/FYE ³	Instructional Expenditures/FYE as a Percent of F.Y. 1980	State Appropriations for Instruction/FYE	State Appropriations for Instruction/FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instr. Expenditures
1982	39,685	103.37%	13.66:1	\$3,607	92.21%	\$2,221	87.57%	28.90%
1983	39,316	102.40	13.62:1	3,591	91.82	2,090	82.38	32.17
1984	38,770	100.98	13.33:1	3,668	93.77	2,160	85.18	31.52
1986	36,760	95.75	13.21:1	3,785	96.78	2,255	88.91	30.64
1988	34,801	90.65	13.12:1	3,863	98.76	2,308	90.99	30.12
1990	34,261	89.24	13.09:1	3,882	99.25	2,320	91.46	30.00
1992	34,139	88.92	13.09:1	3,887	99.36	2,323	91.57	29.97
1994	32,201	83.87	12.99:1	3,961	101.27	2,369	93.40	29.52
1996	30,548	79.57	12.90:1	4,033	103.10	2,413	95.14	29.10
1998	30,572	79.63	12.90:1	4,032	103.07	2,413	95.12	29.10
2000	31,059	81.90	12.93:1	4,010	102.51	2,399	94.58	29.23

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 12

PROJECTED FULL-YEAR EQUIVALENT ENROLLMENTS, STUDENT FACULTY STAFFING RATIO,
 INSTRUCTIONAL EXPENDITURES, AND STATE APPROPRIATIONS FOR INSTRUCTION UNDER CURRENT FUNDING POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - MORRIS

Fiscal Year	Full-Year Equivalent Enrollments (FYE)	FYE as a Percent of F.Y. 1980	Student/Faculty Staffing Ratio ²	Instructional Expenditures/FYE ³	Instructional Expenditures/FYE as a Percent of F.Y. 1980	State Appropriations for Instruction/FYE	State Appropriations for Instruction/FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instr. Expenditures
1982	1,652	116.50%	15.93:1	\$3,742	88.96%	\$2,852	85.42%	23.50%
1983	1,703	120.10	15.92:1	3,684	87.59	2,700	80.89	26.42
1984	1,636	115.37	15.59:1	3,773	89.69	2,788	83.52	25.80
1986	1,397	98.52	15.55:1	3,960	94.14	2,974	89.07	24.58
1988	1,253	88.39	15.55:1	4,075	96.88	3,087	92.48	23.88
1990	1,242	87.65	15.55:1	4,084	97.09	3,096	92.73	23.83
1992	1,214	85.68	15.55:1	4,107	97.64	3,119	93.43	23.70
1994	1,118	78.90	15.55:1	4,197	99.78	3,208	96.08	23.19
1996	1,114	78.59	15.55:1	4,202	99.89	3,212	96.21	23.17
1998	1,173	82.72	15.55:1	4,145	98.53	3,156	94.53	23.48
2000	1,196	84.39	15.55:1	4,123	98.03	3,135	93.90	23.61

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

Instructional expenditures per student by Fiscal Year 1996 would increase by 3.1 percent above 1980 levels at the Twin Cities campus and remain at 1980 levels at the Morris campus. State appropriations would fluctuate, initially dropping from Fiscal Year 1980 levels by almost 20 percent at the Twin Cities campus and the Morris campus. In Fiscal Year 1996, however, state appropriations per student would recover to about 5 percent below Fiscal Year 1980 levels. Tuition as a percent of instructional expenditures would decline from the 1983 high.

PROJECTED RESOURCE REQUIREMENTS OF ALTERNATIVE FUNDING AND TUITION POLICIES

Average Cost Funding

Average cost funding would vary the provision of resources directly with enrollments. This policy was simulated based on average costs at each institution or college. Since Community College System enrollments do not decline to the 1977 base during the projection period, the system does not reach full state funding for all enrollments. Consequently, average cost funding was not simulated for this system.

Area Vocational-Technical Institutes

Average cost funding would provide the most striking contrast in projected resource requirements for the AVTIs when compared to current AVTI funding policies. While current funding policies would provide stable resources, average cost policies vary funding directly with enrollments. Enrollment declines

would result in commensurate reductions in resources. Tables 13 through 15 illustrate the consequences of average cost funding for the AVTIs.

Since staffing would be directly related to enrollment levels, the ratio of 14.5 students to one instructional staff member would remain constant under average cost funding for all AVTIs. Operating expenditures per student would decline in 1983 due to funding reductions but would remain virtually constant through the remainder of the projection period. State appropriations per student would decline slightly through the 1980s and 1990s under current tuition policies because other revenues would constitute a larger proportion of total revenues.

Under the alternative tuition policy, state appropriations per student would follow a similar pattern although at a level approximately \$100 per student lower than under the current tuition policy. Tuition revenue would constitute 13 percent of operating expenditures under average cost funding combined with the current tuition policy.

The effect of average cost funding on each AVTI would be similar to that on the system as a whole. Staffing ratios and levels of expenditures per student that existed in the base year would be preserved under average cost funding. Consequently, average cost funding would not result in a widening of the staffing and funding disparities. Under the current tuition policy, tuition revenue would constitute 17 percent of operating expenditures at St. Cloud AVTI and 14 percent of operating costs

TABLE 13

PROJECTED STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO, NET EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 AREA VOCATIONAL-TECHNICAL INSTITUTES

Fiscal Year	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	14.20:1	\$3,379	98.33%	\$2,460	99.55%	10.57%	\$2,460	99.55%	10.57%
1983	14.40:1	3,175	92.40	2,208	89.36	13.10	2,208	89.36	13.10
1984	14.41:1	3,175	92.38	2,207	89.30	13.10	2,150	87.00	14.88
1986	14.43:1	3,167	92.14	2,185	88.43	13.13	2,073	83.88	16.67
1988	14.45:1	3,161	91.97	2,173	87.93	13.14	2,062	83.42	16.67
1990	14.45:1	3,160	91.96	2,177	88.10	13.14	2,066	83.59	16.67
1992	14.45:1	3,147	91.57	2,140	86.61	13.20	2,031	82.20	16.67
1994	14.44:1	3,122	90.85	2,074	83.91	13.31	1,969	79.66	16.67
1996	14.43:1	3,107	90.40	2,046	82.80	13.38	1,944	78.66	16.67
1998	14.42:1	3,101	90.23	2,037	82.44	13.40	1,936	78.34	16.67
2000	14.43:1	3,103	90.31	2,029	82.09	13.38	1,927	77.96	16.67

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

TABLE 14

PROJECTED STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO, NET EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 ST. CLOUD AVTI

Fiscal Year	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	16.62:1	\$2,512	94.57%	\$1,873	89.82%	13.56%	\$1,873	89.82%	13.56%
1983	16.89:1	2,355	88.67	1,668	80.01	16.84	1,668	80.01	16.84
1984	16.89:1	2,356	88.69	1,670	80.09	16.83	1,594	76.45	20.06
1986	16.89:1	2,356	88.72	1,675	80.34	16.83	1,544	74.05	22.40
1988	16.89:1	2,358	88.79	1,689	80.97	16.81	1,558	74.72	22.34
1990	16.89:1	2,360	88.87	1,701	81.57	16.80	1,571	75.33	22.32
1992	16.89:1	2,357	88.76	1,682	80.65	16.82	1,554	74.51	22.25
1994	16.89:1	2,354	88.64	1,662	79.69	16.84	1,538	73.75	22.10
1996	16.89:1	2,356	88.71	1,674	80.30	16.83	1,553	74.46	21.98
1998	16.89:1	2,358	88.77	1,685	80.78	16.82	1,564	75.01	21.92
2000	16.89:1	2,354	88.64	1,662	79.70	16.84	1,541	73.91	21.97

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

TABLE 15

PROJECTED STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO, NET EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 CANBY AVTI

Fiscal Year	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	12.45:1	\$3,584	107.43%	\$2,648	87.47%	11.52%	\$2,648	87.47%	11.52%
1983	11.63:1	3,582	107.36	2,557	84.48	13.43	2,557	84.48	13.43
1984	11.63:1	3,569	106.96	2,526	83.47	13.48	2,535	83.75	13.24
1986	11.63:1	3,521	105.54	2,417	79.87	13.66	2,370	78.32	14.99
1988	11.63:1	3,489	104.59	2,344	77.45	13.78	2,298	75.93	15.10
1990	11.63:1	3,493	104.68	2,351	77.69	13.77	2,305	76.17	15.08
1992	11.63:1	3,466	103.88	2,289	75.65	13.68	2,246	74.20	15.14
1994	11.63:1	3,453	103.50	2,260	74.68	13.93	2,221	73.38	15.07
1996	11.63:1	3,471	104.03	2,302	76.05	13.86	2,265	74.82	14.92
1998	11.63:1	3,496	104.78	2,359	77.93	13.76	2,323	76.74	14.79
2000	11.63:1	3,445	103.27	2,243	74.11	13.96	2,207	72.91	15.02

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

at Canby AVTI. Although system tuition revenue would be set equal to 16.67 percent of operating expenditures under the alternative tuition policy, tuition revenue at St. Cloud AVTI and Canby AVTI would be 22 and 15 percent of operating revenues respectively.

State University System

Average cost funding would not result in drastically different levels of staffing and expenditures for the State University System as a whole. Current policies for the state universities already relate funding to enrollments after system enrollments go below the 1977 base. Although this only applies to five traditionally funded institutions, these five constitute the bulk of staff and resources in the system. Tables 16, 17, and 18 contain projected resource requirements under average cost funding for the state universities.

The ratio of 17 students to one instructional staff member would remain constant for the state universities after average cost funding is implemented in 1988. Similarly, operating expenditures per student would remain constant at 2 percent above the 1980 level under average cost funding. State appropriations per student would remain stable at 96 percent of 1980 levels under the current tuition policy and at 88 percent of 1980 levels under the alternative tuition policy.

TABLE 16

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 STATE UNIVERSITY SYSTEM

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	18.30:1	\$2,611	95.34%	\$1,883	92.18%	25.60%	\$1,883	92.16%	25.60%
1983	18.19:1	2,576	94.06	1,761	86.24	29.30	1,761	86.24	29.30
1984	17.58:1	2,655	96.95	1,837	89.93	28.47	1,761	86.23	31.32
1986	17.22:1	2,765	100.98	1,942	95.10	27.35	1,777	87.00	33.33
1989	17.10:1	2,605	102.41	1,977	96.81	26.97	1,799	88.09	33.33
1990	17.10:1	2,603	102.37	1,976	96.74	26.98	1,798	88.02	33.33
1992	17.10:1	2,601	102.27	1,972	96.56	27.00	1,795	87.88	33.33
1994	17.15:1	2,799	102.21	1,965	96.20	27.04	1,789	87.57	33.33
1996	17.16:1	2,799	102.20	1,963	96.13	27.03	1,787	87.50	33.33
1998	17.15:1	2,799	102.23	1,967	96.31	27.00	1,790	87.64	33.33
2000	17.15:1	2,796	102.11	1,965	96.20	27.04	1,789	87.59	33.33

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1 Constant Fiscal year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.
 2 Includes instructional faculty positions and program supplement unclassified positions.

TABLE 17

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 BEMIDJI STATE UNIVERSITY

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	18.40:1	\$2,846	100.92%	\$2,166	99.46%	23.50%	\$2,166	99.46%	23.50%
1983	18.35:1	2,831	100.41	2,065	94.81	26.66	2,065	94.81	26.66
1984	17.71:1	2,659	101.38	2,092	96.06	26.41	2,015	92.55	29.09
1986	17.35:1	2,962	105.06	2,195	100.79	25.48	2,028	93.13	31.11
1988	17.16:1	3,021	107.15	2,252	103.44	24.99	2,072	95.18	30.94
1990	17.16:1	3,021	107.15	2,252	103.44	24.99	2,073	95.19	30.93
1992	17.16:1	3,021	107.15	2,252	103.42	24.99	2,073	95.22	30.90
1994	17.16:1	3,021	107.15	2,251	103.38	24.99	2,073	95.20	30.88
1996	17.16:1	3,021	107.15	2,251	103.38	24.99	2,073	95.20	30.86
1998	17.16:1	3,021	107.15	2,252	103.40	24.99	2,073	95.21	30.89
2000	17.16:1	3,021	107.15	2,252	103.40	24.99	2,074	95.27	30.85

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional faculty positions and program supplement unclassified positions.

TABLE 18

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 SOUTHWEST STATE UNIVERSITY

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	15.87:1	\$3,624	101.37%	\$2,968	100.41%	17.86%	\$2,968	100.41%	17.86%
1983	14.44:1	3,897	106.99	3,156	106.77	18.76	3,156	106.77	18.76
1984	13.49:1	4,168	116.56	3,426	115.91	17.54	3,325	112.51	19.95
1986	11.65:1	4,823	134.88	4,079	138.01	15.16	3,888	131.55	19.11
1988	11.36:1	4,954	138.56	4,210	142.44	14.75	4,006	135.54	18.67
1990	11.36:1	4,954	138.56	4,210	142.43	14.75	4,006	135.54	18.66
1992	11.36:1	4,954	138.56	4,209	142.41	14.75	4,007	135.56	18.64
1994	11.36:1	4,954	138.56	4,208	142.39	14.75	4,006	135.55	18.63
1996	11.36:1	4,954	138.56	4,208	142.38	14.75	4,006	135.55	18.63
1998	11.36:1	4,954	138.56	4,209	142.40	14.75	4,007	135.55	18.63
2000	11.36:1	4,954	138.56	4,208	142.38	14.75	4,007	135.58	18.61

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional faculty positions and program supplement unclassified positions.

Average cost funding would have the same effect on each institution as it does on the system since all staffing and funding varies with enrollment level. Staffing ratios at Bemidji and Southwest State Universities would remain constant at 17 students and 11 students for each instructional staff member respectively. Operating expenditures per student would remain 7 percent above 1980 at Bemidji and 38 percent above 1980 at Southwest. Under the current tuition policy, tuition revenue would constitute 25 and 15 percent of operating expenditures respectively at Bemidji and Southwest. Tuition revenue would constitute 31 percent of operating expenditures at Bemidji and 19 percent of operating expenditures at Southwest if system tuition revenue was set equal to 33 percent of operating expenditures.

University of Minnesota

Average cost funding would have a smaller impact on the University of Minnesota than any other system. Current funding policies for the University of Minnesota already resemble average cost funding more closely than the policies for any other public system. Since there are significant differences in staffing ratios and levels of expenditures per student among colleges at the Twin Cities Campus of the University of Minnesota, average cost funding was simulated at the college rather than the campus level. Similarly, the alternative tuition policy was simulated at the college rather than system level. Tables 19, 20, and 21 display the results of the resource projections under average cost funding at the University of Minnesota.

TABLE 19

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA

Fiscal Year	Instructional Expenditures/ FYE ²	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
			State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	\$3,527	91.82%	\$2,239	87.32%	28.64%	\$2,239	87.32%	28.64%
1983	3,514	91.48	2,114	82.43	31.85	2,114	82.43	31.85
1984	3,596	93.60	2,187	85.30	31.17	2,137	83.34	32.56
1986	3,645	94.88	2,213	86.30	30.86	2,123	82.78	33.33
1988	3,682	95.85	2,229	86.90	30.63	2,129	83.03	33.33
1990	3,692	96.10	2,233	87.09	30.56	2,131	83.10	33.33
1992	3,695	96.18	2,234	87.11	30.55	2,131	83.11	33.33
1994	3,735	97.24	2,250	87.76	30.32	2,138	83.37	33.33
1996	3,772	98.19	2,268	88.43	30.08	2,145	83.65	33.33
1998	3,771	98.16	2,268	88.46	30.07	2,146	83.67	33.33
2000	3,759	97.85	2,263	88.25	30.15	2,143	83.59	33.33

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 20

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - TWIN CITIES

Fiscal Year	Instructional Expenditures/ FYE ²	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
			State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	\$3,607	92.21%	\$2,221	87.57%	28.90%	\$2,221	87.57%	28.90%
1983	3,591	91.82	2,090	82.38	32.17	2,090	82.38	32.17
1984	3,668	93.77	2,160	85.18	31.52	2,116	83.43	32.72
1985	3,721	95.13	2,191	86.37	31.17	2,110	83.19	33.33
1988	3,765	96.25	2,210	87.12	30.91	2,118	83.52	33.33
1990	3,777	96.57	2,215	87.32	30.83	2,121	83.61	33.33
1992	3,780	96.64	2,216	87.37	30.82	2,121	83.63	33.33
1994	3,829	97.88	2,236	88.17	30.54	2,129	83.96	33.33
1996	3,875	99.07	2,256	88.93	30.28	2,137	84.27	33.33
1998	3,874	99.05	2,255	88.92	30.28	2,137	84.27	33.33
2000	3,860	98.69	2,249	88.69	30.36	2,135	84.17	33.33

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 21

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER AVERAGE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - MORRIS

Fiscal Year	Instructional Expenditures/ FYE ²	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
			State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	\$3,742	88.96%	\$2,852	85.42%	23.50%	\$2,852	85.42%	23.50%
1983	3,684	87.59	2,700	80.89	26.42	2,700	80.89	26.42
1984	3,773	89.69	2,788	83.52	25.80	2,634	78.91	29.67
1986	3,782	89.92	2,796	83.75	25.73	2,509	75.14	33.33
1988	3,782	89.92	2,794	83.71	25.73	2,507	75.10	33.33
1990	3,782	89.92	2,794	83.70	25.73	2,507	75.10	33.33
1992	3,782	89.92	2,794	83.69	25.73	2,507	75.09	33.33
1994	3,782	89.92	2,793	83.66	25.73	2,505	75.05	33.33
1996	3,782	89.92	2,793	83.65	25.73	2,505	75.05	33.33
1998	3,782	89.92	2,793	83.68	25.73	2,506	75.07	33.33
2000	3,782	89.92	2,794	83.69	25.73	2,506	75.08	33.33

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Direct and support expenditures attributable to regular instruction and supported by state funds.

The student/faculty ratio under average cost funding would be identical to that under current policies. The ratio would decline from 13.8 to 13.5 students per faculty member between 1986 and 1996. Operating expenditures per student would increase slightly under average cost funding. These changes in student/faculty ratio and expenditures per student would occur because enrollment decline at the Twin Cities campus occur in programs with higher than average staffing ratios and lower than average expenditure per student levels. State appropriations per student would rise to 88 percent of 1980 under current tuition policies and 84 percent of 1980 under the alternative tuition policy.

Instructional expenditures per student would rise to 99 percent of their 1980 levels by 1996 at the Twin Cities campus. At the Morris campus, instructional expenditures per student would remain constant at 89 percent of their 1980 levels. State appropriations per student for the Twin Cities campus would reach 89 and 84 percent of their 1980 level by 1996 under current and alternative tuition policies respectively. The comparable percentages for the Morris campus would be 84 and 75 in 1996.

Fixed and Variable Cost Funding

This funding policy would divide expenditures into two categories, those which are fixed and those which vary with enrollments. Fixed expenditures would be incurred regardless of enrollment level. Variable expenditures would change with enrollments. The determination of which expenditures should be

fixed and which should be variable is critical. The proportions of fixed and variable expenditures for these simulations were derived based on research done at Ohio State University.³ The proportions were differentiated on the basis of level of instruction (i.e.; lower division, upper division, professional, and graduate) and type of instruction (i.e.; technical, general, baccalaureate, graduate). The proportion of fixed expenditures was used to determine fixed expenditures in the base year. These expenditures were held fixed for the remaining years of the simulations. Variable expenditures in the base year were used to derive a variable cost per student which was used to simulate variable expenditures in subsequent years.

Area Vocational-Technical Institutes

A fixed and variable cost funding policy for the AVTIs would result in lower expenditures per student and leaner staffing ratios than current funding policies. However, more resources would be available than with average cost funding. The results of the fixed and variable cost funding simulations for the AVTIs are presented in Tables 22, 23, and 24.

Since some staff positions and expenditures are held fixed, staffing and expenditures would decline more slowly than enrollments. Consequently, the ratio of instructional staff to students would decline from 14.4 to 1.0 to 12.9 to 1.0 between

³ See: A Method for Incorporating Fixed and Variable Costing Concepts in Student Based Models for State Funding of Higher Education in Ohio by George W. Baughman and Michael E. Young.

TABLE 22

PROJECTED STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO, NET EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 AREA VOCATIONAL-TECHNICAL INSTITUTES

Fiscal Year	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	14.20:1	\$3,379	98.33%	\$2,460	99.55%	10.57%	\$2,460	99.55%	10.57%
1983	14.40:1	3,175	92.40	2,208	89.36	13.10	2,208	89.36	13.10
1984	14.39:1	3,178	92.48	2,210	89.44	13.08	2,153	87.12	14.88
1986	14.19:1	3,222	93.76	2,241	90.67	12.90	2,119	85.75	16.67
1988	14.10:1	3,243	94.36	2,255	91.24	12.81	2,130	86.18	16.67
1990	14.16:1	3,227	93.90	2,244	90.79	12.87	2,121	85.83	16.67
1992	13.83:1	3,301	96.06	2,295	92.86	12.59	2,160	87.40	16.67
1994	13.25:1	3,436	99.99	2,388	96.62	12.09	2,231	90.26	16.67
1996	13.09:1	3,471	101.00	2,411	97.54	11.97	2,248	90.95	16.67
1998	13.05:1	3,480	101.26	2,416	97.77	11.94	2,252	91.11	16.67
2000	12.91:1	3,521	102.44	2,446	98.96	11.80	2,274	92.02	16.67

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

TABLE 23

PROJECTED STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO, NET EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 ST. CLOUD AVTI

Fiscal Year	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	16.62:1	\$2,512	94.57%	\$1,873	89.82%	13.56%	\$1,873	89.82%	13.56%
1983	16.89:1	2,355	88.67	1,668	80.01	16.84	1,668	80.01	16.84
1984	16.94:1	2,349	88.42	1,663	79.76	16.88	1,587	76.09	20.14
1986	17.09:1	2,328	87.63	1,647	78.96	17.04	1,506	72.22	23.07
1988	17.49:1	2,274	85.62	1,604	76.93	17.44	1,460	70.03	23.77
1990	17.89:1	2,223	83.71	1,564	75.00	17.83	1,423	68.22	24.18
1992	17.28:1	2,302	86.66	1,626	77.98	17.23	1,472	70.61	23.91
1994	16.69:1	2,383	89.72	1,691	81.06	16.64	1,514	72.61	24.04
1996	17.06:1	2,332	87.78	1,650	79.11	17.01	1,468	70.38	24.81
1998	17.37:1	2,290	86.24	1,617	77.55	17.31	1,434	68.75	25.32
2000	16.70:1	2,382	89.69	1,690	81.03	16.65	1,499	71.91	24.65

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

TABLE 24

PROJECTED STUDENT INSTRUCTIONAL LICENSED STAFFING RATIO, NET EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 CANBY AVTI

Fiscal Year	Student/ Instructional Licensed Staffing Ratio ²	Net Expenditures/ ADM ³	Net Expenditures/ ADM as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures	State Appropriations/ ADM	State Appropriations/ ADM as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net Expenditures
1982	12.45:1	\$3,584	107.43%	\$2,648	87.47%	11.52%	\$2,648	87.47%	11.52%
1983	11.63:1	3,582	107.36	2,557	84.48	13.43	2,557	84.48	13.43
1984	11.41:1	3,645	109.26	2,603	86.00	13.19	2,611	86.26	12.98
1986	10.71:1	3,869	115.97	2,765	91.37	12.43	2,709	89.51	13.66
1988	10.26:1	4,020	120.49	2,875	94.97	11.96	2,815	93.00	13.45
1990	10.32:1	4,005	120.03	2,864	94.61	12.01	2,806	92.73	13.43
1992	9.99:1	4,132	123.84	2,956	97.65	11.64	2,866	95.36	13.32
1994	9.83:1	4,192	125.64	2,999	99.09	11.47	2,907	96.06	13.67
1996	10.05:1	4,107	123.10	2,938	97.06	11.71	2,840	93.63	14.09
1998	10.36:1	3,990	119.58	2,853	94.25	12.05	2,753	90.97	14.54
2000	9.75:1	4,228	126.71	3,025	99.94	11.38	2,919	96.44	13.68

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional licensed positions.

3 Net expenditures exclude expenditures for supplies which are sold.

1984 and 2000 under fixed and variable cost funding. Operating expenditures per student would rise to 2 percent above 1980 levels by 2000.

Another consequence of the slower decline in expenditures would be a decline in the percent of operating expenditures which tuition revenue constitutes. Under the current tuition policy, tuition revenue would decline from 13.1 percent to 11.8 percent of operating expenditures by 2000. Since tuition revenue would decline more rapidly than expenditures, state appropriations per student would rise to 99 percent of 1980 by 2000. Alternatively, if tuition revenue was set at 16.67 percent of operating expenditures, state appropriations per student would rise to 92 percent of 1980 by 2000.

The effects that fixed and variable cost funding would have on individual AVTIs would be similar to those of current funding policies. Staffing and expenditure levels would decrease or increase at slower rates than enrollments. St. Cloud AVTI, with increasing enrollments in the 1980s, would experience a rise in its student instructional staffing ratio from 16.9:1 in 1984 to 17.9:1 in 1990. St. Cloud would also experience a decline in operating expenditures per student from 88.4 percent of 1980 in 1984 to 83.7 percent of 1980 in 1990 since expenditures would not rise as quickly as enrollments. State appropriations would not rise as quickly as enrollments, and consequently tuition revenue would rise from 16.88 percent of operating expenditures in 1984 to 17.8 percent in 1990 and then decline with enrollments. If system tuition revenue was set at 16.67 percent of instructional

expenditures, tuition revenue at St. Cloud would rise from 20.1 percent of operating expenditures in 1984 to 25.3 percent in 1998.

Canby AVTI, with its projected enrollment declines during the 1980s and 1990s, would experience a declining staffing ratio and increasing expenditures per student. Expenditures per student would rise from 109.3 percent of the 1980 level in 1984 to 126.7 percent of the 1980 level in 2000. State appropriations per student would rise from 86 to 100 percent of 1980 between 1984 and 2000. Although the disparities between St. Cloud and Canby in staffing and operating expenditures per student would become larger, they would not be as large as the disparities under current funding policies.

Community College System

A fixed and variable cost funding policy would provide resources to the Community College System at levels similar to those provided by current funding policies. Tables 25, 26, and 27 contain the projected resource requirements of fixed and variable cost funding for the Community College System.

As described earlier, staffing and expenditures would decline at a slower rate than enrollments under fixed and variable cost funding. Enrollments in the Community College System are projected to decline from 104.9 to 97.2 percent of 1980 levels between 1988 and 1998. This relatively small enrollment decline combined with a slower rate of decline in staff and expenditures would result in a slight decline in the

TABLE 25

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 COMMUNITY COLLEGE SYSTEM

Fiscal Year	Student/ Faculty/ Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	18.96:1	\$2,162	92.28%	\$1,450	88.35%	25.60%	\$1,450	88.35%	25.60%
1983	18.97:1	2,102	89.73	1,347	82.08	28.30	1,347	82.08	28.30
1984	18.96:1	2,108	89.97	1,353	82.41	28.22	1,306	79.57	30.53
1986	18.82:1	2,165	92.43	1,407	85.70	27.44	1,290	78.58	33.33
1988	18.72:1	2,174	92.79	1,414	86.14	27.33	1,294	78.86	33.33
1990	18.83:1	2,155	91.98	1,397	85.11	27.58	1,284	78.21	33.33
1992	18.59:1	2,194	93.65	1,432	87.26	27.07	1,306	79.56	33.33
1994	18.23:1	2,255	96.27	1,488	90.62	26.30	1,341	81.68	33.33
1996	18.22:1	2,257	96.36	1,490	90.75	26.28	1,342	81.76	33.33
1998	18.21:1	2,259	96.42	1,491	90.83	26.26	1,343	81.82	33.33
2000	18.30:1	2,245	95.85	1,478	90.06	26.42	1,335	81.32	33.33

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

TABLE 26

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 ANOKA-RAMSEY COMMUNITY COLLEGE

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	19.64:1	\$1,880	96.40%	\$1,191	93.60%	29.60%	\$1,191	93.60%	29.60%
1983	20.20:1	1,787	91.64	1,053	82.79	33.53	1,053	82.79	33.53
1984	20.65:1	1,755	89.99	1,022	80.29	34.18	975	76.62	36.98
1986	20.78:1	1,779	91.22	1,045	82.15	33.70	928	72.98	40.60
1988	20.74:1	1,785	91.52	1,052	82.65	33.58	932	73.25	40.63
1990	20.83:1	1,773	90.93	1,041	81.82	33.81	928	72.92	40.53
1992	20.66:1	1,794	91.99	1,060	83.30	33.40	934	73.38	40.60
1994	20.40:1	1,827	93.66	1,089	85.62	32.77	943	74.09	41.21
1996	20.34:1	1,834	94.05	1,096	86.16	32.63	949	74.57	41.07
1998	20.28:1	1,841	94.40	1,103	86.65	32.50	955	75.03	40.64
2000	20.32:1	1,837	94.16	1,098	86.31	32.59	955	75.04	40.79

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

TABLE 27

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 RAINY RIVER COMMUNITY COLLEGE

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	12.52:1	\$3,359	104.49%	\$2,684	104.88%	16.25%	\$2,684	104.66%	16.25%
1983	12.66:1	3,264	101.54	2,544	99.41	17.95	2,544	99.41	17.95
1984	12.86:1	3,233	100.58	2,514	98.21	18.13	2,467	96.39	19.61
1986	12.68:1	3,354	104.34	2,631	102.81	17.46	2,515	98.25	21.03
1988	12.46:1	3,412	106.14	2,688	105.02	17.15	2,568	100.34	20.75
1990	12.54:1	3,381	105.19	2,659	103.87	17.31	2,545	99.44	20.75
1992	12.48:1	3,407	105.98	2,683	104.82	17.18	2,557	99.89	20.98
1994	12.26:1	3,500	108.88	2,772	108.30	16.71	2,625	102.57	21.01
1996	12.18:1	3,535	109.98	2,806	109.63	16.54	2,659	103.87	20.32
1998	12.19:1	3,529	109.80	2,800	109.41	16.57	2,652	103.63	20.87
2000	12.12:1	3,560	110.75	2,830	110.55	16.42	2,686	104.95	20.55

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

staffing ratio and a slight increase in operating expenditures per student. The system ratio would decline from 18.7 students for every staff member in 1988 to 18.2 students for every staff member in 1998. Operating expenditures per student would rise from 92.8 percent of 1980 levels in 1988 to 96.4 percent of 1980 levels by 1998. State appropriations per student would peak at 90.8 percent and 81.8 percent of their 1980 levels under current and alternative tuition policies, respectively. In that peak year, 1998, the difference would be \$148 per student.

Institutional patterns would be similar to the system as a whole with fixed and variable cost funding. Staffing ratios would decline and expenditures per student would rise. The disparities between large and small community colleges in staffing and expenditure levels under fixed and variable cost funding would be similar to those under current policies. If tuition revenue at the system level was set at 33.33 percent of operating expenditures, students at Anoka-Ramsey would pay 41.2 percent of operating expenditures while students at Rainy River would pay 21 percent of operating expenditures in 1994. The comparable percentages under the current tuition policy would be 32.77 at Anoka-Ramsey and 16.71 at Rainy River.

State University System

Compared to current funding policies, fixed and variable cost funding would provide the State University System with slightly higher levels of staff and expenditures. This is due to the fact, that under current policies, staffing and funding for

the five traditional state universities would decline more closely in proportion to enrollments than they would under fixed and variable cost funding. Tables 28, 29, and 30 present the projected resource requirements for the state universities under fixed and variable cost funding.

The effects of higher staffing for the State University System would be a decline in the student/faculty staffing ratio, from 16.9 to 16.1 between 1988 and 1996. Operating expenditures per student would rise from 4.0 to 10.1 percent above 1980 levels during the same period. If students were to pay 33.33 percent of operating expenditures, state appropriations per student would peak at 94.6 percent of the 1980 level in 1996. Under the current tuition policy, state appropriations per student would peak at 6.7 percent above the 1980 level.

Since fixed and variable cost funding would have similar effects on each state university, it would not widen the disparities in staffing and expenditure levels to the extent which occurs under current policies. Bemidji and Southwest would have ratios of 16.9 and 11.2 students per faculty member in 1988 and 16.0 and 10.7 students per faculty in 1996. Compared to 1980 levels, operating expenditures per student and state appropriations per student would increase by 15.2 and 13.6 percent at Bemidji and 49.1 and 55.1 percent at Southwest by 1996. Under the alternative tuition policy, students at Bemidji and Southwest would pay respectively 31.0 and 18.9 percent of operating expenditures in 1996.

TABLE 28
 PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 STATE UNIVERSITY SYSTEM

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	18.30:1	\$2,611	95.34%	\$1,883	92.18%	25.60%	\$1,883	92.18%	25.60%
1983	18.17:1	2,576	94.06	1,761	86.24	29.30	1,761	86.24	29.30
1984	17.57:1	2,655	96.95	1,837	89.93	28.47	1,761	86.24	31.32
1986	17.22:1	2,765	100.98	1,942	95.10	27.35	1,777	87.00	33.33
1988	16.86:1	2,849	104.02	2,021	98.97	26.56	1,828	89.52	33.33
1990	16.82:1	2,858	104.37	2,031	99.43	26.46	1,834	89.81	33.33
1992	16.70:1	2,883	105.27	2,054	100.57	26.23	1,849	90.55	33.33
1994	16.20:1	2,990	109.19	2,156	105.55	25.31	1,916	93.81	33.33
1996	16.09:1	3,015	110.10	2,180	106.71	25.09	1,931	94.56	33.33
1998	16.32:1	2,964	108.25	2,132	104.39	25.50	1,900	93.03	33.33
2000	16.41:1	2,943	107.45	2,111	103.36	25.69	1,886	92.36	33.33

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.
 2 Includes instructional faculty positions and program supplement unclassified positions.

TABLE 29

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 BEMIDJI STATE UNIVERSITY

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	18.39:1	\$2,646	100.92%	\$2,166	99.46%	23.50%	\$2,166	99.46%	23.50%
1983	18.32:1	2,831	100.41	2,065	94.81	26.66	2,065	94.81	26.66
1984	17.70:1	2,859	101.38	2,092	96.06	26.41	2,015	92.55	29.09
1986	17.35:1	2,962	105.06	2,195	100.79	25.48	2,028	93.13	31.11
1988	16.89:1	3,071	108.93	2,303	105.75	24.58	2,108	96.82	30.91
1990	16.80:1	3,089	109.56	2,320	106.56	24.43	2,123	97.46	30.84
1992	16.62:1	3,124	110.81	2,355	108.17	24.16	2,149	98.71	30.75
1994	16.12:1	3,225	114.38	2,455	112.75	23.40	2,213	101.65	30.90
1996	16.04:1	3,243	115.02	2,473	113.57	23.28	2,223	102.06	30.99
1998	16.30:1	3,187	113.03	2,418	111.02	23.68	2,184	100.31	31.00
2000	16.39:1	3,170	112.42	2,400	110.23	23.81	2,174	99.86	30.94

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional faculty positions and program supplement unclassified positions.

TABLE 30

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 SOUTHWEST STATE UNIVERSITY

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	15.87:1	\$3,624	101.37%	\$2,968	100.41%	17.86%	\$2,968	100.41%	17.86%
1983	14.44:1	3,897	108.99	3,156	106.77	18.76	3,156	106.77	18.76
1984	13.49:1	4,168	116.56	3,426	115.91	17.54	3,325	112.51	19.95
1986	11.65:1	4,823	134.88	4,079	138.01	15.16	3,888	131.55	19.11
1988	11.23:1	5,023	140.48	4,279	144.76	14.55	4,060	137.37	18.90
1990	11.16:1	5,062	141.58	4,318	146.09	14.44	4,096	138.58	18.82
1992	11.02:1	5,140	143.76	4,395	148.71	14.22	4,165	140.93	18.69
1994	10.76:1	5,295	148.09	4,550	153.92	13.80	4,284	144.93	18.82
1996	10.70:1	5,330	149.07	4,584	155.10	13.71	4,310	145.82	18.85
1998	10.85:1	5,243	146.64	4,498	152.18	13.94	4,241	143.48	18.84
2000	10.70:1	5,330	149.07	4,584	155.10	13.71	4,334	146.64	18.40

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Includes instructional faculty positions and program supplement unclassified positions.

University of Minnesota

Fixed and variable cost funding for the University of Minnesota would result in significantly higher levels of staff and expenditures than would occur under current funding policies. Current policies would relate staffing and funding more closely to enrollments than would a fixed and variable policy. Projected resource requirements of fixed and variable cost funding for the University of Minnesota are contained in Tables 31, 32, and 33.

The ratio of students to faculty members would decline from 13.0 to 1.0 in 1988 to 12.0 to 1.0 by 1996 as enrollments declined more rapidly than staffing. The slower decline in expenditures would result in an increase in operating expenditures per student from 1.5 to 10.8 percent above 1980 levels between 1988 and 1996. Under the current tuition policy, state appropriations per student would peak in 1996 at 7.3 percent above 1980 levels. State appropriations per student would peak at 3.8 percent below 1980 levels under the alternative tuition policy. The difference in state appropriations between the two tuition policies would be \$284 per student.

At the campus level, the effects of fixed and variable cost funding would be similar to those of the entire system. The Twin Cities and Morris campuses would experience declines of 2.08 and 2.83 respectively in their student faculty staffing ratios, as enrollments decline more rapidly than staffing. Operating expenditures per student would rise to 10.5 and 10.9 percent above 1980 levels by 1996 at the Twin Cities and Morris. Under

TABLE 31

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA

Fiscal Year	Student/ Faculty Staffing Ratio ²	Instructional Expenditures/ FYE ³	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	14.30:1	\$3,527	91.82%	\$2,239	87.32%	28.64%	\$2,239	87.32%	28.64%
1983	14.26:1	3,514	91.48	2,114	82.43	31.85	2,114	82.43	31.65
1984	13.94:1	3,596	93.60	2,187	85.30	31.17	2,187	83.34	32.56
1986	13.43:1	3,750	97.62	2,319	90.41	29.99	2,193	85.53	33.33
1988	12.99:1	3,899	101.49	2,445	95.36	28.93	2,274	88.66	33.33
1990	12.88:1	3,936	102.46	2,478	96.61	28.67	2,294	89.46	33.33
1992	12.84:1	3,951	102.85	2,490	97.09	28.57	2,302	89.77	33.33
1994	12.39:1	4,116	107.15	2,631	102.59	27.51	2,392	93.26	33.33
1995	12.04:1	4,256	110.79	2,752	107.30	26.66	2,468	96.22	33.33
1998	12.07:1	4,245	110.50	2,743	106.95	26.71	2,462	95.99	33.33
2000	12.19:1	4,198	109.29	2,703	105.39	26.99	2,437	95.01	33.33

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 32

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - TWIN CITIES

Fiscal Year	Student/ Faculty Staffing Ratio ²	Instructional Expenditures/ FYE ³	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	13.66:1	\$3,607	92.21%	\$2,221	87.57%	28.90%	\$2,221	87.57%	28.90%
1983	13.62:1	3,591	91.82	2,090	82.38	32.17	2,090	82.38	32.17
1984	13.33:1	3,668	93.77	2,160	85.18	31.52	2,116	83.43	32.72
1986	12.94:1	3,801	97.18	2,271	89.53	30.51	2,164	85.30	33.33
1988	12.53:1	3,946	100.88	2,391	94.26	29.49	2,239	88.28	33.33
1990	12.42:1	3,989	101.97	2,426	95.66	29.20	2,262	89.16	33.33
1992	12.39:1	3,998	102.22	2,434	95.98	29.13	2,267	89.36	33.33
1994	11.96:1	4,165	106.48	2,573	101.42	28.07	2,354	92.79	33.33
1996	11.58:1	4,324	110.53	2,704	106.61	27.14	2,437	96.06	33.33
1998	11.59:1	4,321	110.47	2,702	106.53	27.15	2,435	96.01	33.33
2000	11.70:1	4,273	109.23	2,662	104.95	27.43	2,410	95.01	33.33

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 33

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER FIXED AND VARIABLE COST FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - MORRIS

Fiscal Year	Student/ Faculty Staffing Ratio ²	Instructional Expenditures/ FYE ³	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	15.93:1	\$3,742	88.96%	\$2,852	85.42%	23.50%	\$2,852	85.42%	23.50%
1983	15.92:1	3,684	87.59	2,700	80.89	26.42	2,700	80.89	26.42
1984	15.59:1	3,773	89.69	2,788	83.52	25.80	2,634	78.91	29.87
1986	14.58:1	4,099	97.45	3,113	93.24	23.74	2,720	81.47	33.33
1988	13.87:1	4,355	103.54	3,368	100.87	22.35	2,889	86.54	33.33
1990	13.82:1	4,377	104.04	3,388	101.49	22.24	2,903	86.96	33.33
1992	13.67:1	4,434	105.42	3,446	103.22	21.95	2,941	88.10	33.33
1994	13.13:1	4,655	110.67	3,666	109.80	20.91	3,087	92.48	33.33
1996	13.10:1	4,666	110.93	3,676	110.12	20.86	3,095	92.69	33.33
1998	13.44:1	4,526	107.60	3,537	105.96	21.50	3,002	89.92	33.33
2000	13.57:1	4,474	106.35	3,485	104.39	21.76	2,967	88.88	33.33

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

the alternative tuition policy, state appropriations per student would peak at 96.1 percent of 1980 levels at the Twin Cities campus and 92.7 percent of 1980 levels at the Morris campus.

Program Funding

This alternative would apply the AVTI funding policy to the three public collegiate systems. Program funding would provide constant levels of funding for instructional faculty compensation unless enrollments in an institution change by more than five percent over a two-year period. If such a change occurs, funding for instruction in that institution would change by the percentage change in enrollment minus 5 percent. Funding for instructional supplies would be directly related to enrollment. Support activities would receive the same level of funding they received in the base year.

Community College

Program funding for the Community College System, by providing stable resources, would result in lower staffing ratios and higher levels of operating expenditures per student than would current funding policies. The difference in resource levels between the two funding policies would not be as large as in the other collegiate systems. The smaller difference is due to the fact that Community College System enrollments are not projected to decline below the bulge base. As a consequence, the system would only lose tuition revenue and the partial

appropriation as enrollments decline under current policies. Tables 34, 35, and 36 contain the projected resource requirements of the Community College System under program funding.

Fixed staffing levels under program funding combined with enrollment declines would cause the system student/faculty staffing ratio to decline from 18.62 to 1.0 in 1988 to 17.27 to 1.0 in 1996. Operating expenditures per student would rise from 6.8 percent below 1980 levels in 1988 to 1980 levels by 1996, the year of lowest enrollment. Although resources would be stable under a program funding policy, state appropriations per student would never exceed 1980 levels during the projection period. Under the alternative policy of tuition at 33 percent of operating expenditures and program funding, state appropriations per student would never exceed 86 percent of 1980 levels.

Anoka-Ramsey Community College is projected to experience a slight enrollment increase after 1988, the year in which program funding would be implemented. The result of increased enrollment, stable staffing, and stable funding would be a rise in the staffing ratio and a decline in operating expenditures per student. As enrollments decline, the staffing ratio would decline, from 21.2 to one in 1990 to 19.55 to one in 1996. Expenditures per student would rise from a low of 90.0 to a high of 97.3 percent of 1980 levels between 1990 and 1998. By 1998, state appropriations per student would rise to 91.1 to 77.0 percent of 1980 levels under the current and alternative tuition policies respectively.

TABLE 34

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 COMMUNITY COLLEGE SYSTEM

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	18.96:1	\$2,162	92.28%	\$1,450	88.35%	25.60%	\$1,450	88.35%	25.60%
1983	18.97:1	2,102	89.73	1,347	82.08	28.30	1,347	82.08	28.30
1984	18.96:1	2,108	89.97	1,353	82.41	28.22	1,306	79.57	30.53
1986	18.82:1	2,165	92.43	1,407	85.70	27.44	1,290	78.58	33.33
1988	18.62:1	2,185	93.28	1,425	86.84	27.18	1,302	79.32	33.33
1990	18.97:1	2,146	91.60	1,388	84.56	27.70	1,278	77.84	33.33
1992	18.30:1	2,221	94.83	1,460	88.94	26.72	1,324	80.69	33.33
1994	17.31:1	2,342	99.97	1,574	95.90	25.29	1,398	85.20	33.33
1996	17.27:1	2,353	100.43	1,585	96.56	25.17	1,406	85.64	33.33
1998	17.28:1	2,351	100.36	1,583	96.46	25.19	1,405	85.57	33.33
2000	17.41:1	2,332	99.55	1,565	95.34	25.40	1,393	84.84	33.33

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

TABLE 35

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 ANOKA-RAMSEY COMMUNITY COLLEGE

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	19.64:1	\$1,880	96.40%	\$1,191	93.60%	29.60%	\$1,191	93.60%	29.60%
1983	20.20:1	1,787	91.64	1,053	82.79	33.53	1,053	82.79	33.53
1984	20.65:1	1,755	89.99	1,022	80.29	34.18	975	76.62	36.98
1986	20.78:1	1,779	91.22	1,045	82.15	33.70	928	72.98	40.60
1988	20.90:1	1,780	91.24	1,046	82.21	33.69	923	72.52	40.98
1990	21.20:1	1,755	89.99	1,023	80.39	34.18	913	71.72	40.79
1992	20.67:1	1,799	92.23	1,064	83.66	33.31	929	73.01	41.23
1994	19.88:1	1,867	95.73	1,130	88.79	32.03	954	74.99	41.90
1996	19.71:1	1,883	96.55	1,145	89.99	31.75	966	75.90	41.73
1998	19.55:1	1,898	97.28	1,159	91.07	31.50	980	77.03	41.37
2000	19.66:1	1,888	96.78	1,149	90.32	31.67	977	76.78	41.24

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

TABLE 36

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 RAINY RIVER COMMUNITY COLLEGE

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	12.52:1	\$3,359	104.49%	\$2,684	104.88%	16.25%	\$2,684	104.88%	16.25%
1983	12.66:1	3,264	101.54	2,544	99.41	17.95	2,544	99.41	17.95
1984	12.66:1	3,233	100.58	2,514	98.21	18.13	2,467	96.39	19.61
1986	12.68:1	3,354	104.34	2,631	102.81	17.46	2,515	98.25	21.03
1988	12.41:1	3,433	106.80	2,709	105.84	17.04	2,585	101.01	20.73
1990	12.65:1	3,368	104.78	2,645	103.35	17.38	2,535	99.04	20.74
1992	12.45:1	3,422	106.46	2,698	105.42	17.10	2,563	100.12	21.16
1994	11.75:1	3,611	112.32	2,883	112.63	16.18	2,707	105.76	21.17
1996	11.50:1	3,695	114.94	2,965	115.85	15.81	2,786	108.65	20.78
1998	11.54:1	3,682	114.54	2,953	115.36	15.86	2,774	108.38	20.84
2000	11.34:1	3,747	116.55	3,016	117.85	15.58	2,844	111.11	20.29

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

Rainy River Community College is projected to experience steady enrollment declines. The staffing ratio would drop from 12.41 in 1998 to 11.34 in 2000. Operating expenditures per student would rise from 6.8 to 16.6 percent above 1980 levels as enrollments decline between 1988 and 2000.

State University System

Program funding would provide stable staffing and funding for all seven state universities. Under current policies, however, the five regularly funded state universities would lose staff and funding with enrollments. Consequently, a program funding policy would result in significantly lower staffing ratios and significantly higher expenditure per student levels at those five state universities. Projected resource requirements of the State University System under program funding are contained in Tables 37, 38, and 39.

Stable staffing levels, combined with the projected enrollment declines, would cause the system staffing ratio to drop from 16.4 students per staff member in 1988 to 15.0 students per staff member by 1996. Similarly, as enrollments decline and funding is held stable, operating expenditures per student would rise by almost \$300 per student between 1988 and 1996 and would be 17 percent above 1980 levels. Although state appropriations per student would rise to 16.0 percent above 1980 levels under program funding and the current tuition policy, they would barely exceed 1980 levels under the alternative tuition policy.

TABLE 37

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 STATE UNIVERSITY SYSTEM

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	18.30:1	\$2,611	95.34%	\$1,883	92.18%	25.60%	\$1,883	92.18%	25.60%
1983	18.17:1	2,576	94.06	1,761	86.24	29.30	1,761	66.24	29.30
1984	17.57:1	2,655	96.95	1,837	89.93	28.47	1,761	86.23	31.32
1986	17.22:1	2,765	100.98	1,942	95.10	27.35	1,777	87.00	33.33
1988	16.38:1	2,910	106.27	2,083	101.98	26.00	1,870	91.53	33.33
1990	16.27:1	2,932	107.07	2,105	103.05	25.79	1,884	92.23	33.33
1992	15.99:1	2,981	108.84	2,152	105.36	25.37	1,915	93.75	33.33
1994	15.20:1	3,156	115.23	2,321	113.64	23.98	2,026	99.20	33.33
1996	14.97:1	3,204	117.00	2,369	115.97	23.61	2,057	100.73	33.33
1998	15.44:1	3,109	113.52	2,276	111.45	24.32	1,996	97.74	33.33
2000	15.64:1	3,071	112.14	2,240	109.65	24.62	1,972	96.55	33.33

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Includes instructional faculty positions and program supplement unclassified positions.

TABLE 38

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 BEMIDJI STATE UNIVERSITY

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	18.39:1	\$2,846	100.92%	\$2,166	99.46%	23.50%	\$2,166	99.46%	23.50%
1983	18.32:1	2,831	100.41	2,065	94.81	26.66	2,065	94.81	26.66
1984	17.70:1	2,859	101.38	2,092	96.06	26.41	2,015	92.55	29.09
1986	17.35:1	2,962	105.06	2,195	100.79	25.48	2,028	93.13	31.11
1988	16.40:1	3,128	110.94	2,359	108.36	24.13	2,144	98.47	31.01
1990	16.22:1	3,169	112.39	2,400	110.22	23.82	2,178	100.00	30.84
1992	15.87:1	3,235	114.75	2,466	113.27	23.33	2,228	102.31	30.71
1994	15.03:1	3,413	121.05	2,643	121.39	22.12	2,346	107.75	30.81
1996	14.88:1	3,451	122.41	2,682	123.14	21.87	2,368	108.76	30.94
1998	15.36:1	3,346	118.67	2,577	118.32	22.56	2,295	105.40	30.97
2000	15.52:1	3,313	117.51	2,544	116.83	22.78	2,275	104.49	30.89

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Includes instructional faculty positions and program supplement unclassified positions.

TABLE 39

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 SOUTHWEST STATE UNIVERSITY

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of M & E Expenditures
1982	15.87:1	\$3,624	101.37%	\$2,968	100.41%	17.86%	\$2,968	100.41%	17.86%
1983	14.44:1	3,897	108.99	3,156	106.77	18.76	3,156	106.77	18.76
1984	13.49:1	4,168	116.56	3,426	115.91	17.54	3,325	112.51	19.95
1986	11.65:1	4,823	134.88	4,079	138.01	15.16	3,888	131.55	19.11
1988	10.99:1	5,085	142.20	4,340	146.84	14.38	4,101	138.75	19.08
1990	10.62:1	5,177	144.77	4,432	149.95	14.12	4,166	141.61	18.88
1992	10.50:1	5,328	149.00	4,583	155.05	13.72	4,320	146.16	18.65
1994	9.92:1	5,615	157.03	4,869	164.74	13.02	4,548	153.88	18.73
1996	9.80:1	5,695	159.28	4,949	167.46	12.83	4,612	156.05	18.75
1998	10.11:1	5,527	154.58	4,782	161.78	13.22	4,476	151.45	18.75
2000	9.80:1	5,695	159.28	4,949	167.46	12.83	4,657	157.55	17.97

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Includes instructional faculty positions and program supplement unclassified positions.

Program funding, by providing stable resource levels to all state universities, would avoid the widening of disparities in staffing and funding between institutions which would occur under current policies. Southwest State University would experience declining staffing ratios and rising levels of funding per student under program funding almost identical to those under current policies. Bemidji and the other regularly funded state universities would experience significantly richer staffing ratios and expenditure per student levels under program funding. The staffing ratio at Bemidji would decline by 1.5 students per staff member to 14.9 to 1.0 by 1996. Expenditures per student at Bemidji would rise 22.4 percent above 1980 levels under program funding. State appropriations per student at Bemidji would rise 23.1 percent above 1980 levels by 1996 under program funding.

University of Minnesota

A program funding policy for the University of Minnesota would provide the most dramatic contrast to current funding policies in staffing ratios and expenditures per student. Current funding policies for the University of Minnesota reduce staffing and funding nearly in proportion with enrollments after the end of the bulge funding policy. Since system enrollments are projected to decline below the 1977 base three years earlier than the State University System, the University of Minnesota would lose resources earlier under current policies. A program funding policy implemented in 1985, when system enrollments

decline below the 1977 base, would hold levels virtually constant at 1985 levels. Tables 40, 41, and 42 illustrate the projected effects of program funding for the University of Minnesota.

Stable staffing levels combined with a 21.9 percent projected enrollment decline would result by 1996 in a decrease in the system staffing ratio from 13.35 to 11.70 students per staff member. By 1996, stable funding would cause expenditures per student to rise 14.4 percent above 1980 levels or \$797 per student above 1984, the last year of the bulge funding policy. Program funding combined with the alternative tuition policy would provide an additional \$330 per student in tuition and would hold state appropriations per student under 1980 levels during the projection period.

Program funding would have effects on the Twin Cities and Morris campuses similar to those on the system. The Twin Cities and Morris campuses would experience increases in instructional staffing ratios of 1.6 and 2.0 students per staff member respectively between 1986 and 1996. Operating expenditures per student would rise by \$610 at the Twin Cities campus and \$809 per student at the Morris campus. Program funding and the current tuition policy would result in a rise in state appropriations per student to 11.2 and 19.1 percent above 1980 levels at the Twin Cities and Morris campuses respectively by 1996. The comparable percentages under the alternative tuition policy would be 99.1 at the Twin Cities campus and 98.7 at the Morris campus.

TABLE 40

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA

Fiscal Year	Student/ Faculty Staffing Ratio ²	Instructional Expenditures/ FYE ³	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	14.30:1	\$3,527	91.82%	\$2,239	87.32%	28.64%	\$2,239	87.32%	28.64%
1983	14.26:1	3,514	91.48	2,114	82.43	31.85	2,114	82.43	31.85
1984	13.94:1	3,596	93.60	2,187	85.30	31.17	2,137	83.34	32.56
1986	13.35:1	3,781	98.43	2,349	91.61	29.74	2,214	86.33	33.33
1988	12.81:1	3,961	103.12	2,508	97.80	28.47	2,315	90.29	33.33
1990	12.63:1	4,016	104.53	2,557	99.71	28.10	2,347	91.52	33.33
1992	12.56:1	4,038	105.11	2,557	100.48	27.96	2,360	92.03	33.33
1994	12.08:1	4,229	110.09	2,744	107.00	26.78	2,467	96.20	33.33
1996	11.69:1	4,393	114.37	2,889	112.66	25.82	2,559	99.80	33.33
1998	11.74:1	4,376	113.92	2,874	112.07	25.91	2,549	99.41	33.33
2000	11.92:1	4,310	112.20	2,814	109.74	26.29	2,511	97.91	33.33

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 41

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - TWIN CITIES

Fiscal Year	Student/ Faculty Staffing Ratio ²	Instructional Expenditures/ FYE ³	Instructional Expenditures FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	13.66:1	\$3,607	92.21%	\$2,221	87.57%	28.90%	\$2,221	87.57%	28.90%
1983	13.62:1	3,581	91.82	2,090	82.38	32.17	2,090	82.38	32.17
1984	13.33:1	3,668	93.77	2,160	85.18	31.52	2,116	83.43	32.72
1985	12.81:1	3,830	97.92	2,300	90.67	30.28	2,183	66.06	33.33
1988	12.32:1	4,002	102.31	2,447	96.46	29.08	2,276	89.75	33.33
1990	12.13:1	4,063	103.87	2,501	98.59	28.67	2,311	91.11	33.33
1992	12.08:1	4,077	104.23	2,513	99.07	28.57	2,319	91.42	33.33
1994	11.65:1	4,261	108.94	2,669	105.21	27.44	2,418	95.32	33.33
1996	11.24:1	4,440	113.50	2,820	111.19	26.43	2,514	99.11	33.33
1998	11.25:1	4,436	113.42	2,817	111.08	26.45	2,512	99.04	33.33
2000	11.43:1	4,369	111.70	2,759	108.76	26.82	2,474	97.55	33.33

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

TABLE 42

PROJECTED INSTRUCTIONAL EXPENDITURES AND STATE APPROPRIATIONS FOR INSTRUCTION
 UNDER PROGRAM FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 UNIVERSITY OF MINNESOTA - MORRIS

Fiscal Year	Student/ Faculty Staffing Ratio ²	Instructional Expenditures/ FYE ³	Instructional Expenditures/ FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures	State Appropriations for Instruction/ FYE	State Appropriations for Instruction/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Instructional Expenditures
1982	15.93:1	\$3,742	88.96%	\$2,852	85.42%	23.50%	\$2,852	85.42%	23.50%
1983	15.92:1	3,684	87.59	2,700	80.89	26.42	2,700	80.89	26.42
1984	15.59:1	3,773	89.69	2,788	83.52	25.80	2,634	78.91	29.87
1986	14.72:1	4,156	98.80	3,170	94.94	23.42	2,758	82.60	33.33
1988	13.94:1	4,486	106.63	3,498	104.77	21.70	2,976	89.14	33.33
1990	13.82:1	4,522	107.50	3,534	105.86	21.52	3,000	89.87	33.33
1992	13.51:1	4,622	109.88	3,634	108.84	21.06	3,066	91.85	33.33
1994	12.73:1	4,929	117.17	3,939	117.99	19.75	3,270	97.94	33.33
1996	12.68:1	4,965	118.04	3,976	119.08	19.60	3,294	98.67	33.33
1998	13.34:1	4,733	112.50	3,744	112.13	20.57	3,140	94.04	33.33
2000	13.61:1	4,637	110.23	3,648	109.27	20.99	3,076	92.14	33.33

1 Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

2 Faculty includes all unclassified staff in regular instructional activities.

3 Direct and support expenditures attributable to regular instruction and supported by state funds.

Core Funding Policy

The core funding policy assumes that enrollment related funding policies may not provide small institutions with sufficient resources to offer a minimum breadth of instructional and support activities. A core funding policy would provide sufficient resources regardless of enrollment levels. The state has funded a core funding policy for Southwest State University. The projections of resource requirements for Southwest State University under current funding policies illustrate the effects of a core funding policy on a four-year institution. The effects of a core funding policy on two-year institutions have been simulated by applying a consultant's suggested core staffing level to the Community College System. Current Community College System allocation policies provide minimum staffing levels through reallocation of system resources. However, as system enrollments decline, this policy will place a growing burden on the larger colleges. A core funding policy would provide additional resources to the system to maintain core staffing. This alternative policy was implemented in 1982, the first year any college fell below minimum staffing.

Community College System

A core funding policy would result in slightly lower staffing ratios and slightly higher levels of expenditures per student for the Community College System than would current funding policies. The projected resource requirements of a core funding policy are illustrated in Tables 43 and 44.

TABLE 43

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER MINIMUM CORE FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 COMMUNITY COLLEGE SYSTEM

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	18.90:1	\$2,167	92.52%	\$1,456	88.71%	25.53%	\$1,456	88.71%	25.53%
1983	18.86:1	2,111	90.11	1,356	82.62	28.18	1,356	82.62	28.18
1984	18.82:1	2,118	90.44	1,364	83.08	28.07	1,315	80.11	30.47
1986	18.63:1	2,179	93.03	1,421	86.56	27.26	1,299	79.16	33.33
1988	18.56:1	2,191	93.55	1,432	87.22	27.10	1,306	79.58	33.33
1990	18.65:1	2,161	92.25	1,403	85.49	27.50	1,288	78.46	33.33
1992	18.48:1	2,224	94.96	1,463	89.13	26.68	1,326	80.81	33.33
1994	18.18:1	2,303	98.33	1,536	93.56	25.73	1,373	83.64	33.33
1996	18.16:1	2,305	98.42	1,538	93.68	25.71	1,374	83.72	33.33
1998	18.18:1	2,303	98.33	1,536	93.55	25.73	1,373	83.63	33.33
2000	18.22:1	2,291	97.81	1,524	92.86	25.87	1,365	83.18	33.33

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

TABLE 44

PROJECTED STUDENT FACULTY STAFFING RATIO, EXPENDITURES, AND STATE APPROPRIATIONS
 UNDER MINIMUM CORE FUNDING WITH CURRENT AND ALTERNATIVE TUITION POLICIES
 IN CONSTANT DOLLARS¹
 F.Y. 1982 - F.Y. 2000
 RAINY RIVER COMMUNITY COLLEGE

Fiscal Year	Student/ Faculty Staffing Ratio ²	Maintenance and Equipment Expenditures (M & E)/ FYE	M & E/FYE as a Percent of F.Y. 1980	Current Tuition Policy			Alternative Tuition Policy		
				State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures	State Appropriations/ FYE	State Appropriations/ FYE as a Percent of F.Y. 1980	Tuition Revenue as a Percent of Net M & E Expenditures
1982	11.30:1	\$3,645	113.40%	\$2,971	116.06%	14.94%	\$2,971	116.06%	14.94%
1983	11.09:1	3,615	112.47	2,896	113.14	16.16	2,896	113.14	16.16
1984	11.12:1	3,612	112.36	2,892	113.01	16.18	2,844	111.10	17.56
1985	10.67:1	3,798	118.16	3,076	120.17	15.37	2,954	115.42	18.64
1986	10.46:1	3,886	120.89	3,162	123.53	15.01	3,036	118.63	18.32
1990	10.62:1	3,810	118.51	3,087	120.60	15.32	2,971	116.09	18.42
1992	10.55:1	3,875	120.55	3,151	123.12	15.05	3,015	117.78	18.66
1994	10.08:1	4,114	127.96	3,386	132.27	14.16	3,223	125.91	18.21
1995	9.88:1	4,193	130.43	3,463	135.31	13.89	3,300	128.92	17.67
1998	9.91:1	4,178	129.96	3,449	134.73	13.94	3,266	128.37	17.92
2000	9.71:1	4,258	132.47	3,528	137.83	13.67	3,369	131.63	17.48

¹ Constant Fiscal Year 1980 dollars adjusted for funding reductions in F.Y. 1982 and F.Y. 1983.

² Faculty include unclassified positions in the following allocation categories--special outreach, student activities, student services, library/audio visual, low ratio occupational, occupational program leadership, and general instruction.

The Community College System student/faculty ratio declines from 18.9 to 1.0 in 1982 to 18.2 to 1.0 in 1996 under core funding. Operating expenditures per student rise to 98.4 percent of 1980 levels or \$22 per student below levels under current funding policies. At the institution level, however, the core funding policy would have more dramatic effects on staffing ratios and expenditures per student. The ratio of students to faculty at Rainy River is 11.3 to 1.0 in 1982, or 1.2 lower than under current policies. By 1996, the ratio declines to 9.9, or 2.6 lower than under current policies. Operating expenditures per student would range from \$286 per student higher than under current policies in 1982 to \$596 per student higher by 1996. Even with the alternative tuition policy, state appropriations per student under core funding would exceed levels under current policies by \$432 per student by 1996.

APPENDIX B. GOALS FOR INVESTMENT IN POST-SECONDARY EDUCATION

GOALS

The Coordinating Board has formally adopted a set of goals to guide the investment of public resources in post-secondary education. The goals are intended to assist decisionmakers in post-secondary education and to provide a framework for the consideration of policies which effect post-secondary education. The goals are:

1. Minnesota should implement funding policies for post-secondary education which provide incentives for the most efficient use of limited resources in the provision of post-secondary education.

Public resources are limited. Therefore, the state should develop finance policies and procedures which provide incentives for systems, institutions and the state to use resources efficiently. Priorities should be developed to guide the reallocation of resources from low need and low priority programs to higher priority programs and areas of emerging demand. Whenever possible, technology should be used to enhance the instructional process and to increase faculty productivity. Without an explicit effort to use resources efficiently and without state-level incentives, limited resources will not be used efficiently.

2. Minnesota should promote the greatest possible effectiveness in all of its post-secondary education programs.

Effective education includes many dimensions which are typically described as quality. Traditionally, high quality institutions and programs have been equated with prestigious faculty teaching students of high aptitude in a comprehensive university. This definition emphasizes investments rather than the results of the educational process. Effective education, in fact, encompasses several dimensions. It is the imparting of knowledge and skills to individuals. It is the preparation of individuals to make material and intellectual contributions to society. It is the discovery of new knowledge in a field of inquiry. The most dramatic and effective education may occur with persons who have previously exhibited little aptitude for learning. Therefore, effective education should be defined as what results from the educational process rather than what is put into it. This definition of effectiveness is based on the concept of "value added" as a consequence of instruction. It permits all institutions to compete equally in the development of effective programs. It focuses on the challenge of using resources effectively to educate students regardless of their aptitude, ability or educational objectives. It also encourages educators and educational institutions to establish

performance standards, specify learning objectives and measure their success in accomplishing each student's goals.

3. Minnesota should support basic and applied research which results in new knowledge and ways to apply new knowledge in socially useful manner.

The quality of life in Minnesota and the nation is related directly to the vitality of the economy. Economic growth is based in part on the development of new knowledge and increased productivity. State support for basic and applied research is essential to the discovery and application of knowledge. State supported research efforts through post-secondary education have been instrumental in the discovery of new knowledge in many areas, including agriculture, the environment, mining, medicine and computer sciences. Minnesota should continue to support basic and applied research in post-secondary education in order to maintain its competitive position in the regional, national, and international economy.

4. Minnesota should provide sufficient resources to enable systems and institutions of offer programs meet the minimum standards consistent with their mission.

Post-secondary education receives support from several sources including the state, students, the federal government, and private contributions. For public institutions, most revenue comes from state appropriations and tuition. Historically, support for public

post-secondary education has been linked closely to enrollments. As the total number of students begins to decline and if current funding policies are maintained, support for post-secondary education will decrease. The cost of some activities, however, are fixed. Total institutional costs do not necessarily decline as enrollments decline. Funding policies and procedures should be adopted which recognize the fixed and variable costs of post-secondary education and which consider the minimum program services which must be provided to offer a creditable educational program consistent with the stated or implied mission of an institution or program. The challenge of adequately funding post-secondary education will be complicated by limited state resources and competition for public funds from other state programs. Nonetheless, an adequate funding base must be provided to ensure the financial integrity of post-secondary education.

5. Minnesota should strive to enable all residents who can benefit from post-secondary education the opportunity to enroll in the institution or program suited to their needs and abilities.

Access to post-secondary education should not be arbitrarily limited because of sex, age, race, income, residence, prior educational achievements, or physical disabilities. To the extent possible, the state should provide financial assistance to students with demonstrated need so they can enroll and complete an educa-

tional program which fulfills their educational objectives and abilities. Completion of an educational program enhances personal opportunities in the employment market, reduces the likelihood of dependency on public assistance programs and contributes to personal satisfaction. For these reasons, investment in student financial aid programs is a wise use of public funds; educated citizens benefit the entire community. The level of state support for student financial aid should be sufficient so that, through a partnership of shared responsibility between the student, his or her family, the state, and the federal government, a variety of choices exists for students. Through this partnership, educational opportunities are provided to students which permit them to achieve realistic career objectives and the vitality of the educational marketplace is enhanced.

6. Minnesota should support a diverse educational system in which systems and institutions possess different and educationally distinctive missions and settings.

Minnesota supports four public post-secondary education systems and provides some assistance to private institutions. Public systems and institutions are responsible, by virtue of tradition and statutory mission, for providing distinctive educational services. The assignment of unique missions to each system attempts to ensure effectiveness and efficiency. Some justifiable overlap does exist in the programs and services offered by each system. The educational programs available in

the public sector are complemented and enhanced by the educational opportunities offered by private institutions. Coordination efforts have limited unnecessary overlap in the development of high cost, graduate and professional programs. As enrollments decline and state revenues are further constrained, however, there may be pressure to expand missions and blur the lines of distinctiveness between systems and institutions. Every effort must be made to maintain these distinctive missions and, if possible, to further enhance them. Systems and institutions must be encouraged to provide a diverse set of instructional programs that are consistent with their mission and varied in their instructional processes in order to meet the broad range of needs for learning.