
Effect of Long Term Debt on the Financial Condition of the State

Department of Legislative Services

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November 24, 1998

The Honorable Barbara A. Hoffman, Co-Chairman
Spending Affordability Committee

The Honorable Nancy K. Kopp, Co-Chairman
Spending Affordability Committee

Dear Senator Hoffman and Delegate Kopp:

The Department of Legislative Services's annual report on the "Effect on Long Term Debt on the Financial Condition of the State" is presented. This report essentially follows the format of previous reports and includes a review of the recommendations of the Capital Debt Affordability Committee, an independent affordability analysis, and a market analysis.

The creation of the Capital Debt Affordability Committee complements the efforts of the Spending Affordability Committee in management of the State's bonded indebtedness. The Capital Debt Affordability Committee, created by an Act of the 1978 General Assembly, is required to submit a recommended level of debt authorization to the Governor and the General Assembly by September 10 of each year. The existence of the committee within the executive branch means that consideration of debt affordability will occur at the time of formulation of the State's capital program, as well as the time of approval of the program by the legislature.

The statistical analysis and data used in developing the recommendations were prepared by Steve McCulloch with assistance by Mary Bewig, Patrick Frank, Benjamin Birge, and Theresa Tuszynski. The manuscript was prepared by Jo Ann Bryan and Ria Hartlein.

Respectfully submitted,

Warren G. Deschenaux
Director

WGD/msh

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Chapter 1. Recommendations of the Department of Legislative Services

New Debt Authorization

The Capital Debt Affordability Committee's recommended debt limit of \$445 million in new general obligation debt authorization is an increase of \$15 million over the recommended debt limit for fiscal 1998. This increase of 3.5 percent is generally consistent with the long range plan adopted by the committee in 1992 to increase the general obligation debt limit by 3 percent each year based on 1 percent growth and 2 percent inflation. This pattern of increase, recommended by the Department of Fiscal Services in its 1991 report, has been more reflective of the actual rate of inflation during recent years than the 4 percent the committee had been using prior to 1992.

In accordance with Section 8-113 of the State Finance and Procurement Article, the Governor notified the General Assembly by letter dated October 15, 1997 on the level of State debt that is advisable. The Governor accepted the recommendation of the Capital Debt Affordability Committee and provided the following preliminary allocation of the \$445 million debt authorization:

	<u>G.O. Debt</u>
State Owned Facilities	\$157,000,000
Grant & Loan Programs	178,000,000
Public School Construction	110,000,000*
Total	\$445,000,000

*The Governor also proposed \$140 million in Paygo capital for school construction for a total of \$250 million in fiscal 2000.

Capital funding requests for fiscal 2000 total \$735.7 million, over 65 percent more than the amount available under the Debt Affordability limit.

Forecasts of personal income and levels of outstanding debt indicate that Maryland's five-year general obligation debt authorization plan will be affordable according to the debt affordability criteria. **The Department of Legislative Services agrees the committee's recommended debt limit for the 1998 Session of \$445 million in general obligation bonds is affordable under the standards of the committee.**

Authorization of Transportation Debt

The Maryland Department of Transportation (MDOT) competes with other State capital projects within debt affordability limits. Transportation debt capacity is limited by the constraints on debt outstanding, debt service coverage, the cash flow needs for projects in the capital program, and overall State debt affordability limits. **It is recommended that the General Assembly continue to set an annual limit on the level of State transportation debt to keep debt outstanding within the 3.2 percent of personal income debt affordability criterion, and debt service within the 8.0 percent of revenues debt affordability criterion. It is also recommended that MDOT reduce its projected debt issuances in fiscal 1999 and 2000, and smooth out its debt issuance stream. This would allow the department to increase its projected transportation capital spending beyond what is currently programmed.**

Higher Education Debt

In fiscal 2000 the University System of Maryland intends to issue \$25 million in academic debt and \$30 million in auxiliary debt. Based on these projections, debt service is expected to equal 4.54 percent of unrestricted current fund expenditures and mandatory transfers. The system's financial advisers have recommended an upper limit of 5.5 percent. **It is recommended that no more than \$25 million in academic revenue projects be authorized for fiscal 2000. It is further recommend that the cap remain at \$750 million. The University of Maryland System has sufficient capacity within the existing cap for the planned issuances.**

General Obligation Debt Service

Debt service on general obligation debt is projected to increase in the next few years and will require increasing general fund support in order to maintain a stable property tax rate. **In order to moderate debt service requirements the General Assembly may wish to limit new authorizations and possibly increase Paygo support of the capital program, and/or substitute Paygo funding for currently authorized but unissued debt to allow this unissued debt to be canceled.**

Higher Education Debt Reporting

Changes in the agency revenue debt procedures resulted in no reporting of higher education debt. **The Capital Debt Affordability Committee should provide in its future reports historical information on higher education debt similar to the information it currently provides on general obligation and transportation debt.**

Chapter 2. Recommendations of the Capital Debt Affordability Committee

New General Obligation Debt Authorization

- Limit new general obligation debt authorization at the 1999 session to \$445 million. This figure is \$15 million more than the prior year's recommendation.
- The long range plan adopted by the Capital Debt Affordability Committee includes annual increases in recommended debt levels of \$15 million per year representing increases ranging from 3.5 percent in fiscal 2000 down to 3.00 percent in fiscal 2005. The annual growth rate over the entire five year period is 3.16 percent. The planned increases are based on providing approximately 2 percent to cover inflation and 1 percent real growth in the capital plan. The following table presents the new long range plan:

<u>Session</u>	<u>Debt Limit (\$ in Millions)</u>
1999	\$445
2000	460
2001	475
2002	490
2003	505
2004	520

Higher Education Academic Debt to be Authorized

Limit new debt authorization for academic facilities to \$25 million for the next fiscal year. The Capital Debt Affordability Committee notes the proposed capital financing programs for the four systems "...result in a debt burden level well below the 10% 'highly leveraged' threshold established by Standard & Poor's..." (CDAC 1998,

pg. 37). The entire amount is planned for academic facilities at University System of Maryland campuses. This recommendation conforms to the legislative intent expressed in Chapter 426 of the Acts of the General Assembly of 1998 that the academic revenue bonds be limited to no more than \$25 million for fiscal 2000.

Chapter 3. Review of the Analysis of the Capital Debt Affordability Committee

The Capital Debt Affordability Committee continues to employ two affordability criteria established in 1979 after analysis of available data including information from rating agencies. (These criteria were reassessed in 1984 and 1988 and found to be valid measures consistent with good management of debt over time.) The affordability criteria are:

- total State tax supported outstanding debt should not exceed 3.2 percent of Maryland personal income; and
- total State tax supported debt service payments should not exceed 8 percent of State tax revenues.

While the committee expanded its focus in 1987 to include all types of State tax supported debt (i.e., transportation, the Maryland Stadium Authority, Bond Anticipation Notes, and capital leases), the fiscal 2000 debt limit of \$445 million applies only to general obligation debt. In 1989 the committee further broadened its review to include higher education academic revenue bonds. Although by law the committee must review the size and condition of this revenue debt, the \$25 million recommended debt limit for academic facilities is in addition to the limit on general obligation debt and is not considered as tax supported debt nor is it subject to the 3.2 percent affordability standard.

The projections of the Capital Debt Affordability Committee indicate that total State tax supported debt outstanding will remain within the 3.2 percent of Maryland personal income limit for the five-year forecast period. The committee's projections indicate that debt outstanding will reach 3.02 percent of Maryland personal income in fiscal 2000 and decline over the following four years to 2.55 percent in fiscal 2004.

Risk Analysis

As in prior years, the committee performed a risk analysis to evaluate the potential for exceeding the affordability criteria under a proposed five-year general obligation bond authorization plan. The four basic risk factors that the committee considered were:

- changes in personal income;
- changes in the definition of tax supported debt;

- changes within the general obligation bond program; and
- changes in the bond issuance plans for other components, including new components of tax supported debt.

Changes in after-the-fact measurement of personal income, as compared to estimates in growth in personal income, are obviously beyond the committee's control. Using a conservative approach in projecting growth in personal income has resulted in subsequent revisions generally indicating additional debt capacity. The committee's projections for personal income are higher than in last year's report due to upward revisions in personal income levels in previous years and to higher assumed growth rates for calendar years 1998 and 1999. The committee felt that there remains risk associated with reductions in the anticipated level of personal income but that even a growth rate of only 4.4 percent for fiscal 1998 through 2000 would raise the debt ratio only seven hundredths of one percent by fiscal 2000. The committee notes that only once during the last 25 years, during the period 1991 through 1993, was the growth in personal income less than 4.4 percent.

According to the committee, internal changes in the definition of what constitutes State tax supported debt resulting from reviews of individual transactions would tend to be minor. However, changes in definition by the bond rating agencies or the Governmental Accounting Standards Board could have a major impact on measured affordability. The committee is unaware of any potential external changes and believes that any external changes would provide ample lead time to allow adjustments to the five-year plan.

Changes within the general obligation bond program were thought most likely to consist of two types. First, changes might occur to the types or costs of certain capital projects. However, since the committee recommends a specific dollar amount and not the use of the funds, this type of change would not affect affordability so long as the total dollar amount is not exceeded. Second, changes might occur in the rate at which authorized bonds are issued. The committee assumes a six-year time period for total issuance of a bond authorization. Any systematic factors that change the rate with which bonds are sold, would affect the ratio of debt outstanding to personal income. To reflect actual issuance rates experienced in recent years, the committee in its fiscal 1998 report revised upward from 25 percent to 31 percent the assumed percentage of general obligation bonds issued within the first year of authorization. The current report continues the assumption that 31 percent of bonds authorized in a given year will be issued in the following year.

Changes in issuance plans for the transportation program, capital leases, the Stadium Authority or any unknown component of State tax supported debt have the potential to affect affordability. The committee identified several factors that might result in changes in issuance plans such as external factors that accelerate or delay a

project, the expansion of existing programs or the starting of new ones that have not been accounted for in the analysis, and unknown changes in bond programs that would be considered State tax supported debt. These types of changes could have a positive or negative impact on the affordability of the five-year capital program.

The committee's risk analysis considers changes in the growth of personal income to be the greatest risk factor with potential changes to the issuance plans of other components of State tax supported debt posing a lesser risk. The committee believes these risks to have a low probability of causing a breach of the affordability criteria limits.

Chapter 4. State Tax Supported Debt

Maryland issues five types of tax supported debt:

- General obligation bonds backed by the full faith and credit of the State.
- Revenue bonds and notes issued by the Department of Transportation backed by operating revenues and pledged taxes of the department.
- Capital leases, annual payments of which are subject to appropriation by the General Assembly.
- Revenue bonds issued by the Maryland Stadium Authority and secured by a lease with the State.
- Tax or bond anticipation notes (TANs/BANs) which may be issued by the Treasurer and which must be repaid within 180 days of issuance.

General Obligation Bonds

General obligation bonds are authorized and issued to pay for the construction, renovation or equipping of facilities for State, local government and private sector entities. Grants and loans are made to local governments and private sector entities when a State need or interest has been identified. Projects funded with general obligation bonds include public and private colleges and universities, public schools and community colleges, prisons and detention centers, hospitals, and low-income housing projects.

Capital Budget Requests for Fiscal 2000 to 2004

Agency requests for fiscal 2000 total \$735.7 million, over 65 percent more than the amount available under the debt affordability limit. Capital requests for the next five years total over \$3.4 billion, while the projected debt limit for the same period totals \$2.4 billion. These figures demonstrate that the number of capital projects proposed far exceeds the ability of the State to appropriate bond funds to provide for capital needs. **Exhibit 4.1** provides a listing of general obligation bond capital requests over the next five years.

Exhibit 4.1
GO Bond Requests: FY 2000 - 2004
(\$ in Millions)

	<u>2000</u>	<u>2001</u>	<u>Fiscal Year</u>		<u>2004</u>	<u>Total</u>	<u>Category Totals</u>
State Facilities			<u>2002</u>	<u>2003</u>			\$331.2
Board of Public Works	\$47.3	\$63.9	\$91.3	\$75.5	\$37.3	\$315.2	
Military	3.3	5.2	0.5	0.6	0.0	9.5	
Veterans	0.0	0.4	3.1	2.8	0.2	6.4	
Health & Social Services							160.7
Health & Mental Hygiene	4.3	11.6	17.4	13.9	15.9	63.2	
Comm. Mental Health Facil.	6.2	7.5	7.0	7.0	7.0	34.7	
Senior Citizen Activity Ctr.	1.5	2.0	2.0	2.0	2.0	9.5	
Juvenile Justice	13.6	6.4	7.2	7.9	10.3	45.3	
Juvenile Resid. Facil. (grant)	2.1	1.5	1.5	1.5	1.5	8.1	
Environment							330.2
Natural Resources	16.2	25.9	36.4	36.8	37.5	152.8	
Agriculture	6.0	6.2	6.4	6.6	6.8	32.0	
Environment	23.0	31.2	32.7	27.1	12.3	126.3	
Md. Environmental Service	5.2	3.5	3.5	3.5	3.5	19.2	
Education							986.4
Education	9.3	1.0	0.0	14.5	13.7	38.5	
Public Sch. Construction ¹	272.4	208.5	169.7	168.9	128.5	947.9	
Higher Education							927.6
Univ. System of Maryland. ²	85.5	95.3	99.4	104.1	111.8	496.1	
Univ. of Maryland. Med. Sys.	16.0	16.0	7.0	7.0	0.0	46.0	
Baltimore City Comm. Coll.	0.5	12.2	2.0	16.3	13.4	44.4	
St. Mary's College	11.0	2.4	0.0	17.0	2.0	32.3	
Morgan State University	6.4	19.8	30.6	55.0	29.3	141.1	
Community Colleges	28.8	27.8	60.3	27.8	22.8	167.6	
Public Safety							237.8
Public Safety	48.5	46.7	42.4	21.6	47.4	206.6	
State Police	4.3	14.7	8.3	0.5	3.5	31.1	
Housing & Economic Development							71.0
Economic Development	0.0	0.0	0.0	0.0	0.0	0.0	
Housing & Comm. Devel.	4.4	7.0	5.2	4.0	4.0	24.6	
Partnership Rental Housing	13.2	13.2	6.0	7.0	7.0	46.3	
Legislative Initiatives	12.5	12.5	12.5	12.5	12.5	62.5	62.5
Miscellaneous							330.1
Miscellaneous	94.3	93.4	45.1	85.7	11.6	330.1	
Total Request	\$735.7	\$735.6	\$697.4	\$727.0	\$541.8	\$3,437.5	\$3,437.5
Debt Affordability Limits	\$445.0	\$460.0	\$475.0	\$490.0	\$505.0	\$2,375.0	

¹Represents LEA requests to the IAC, May 1998.

²In addition to the GO bond request, USM has requested academic revenue bond funding in amounts varying from \$26.5 million in fiscal 2001 to \$15 million in fiscal 2004.

Source: Department of Budget and Management

This listing reflects agency requests and will differ from the list that will appear in the Governor's fiscal 2000 *5-Year Capital Improvement Plan* (CIP).

Bond Issuance Stream

General obligation bonds authorized in a given year are not issued in total the following year. In fact, the Treasurer reports that just over half of the general obligation bonds authorized in a year are typically issued within the next two fiscal years. This delay in issuance results in a substantial lag between the time general obligation debt is authorized and when it has a significant impact in debt outstanding levels.

The bond issuance stream is the key table upon which much of the affordability calculations are based. This table, included as **Appendix 1**, shows how the proposed authorizations for fiscal 1999 through 2008 would be issued. For the six years prior to its 1996 report, the Capital Debt Affordability Committee (CDAC) assumed 100 percent issuance of authorized bonds over a six-year period (25 percent, 25 percent, 20 percent, 20 percent, 5 percent and 5 percent). In its 1996 report, however, the CDAC assumed bonds authorized in a given year would be fully issued in just five years (31 percent, 25 percent, 20 percent, 15 percent and 9 percent). This change was made in response to an increase in the rate of issuances experienced from 1994 to 1996. This increase in the rate of issuances means that new authorizations will impact Maryland's level of outstanding debt, and Maryland's debt affordability capacity, more quickly than in the past. The current report continues the new five year issuance assumption. **It is recommended that the Capital Debt Affordability Committee continue to monitor the rate at which new authorizations are issued and make appropriate adjustments to the issuance assumptions in the future as necessary.**

The table in Appendix 1 also indicates the expected issuances of current authorizations. There is, and has been since 1989, over \$1 billion in authorized but unissued debt. The CDAC report assumes that \$312 million and \$175 million of this debt will be issued in fiscal 2000 and 2001, respectively.

In the past the committee offset the amount of general obligation bonds authorized by \$10 million, assuming that this amount would represent a potential lease conversion project for which general obligation bonds had been authorized. This practice had the effect of placing \$10 million into the issuance stream immediately rather than spreading it over the six year period. Beginning with the 1991 report, the committee assumed there would be no offset in the amount of general obligation bonds issued. Therefore, it placed the full authorization into the six-year issuance stream and showed the amount of capital leases anticipated in a separate column outside of the general obligation debt column. In addition, the committee now anticipates capital leases for equipment as well as energy conservation projects. These changes were made

to recognize that these capital leases were not replacing general obligation authorizations but were being done in addition to the authorizations.

Bond Refunding

The bond sales of May and October 1993 and February 1994, included the refinancing of prior bonds. The May 1993 bond sale included \$147.7 million in refunding principal that was placed into escrow to refund \$130.5 million in prior bonds. Over the term of the bonds this will result in debt service savings of \$5.55 million.

Similarly, the October 1993 bond sale included \$143.1 million in refunding principal that was placed into escrow to refund \$123.4 million in prior bonds. The gross saving on this refinancing will be \$8.8 million. Finally, the February 1994 bond sale included \$64.2 million in refunding principal to refund \$56.7 million in prior bonds. The debt service savings will be \$3.6 million. The annual savings from the three refundings each fiscal year will result in a reduction in the general fund appropriation required in the operating budget under the Annuity Bond Fund to pay debt services on general obligation bonds. Savings per fiscal year is included in **Exhibit 4.2**.

Exhibit 4.2
Fiscal Year Savings as a Result of Refinancing

<u>Fiscal Year</u>	<u>May 1993</u>	<u>October 1993</u>	<u>February 1994</u>	<u>Total</u>
1993	\$40,024	\$0	\$0	\$42,024
1994	917,879	2,669,723	783,295	4,370,987
1995	910,776	492,895	310,473	1,714,144
1996	333,201	472,095	312,665	1,117,961
1997	332,226	470,765	310,828	1,113,819
1998	334,401	470,635	310,215	1,115,251
1999	335,289	471,278	312,380	1,118,947
2000	334,551	468,230	310,145	1,112,926
2001	334,817	470,965	308,260	1,114,042
2002	333,826	467,865	311,667	1,113,358
2003	332,193	467,660	312,837	1,112,690
2004	333,840	470,640	0	804,480
2005	333,748	467,448	0	801,196
2006	333,460	468,463	0	801,923
2007	0	471,213	0	471,213
Total	\$ 5,540,231	\$ 8,799,875	\$ 3,582,765	\$17,922,871

Interest rates have risen since 1993 making additional refundings unlikely in the near future. However, should interest rates fall again to a point where it is determined that there would be sufficient savings to warrant a refunding, such action would be presented to the Board of Public Works for its approval.

New General Obligation Bond Authorizations

The CDAC recommends that new authorizations of general obligation bonds during the 1999 legislative session be limited to \$445 million. This recommendation is consistent with the six-year plan included in CDAC's 1997 report and represents a \$15 million increase over the amount authorized by the General Assembly in the 1998 session. CDAC's six-year forecast of general obligation bond authorization levels continues the \$15 million annual increase that has been projected for the past few years. The projected increases remain slightly in excess of the 3 percent increase target comprised of a 2 percent increase each year to account for inflation and 1 percent increase representing real growth in the State's general obligation capital program. The authorizations and percent increases projected by the committee are as follows:

<u>Session</u>	<u>General Obligation Bond Authorizations (\$ in Millions)</u>	<u>Increase</u>
1999	445	3.5%
2000	460	3.4%
2001	475	3.3%
2002	490	3.2%
2003	505	3.1%
2004	520	3.0%

Transportation Bonds

The Maryland Department of Transportation (MDOT) issues 15-year consolidated transportation bonds which are tax supported debt. Bond proceeds are usually earmarked for highway construction. Revenues from taxes and fees and other funding sources accrue to the transportation trust fund to pay debt service and operating budget requirements, and to support the capital program. Debt service on consolidated transportation bonds is payable solely from the trust fund.

The department previously issued county transportation bonds that were considered both State and county debt and counted toward State debt affordability limits. Chapter 539 of the Acts of 1993 altered this policy by authorizing the department to continue to issue bonds on behalf of the local jurisdictions, without having the local debt apply to State debt affordability limits. Currently this debt counts only toward the debt outstanding of the counties.

Consolidated Transportation Bonds

The issuance of transportation debt is limited by two criteria: an outstanding debt limit and a coverage test. The outstanding debt limit is set by statute. During the 1992 session the outstanding debt limit was increased from \$950 million to \$1.2 billion with the proviso that an annual debt ceiling is to be set annually in the budget bill. The fiscal 1999 budget bill set the maximum ceiling for June 30, 1999, at \$963 million, with an allowance to increase the debt outstanding by another \$20 million provided such an increase is justified to the budget committees prior to the publication of a preliminary official statement.

The bond revenue coverage test, established in the department's bond resolutions, mandates that net revenues and pledged taxes must each equal at least twice (2.0) the maximum future debt service. The department has adopted an administrative policy establishing a minimum coverage of 2.5. MDOT projects that as of June 30, 1999, it will have a maximum outstanding debt of \$959 million with coverage estimated at 3.6 times maximum debt service under the net revenue test, and 5.9 times using the pledged tax test.

The department has issued consolidated transportation bonds in eight of the last ten years. In 1993, \$504 million in bonds was issued to refinance prior year debt, and \$93.6 million was refinanced in 1998. **Exhibit 4.3** shows that the department issued significant levels of debt in the early 1990s. Between calendar 1989 - 1992 MDOT issued \$765 million in new debt. In contrast \$240 million in debt was issued between calendar 1993 - 1998. The department last issued new debt in calendar 1996, when \$50 million in bonds were sold.

Exhibit 4.3
Consolidated Transportation Bond Issuance *

<u>Fiscal Year</u>	<u>Amount</u>
1990	\$260,000,000
1991	310,000,000
1992	120,000,000
1993	75,000,000
1994	40,000,000
1995	75,000,000
1997	50,000,000
Total	\$930,000,000

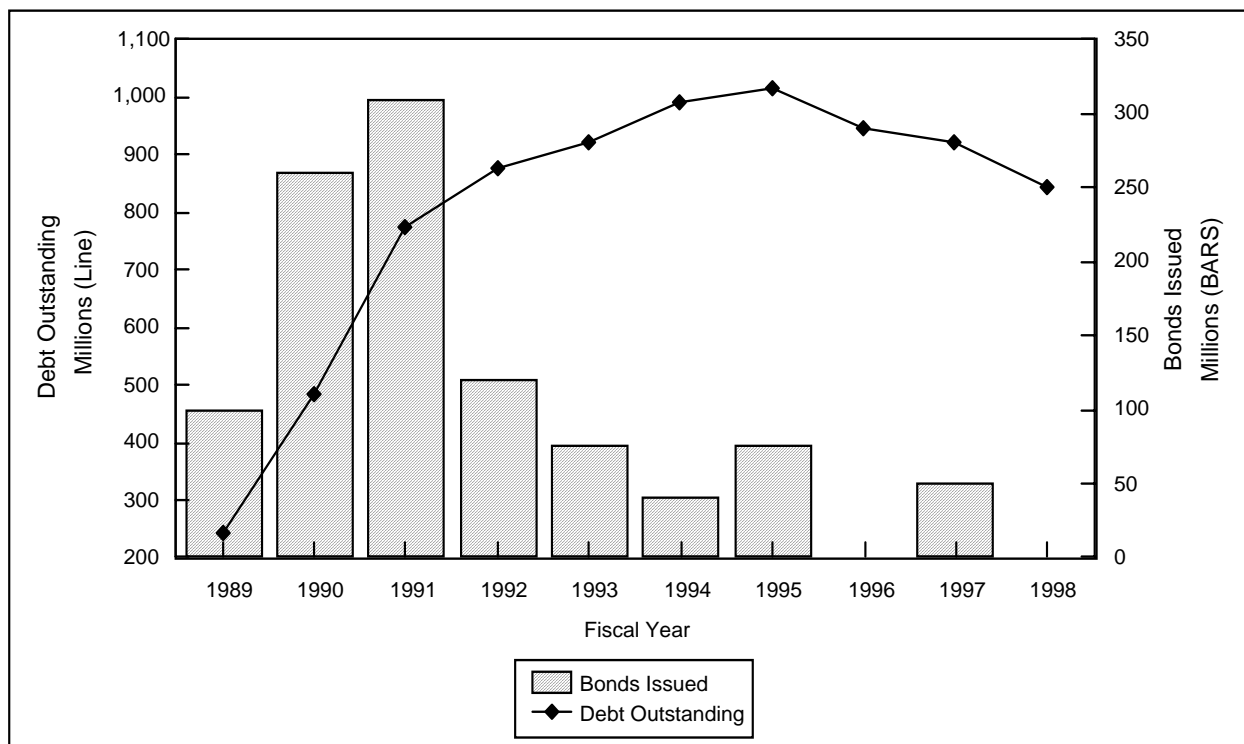
* Exclusive of refinancing

Source: Department of Transportation

Prepared by: Department of Legislative Services, November 1998

As a result of the additional bonds issued, the department's net debt outstanding grew from \$168 million in fiscal 1988 to \$1.015 billion in fiscal 1995. Recently, lower debt issuance coupled with the retirement of debt resulted in debt outstanding dropping to \$844 million at the end of fiscal 1998. **Exhibit 4.4** illustrates annual bond sales and changes in debt outstanding.

Exhibit 4.4
MDOT Bonds Issued and Net Debt Outstanding
Ten Year Summary - Fiscal 1989 - Fiscal 1998
(\$ in Millions)



Source: Department of Transportation

Prepared by: Department of Legislative Services, November 1998

Capital Leases

The Maryland Department of Transportation (MDOT) advises that it may enter into up to \$55 million in tax supported capital leases to renovate and expand Piers A and B at the Baltimore-Washington International Airport. The project involves renovating the piers, expanding Pier B by 10 gates, adding ramps for aircraft, and modifying taxiways. The leases are to be financed through the issuance of Certificates of Participation (COPs). Fees collected from airlines will be used to pay off the COPs. Capital leases are considered tax supported debt and the Capital Debt Affordability Committee's analysis includes this proposed financing.

This latest proposal has been modified from the proposal presented to the budget committees during the 1998 legislative session, which assumed \$25 million in private

sector support for the project. The fiscal 1999 Joint Chairmen's Report (JCR) restricted appropriations for this project until a long-term financing plan is developed and the budget committees have had an opportunity to review and comment on the plan. Consequently, the budget committees will have an opportunity to review the financing plan prior to its implementation. Any issues concerning the plan will be addressed at that time.

Future Debt Issuance

In September 1998, the Capital Debt Affordability Committee (CDAC) issued its report, that included a proposed bond issuance stream for transportation debt through fiscal 2004. The proposed level of debt to be issued for fiscal 1999 through 2004 totaled \$485 million as outlined in **Exhibit 4.5**. No debt would be issued beyond fiscal 2001 due to insufficient revenues to meet the 2.5 coverage test. Debt outstanding would peak at \$1.058 billion in fiscal 2001.

Since the report was issued, DLS has reviewed the fiscal 1998 Transportation Trust Fund (TTF) closeout, and the Bureau of Revenue Estimates has revised its TTF revenue forecasts. Based on higher than anticipated revenues, and deferred capital expenditures in fiscal 1998, DLS has developed an alternative debt issuance stream, also shown in **Exhibit 4.5**. DLS projects that MDOT may reduce its projected debt issuance in fiscal 1999 by \$110 million and in fiscal 2000 by \$40 million. The transportation trust fund's strong financial position also allows the department to increase debt issuance from fiscal 2001 to 2004 by \$452 million. This smooths the debt issuance stream and, consequently, actually increases capital program funding.

Exhibit 4.5
MDOT Projected New Debt Issuance
(\$ in Millions)

<u>Fiscal Year</u>	<u>CDAC Projected Debt Issuance</u>	<u>DLS Projected Debt Issuance</u>
1999	\$210	\$100
2000	185	145
2001	90	202
2002	0	130
2003	0	100
2004	0	110
Total	\$485	\$787

Source: *Report of the Capital Debt Affordability Committee on Recommended Debt Authorizations*, September 1998

Prepared by: Department of Legislative Services, November 1998

Debt Service

Prior to fiscal 1990, the department maintained a debt service reserve whereby two years of principal and interest payments were set aside in a reserve account upon the issuance of bonds. This debt service was then used for the repayment of those bonds. This requirement was eliminated by Chapter 255 of the Acts of 1989 for bonds sold after June 1, 1989. The department currently budgets annual debt service payments in the year that principal and interest are due. The refinancing of prior year debt retired all but two of the bond series issued prior to 1989 that had sinking fund reserve requirements. Final sinking fund deposits for the 1986 and 1988 Series bonds were made in fiscal 1996 and were reflected in the level of net outstanding debt in fiscal 1997.

As a result of the large issuances of debt during the late 1980's, annual debt service requirements have risen 294 percent since fiscal 1989, from \$35 million to \$138 million in fiscal 1999. Based on the CDAC report, annual debt service will continue to increase, with annual payments expected to exceed \$158 million by fiscal 2004.

Future Direction of the State Transportation Capital Program

Declines in capital spending occur over time because transportation revenues (which are not inflation sensitive) do not grow as quickly as expenditures. The department budgets for debt service, operating budget requirements, and capital system preservation needs first, followed by spending for new or ongoing capital projects. Thus as expenditure needs grow, progressively lower levels of funding remain for capital spending.

In the short term, Maryland has benefitted from strong revenue growth and increased federal aid. MDOT estimates that the reauthorization of federal transportation funds for highways and mass transit through the federal Transportation Equity Act for the 21st Century (TEA-21) will provide the capital program with approximately an additional \$110 million annually. This allowed the administration to add \$381 million in new projects to the draft 1999 Consolidated Transportation Program (CTP). The CTP assumes that the department will be able to maintain its capital program at approximately \$950 million in fiscal 2000, and will begin declining in fiscal 2001 to \$800 million. DLS estimates that, based on higher closeout and revenue projections and the bond issuance stream proposed above, MDOT will be able to maintain its current capital program through fiscal 2001 at \$950 million annually. After fiscal 2001 the funding levels decline to approximately \$760 million in fiscal 2002 and \$700 million in fiscal 2003 and 2004.

If major new capital projects are initiated, revenue enhancements may be required. Increases in fuel taxes and related fees were enacted at the 1987 and 1992 sessions. The timing of a future revenue increase will be dependent on an assessment

of State transportation needs as well as the desired magnitude of the transportation capital program.

County Transportation Bonds

Prior to 1993, MDOT issued debt on behalf of the counties and Baltimore City for local projects. These bonds received AA ratings, that were generally more favorable than the rates received on most county bond issues. County transportation bonds were considered debt of both the counties and the State.

Chapter 539 of the Acts of 1993 authorized MDOT to issue bonds for the local jurisdictions that no longer count against State debt affordability limits, but instead count only toward the debt outstanding of the counties. MDOT continues to be responsible for all aspects of administering and issuing debt for the counties. The department charges the counties an administrative fee for servicing the bond issues. Debt service on the bonds was, and will continue to be paid, from the local share of transportation revenues.

In November 1993, MDOT refunded nine series of previously issued county debt. There are two remaining series of county debt that were not refunded, and therefore will continue to count against State debt affordability limits until the issues are retired. As of June 30, 1998, the remaining net principal balance on the 1986 Refunding and 14th Series bonds totaled \$5.3 million. The issues will be retired in fiscal 2007.

Conclusions and Recommendations on Transportation Debt

The MDOT competes with other State capital projects within debt affordability limits. Transportation debt capacity is limited by the constraints on debt outstanding, debt service coverage, the cash flow needs for projects in the capital program, and overall State debt affordability limits. **It is recommended that the General Assembly continue to set an annual limit on the level of State transportation debt to keep debt outstanding within the 3.2 percent of personal income debt affordability criterion, and debt service within the 8.0 percent of revenues debt affordability criterion. It is also recommended that MDOT reduce its projected debt issuances in fiscal 1999 and 2000, and smooth out its debt issuance stream. This would allow the department to increase its projected transportation capital spending beyond what is currently programmed.**

Capital Leases

Beginning in 1987, the State's capital program began utilizing lease/leaseback financing for capital projects. These leases are used to acquire both real property and equipment. Beginning in fiscal 1994, the State instituted a program involving equipment leases for energy conservation projects at State facilities. For real property, the transaction generally involves an agreement in which the State leases property to a developer who in turn builds, or renovates a facility and leases it back to the State. At the end of the lease period, ownership of the facility is transferred to the State. Equipment leases are generally for shorter periods of time, from three to five years. For energy conservation projects, agencies make lease payments using the savings that result from implementation of the conservation projects.

All three types of leases, equipment, energy conservation, and property, have advantages. Often, equipment leases involve high technology equipment, such as data processing equipment or telecommunications equipment. Equipment leases offer the State more flexibility than purchases since leases can be for less than the entire economic life of the equipment. Equipment leases are especially attractive in an environment where technology is changing very rapidly. Leases can also be written with a cancellation clause that would allow the State to cancel the lease if the equipment were no longer needed. Currently the Treasurer's lease-purchase program consolidates the State's equipment leases in order to lower the cost by reducing the interest rate on the lease. The rate the Treasurer receives for the State's \$25 million in equipment leases is less than the rates individual agencies would receive if they financed the equipment leases themselves.

Using the savings realized in utility cost reductions to pay off energy conservation project leases allows projects to proceed that otherwise might not be of high enough priority to be funded given all of the other competing capital needs statewide. Under the program, utility costs will decrease and as the leases are paid off the savings from these projects will accrue to the State.

The primary advantages of property leases when compared to general obligation bonds are that they allow the State to act more quickly if an unanticipated opportunity presents itself. Because of the extensive planning and legislative approval process involved in the State's construction program it often takes years to finance a project. Lease agreements are approved by the Board of Public Works after they have been reviewed by the budget committees. Since the Board of Public Works and the budget committees meet throughout the year, leases can be approved much more quickly than general obligation bonds, which must be approved by the entire General Assembly during a legislative session. Therefore, property leases give the State the flexibility to take advantage of economical projects which are unplanned and unexpected.

Several large lease/leaseback projects undertaken in the past have been initiated at institutions of higher education. These projects, all part of the University System of

Maryland, use student fees to secure the debt. These are projects financed through auxiliary funds rather than general obligation bonds and are not included as tax supported debt by the Capital Debt Affordability Committee.

The first tax supported capital leases were made by the Motor Vehicle Administration that began a program of construction of branch offices financed through lease/leaseback. Five offices were financed through this mechanism before the 1988 General Assembly recommended that the Motor Vehicle Administration resort to the Transportation Trust Fund as its means of financing future branch offices. Several of these projects were refinanced in 1993 at a lower interest rate.

Capital leases were also used to finance the construction of multi-service centers in St. Mary's and Calvert counties. Bonds totaling \$9.3 million covered by the St. Mary's lease were authorized in the 1987 session and bonds covered by the capital lease in Calvert County were authorized in the 1987 and 1990 sessions for a total of \$8.5 million. During 1992, the State Highway Administration financed a headquarters facility through certificates of participation secured by an installment purchase agreement between the State and the financing institution. It also financed a State Highway Administration traffic complex facility. These actions took place outside of the legislative process, but are included as tax-supported debt.

In October 1992, the Board of Public Works after receiving support from the budget committees signed an agreement with Baltimore County to lease/purchase a new district court in Towson. This project was built by the county on county owned land with county financing. If the State does not exercise its option to buy the court facility prior to the completion of the lease agreement period, the State will pay the county annual rent for 15 years. At that time the State will assume ownership of the facility and land.

At the request of the Department of General Services, the Board of Public Works approved an agreement with Prince George's County to lease/purchase the Hyattsville District Court. This project was a fast track, design/build construction project under management by General Services and was built on State owned land using county financing. The State will pay the county annual rent for 15 years unless the State purchases it outright prior to the end of the lease agreement.

In August 1994, General Services requested and received permission from the budget committees to enter into a lease with the Maryland Economic Development Corporation for a building to house the Department of Human Resources' Baltimore City Social Services office. At the end of the 15 year lease, the State will own the building and will have the option of collecting rent from an existing tenant or occupying the entire building.

The original method of accounting for lease purchases of real property within the debt affordability context has changed since the mid 1980's. As originally

envisioned, \$10 million a year in lease purchases was included in the debt affordability calculations to recognize the possibility of a "good deal" arising when the legislature was not in session. The Capital Debt Affordability Committee assumed that the lease purchases would replace projects approved under the general obligation debt limit. Therefore, of the general obligation bonds authorized for issuance in any given year \$10 million would remain unissued, (replaced by lease agreements,) and would be subject to cancellation. Beginning with its 1991 report, the committee's assumption has been that there will be \$10 million in real property capital leases **in addition** to the general obligation bonds authorized each year, and the committee's estimates have projected the issuance of the full general obligation bond authorization each year.

In 1987 the Joint Budget and Audit Committee opposed a separate limit for capital leases that removed certain projects from the competition for funding under the general obligation bond limit. As previously noted, the original reason for establishing a separate \$10 million for capital leases was to handle unanticipated lease/lease back projects. The present use of lease/leaseback creates a system diametrically opposed to the committees 1987 recommendations.

During the 1993 interim, in discussions on the Hyattsville District Court, the authority of the General Assembly to review capital leases was questioned. The Department of Fiscal Services requested the Attorney General's Office to review the procedure by which the budget committees have 45 days to review and comment on proposed capital leases. Advice of counsel indicated that there was no clear requirement for such review process. As a result, the Joint Budget and Audit Committee sponsored legislation during the 1994 session to codify procedures regarding capital leases. This legislation (HB 1282/SB 564) was enacted as Chapter 654 of the Acts of 1994.

It should be noted that while capital lease programs are considered part of State supported debt, they are not included under the general obligation debt limit and therefore, increase the State's capital program to the extent that projects are approved by the Board of Public Works. The Capital Debt Affordability Committee generally includes \$10 million annually for real property leases, \$15 million annually for equipment, and \$10 million annually for energy projects.

Due to slow growth in personal income during the early 1990's, it appeared during the fall of 1996 that the State was in danger of breaching the 3.2 percent of personal income affordability criteria. As part of the effort to prevent this, the CDAC recommended that no new real property capital leases be entered during fiscal 1998 and 1999. The current CDAC projection does anticipate, however, a \$55 million real property capital lease financing through the Department of Transportation for improvements to BWI airport (for a fuller description see the Transportation section, above). The CDAC analysis includes \$10 million per year for real property capital leases for fiscal 2000 to 2003.

Maryland Stadium Authority

Legislation passed by the 1988 General Assembly authorizes the Maryland Stadium Authority to issue debt to a maximum of \$235 million outstanding, \$200 million of which may be issued as tax-exempt debt. The law further allocates the funds as follows (Section 13-712 of the Financial Institutions Article):

- \$85 million in site acquisition and preparation, relocation, demolition and removal, etc.;
- \$70 million for a new baseball stadium; and
- \$80 million for a new football stadium.

Cost estimates for the two stadiums have increased over time. Current estimates on which the latest financing plan is predicated, are compared to prior plans in **Exhibit 4.6**.

Exhibit 4.6
Sport Stadium Cost Estimates
(\$ in Millions)

	<u>Feb '87</u>	<u>Nov '88</u>	<u>Jun '89</u>	<u>Nov '94</u>	<u>Nov '95</u>	<u>July '97</u>
Property acquisition and site preparation	\$72.3	\$99.7	\$99.7	\$99.9	\$99.9	\$99.9
Baseball Stadium	68.4	78.4	105.4	(a) 113.6	(a) 113.6	(a) 113.6
Football Stadium	87.0	87.0	114.0	(b) 186.0	(c) 200.0	(c) 220.0
Total	\$227.7	\$265.1	\$319.1	\$399.5	\$413.5	\$433.5

(a) Increased due to change orders and claims settlements.

(b) Included \$16 million in football related expenses. Construction estimate was \$170 million.

(c) Includes \$10 million for additional parking.

In May 1989, the Stadium Authority sold \$60.8 million in Sports Facilities Lease Revenue Notes for the purpose of property acquisition. These were taxable bonds and were sold in three series:

1989 A - \$24,280,000 due December 15, 1989

1989 B - \$19,115,000 due December 15, 1990

1989 C - \$17,450,000 due December 15, 1992 through 2019

The Stadium Authority sold \$137 million of tax-exempt bonds in November 1989 (series 1989 D). This sale was \$32 million over the amount in the "First Amended Plan of Financing" and enabled the Stadium Authority to make the maximum use of tax-exempt financing. Under federal law, only 25 percent of tax-exempt financing may be used for land acquisition; therefore, the increased cost of the baseball stadium allowed a greater portion of the land acquisition costs to be financed by tax-exempt bonds. In order to accomplish this maximum use of tax-exempt financing, the Stadium Authority received approval from the Board of Public Works to issue bonds totaling \$103.8 million for construction of the baseball stadium. The Stadium Authority then utilized \$33.8 million of proceeds from the \$137 million in Series D bonds together with \$9.6 million in lottery proceeds to defease \$43.4 of taxable bonds (Series A and B).

The \$103.8 million in bonds for construction of the baseball stadium exceeded the \$70 million limit in the statute. (See discussion of Financial Institutions Article Section 13-712 above.) The Board of Public Works, after notification to the Legislative Policy Committee, authorized the Stadium Authority to exceed the internal limits, but not the aggregate limit. Although the bonds outstanding for the baseball stadium (\$103.8 million) exceeded the limit, the bonds outstanding for the site acquisition (\$51.2 million) were less than the limit. In aggregate, the outstanding bonds totaled \$155.0 million or the combined amount of the site acquisition and baseball stadium limits. The balance of the total project cost of \$213.3 million (site acquisition - \$99.7 million and baseball stadium - \$113.6 million) was paid by lottery proceeds (\$50.2 million) and the authority's own-source revenues.

The income from which the authority expects to make debt service payments on all bonds will be derived in the most part from appropriations made pursuant to a lease between the State and the authority. The obligation of the State is subject to legislative appropriation and will be provided from monies derived from sports lotteries. In addition, the authority's debt service may be payable from the annual \$1 million grant by Baltimore City, rental and other income received from the baseball stadium pursuant to the lease between the authority and the Orioles, funds created by the bond resolution, an assignment of a lien on property and improvements financed with the bond proceeds, and an assignment of all rights granted under leases executed between the authority and/or the State and/or the Orioles.

The Stadium Authority covered the cost increases for the baseball stadium through the initiation of a third sports lottery which began in 1990. Although the authority's 1988 financing plan called for the use of a third lottery beginning in 1991, its purpose was to fund the football stadium and not to supplement the baseball stadium.

Bond Refinancing

In 1993, the authority began to look at ways to take advantage of low interest rates to reduce its cost of capital. The Series 1989 C notes (taxable) carried a maximum coupon of 10 percent while the Series 1989 D bonds (tax-exempt) had a maximum rate of 7.60 percent. Comparable rates in 1993 were 7.45 percent and 5.60 percent for the taxable and tax-exempt debt, respectively.

The Stadium Authority entered into a forward refunding and interest rate swap agreement in 1993. The swap agreement has several effects:

- The authority will issue taxable floating rate bonds in December 1998 (Series 1998 A bonds) to refinance the 1989 C notes of \$16.3 million. The Stadium Authority is expected to present this plan to the Board of Public Works on December 2, 1998.
- In December 1999, the authority will issue tax-exempt floating rate bonds (Series 1999 A bonds) to refinance the outstanding Series 1989 D bonds of \$121.4 million.

The total authority payments (consisting of debt service on the Series 1998 A bonds and Series 1999 Bonds, along with financing costs and the net swap payment) are equivalent to the existing debt service on the Series 1989 C notes and Series 1989 D bonds. The Stadium Authority benefitted through receipt of a cash payment of \$15.5 million in April 1996, representing the present value of the debt service savings due to the lower interest rates (1993 rates compared to 1989 rates). These funds were applied to the football stadium construction project.

Debt service on the 1998 A series will consist of 13 semi-annual interest only payments of approximately \$450,000 beginning in June 1999. Principal payments begin in fiscal 2006; combined principal and interest payments range from \$1.4 million to \$1.8 million annually until the bonds are repaid in full in June 2020. The expected coupon rate is 5.50 percent.

The authority also intends to sell \$765,000 in taxable lease revenue bonds (Series 1998 B) on December 15, 1998, to cover issuance costs and the redemption premium. Payments on this series will consist of interest-only payments of approximately \$42,000 annually for fiscal 2000 through 2003 and a principal payment of \$765,000 in December 2003. The rate for this bond is also expected to be 5.50 percent.

Football Financing

On November 15, 1995, the Board of Public Works approved the Memorandum of Agreement between the Maryland Stadium Authority and the Cleveland Browns, that had been signed by those parties on October 27, 1995. The agreement was approved by the National Football League in January 1996. It called for the team, now called the Baltimore Ravens, to lease a new football facility at Camden Yards for 30 years beginning with the 1998 season. The stadium opened in August 1998 and is an open air, natural grass, state of the art football facility seating 68,400 with 108 luxury suites and 7,500 club level seats.

Under the agreement with the team, the Ravens do not pay rent for the use of the facility, but will be responsible for the year-round maintenance, operation, and security of the facility. The Ravens used Memorial Stadium for the 1996 and 1997 seasons rent free with the Stadium Authority's share of the 10 percent admissions taxes covering the costs of operation. The Stadium Authority may participate in the construction of a training facility for the Ravens, although legislative approval would be required since the site would not be at Camden Yards. The Stadium Authority is required to deposit \$200,000 annually into a capital improvement fund so that a balance of \$600,000 is maintained.

Until July 1997, the total project was estimated to cost \$200 million, but that figure was revised to \$220 million in late July as the Stadium Authority presented an amendment to the agreement with the Ravens to the Board of Public Works. The cost of concrete and the general robustness of the State's economy were cited as reasons for the cost overrun. Late in the construction period, the team agreed to pay \$3 million for additional construction work, namely a suite of offices for their use and a second kitchen for the concessionaire. The project is comprised as follows:

	<u>(\$ in millions)</u>
Construction	\$196
Design/construction management	17
Additional parking	<u>10</u>
Total	\$223

The Board of Public Works approved the sale of \$87.565 million in tax-exempt Sports Facilities Lease Revenue Bonds in April 1996, and the bonds were sold that same month. This amount was the maximum available for football stadium debt under the statutory limit of \$235 million in bonds outstanding. The bonds sold at a true interest rate of 5.761 percent with a thirty-year term. The bonds were structured with principal payments beginning in fiscal 2000, after the stadium is completed. Neither capitalized interest nor a debt service reserve fund were included in the bond package

in order to maximize the amount of bond proceeds available for construction. Interest only payments of \$4.3 million in fiscal 1997 and \$4.9 million in both fiscal 1998 and 1999 were paid from lottery proceeds appropriated in the Stadium Authority's budget for those years. Debt service of \$6.42 million annually will be required to make principal and interest payments beginning in fiscal 2000 until fully paid in fiscal 2026.

In December 1997, the Stadium Authority sold \$4.64 million in tax-exempt Sports Facility Revenue Bonds at an interest cost of 4.655 percent. In fiscal 1998, an interest only payment of \$108,000 was made; beginning in fiscal 1999, annual principal and interest payments will average \$580,747 over a ten-year term. Payments will be made from the lottery proceeds appropriated to the Stadium Authority's budget.

To accomplish this financing, the Board of Public Works again revised the internal allocations of the authority's debt limit to allow for \$92,205,000 in football debt. Following the issuance of the Series 1998 refinancing bonds, the authority will have \$232.8 million of tax supported debt outstanding for the Camden Yards Sports Facilities.

The lease revenue bonds are only one component of the football financing plan. **Exhibit 4.7** below describes the complete plan:

Exhibit 4.7
Football Stadium Funding Sources
(\$ in Millions)

Lease Revenue Bonds		
Fiscal 1996, net of issuance costs		\$86.5
Fiscal 1998, net of issuance costs		4.6
Lottery Proceeds		65.6
Balance 6/30/95	\$ 2.8	
Fiscal 1996	20.0	
Fiscal 1997-99	42.8	
Savings from Refunding		
Baseball Bonds		15.5
1996 Football Bonds		2.7
Other Sources		48.1
Interest Earnings	6.3	
Sale of naming rights	10.0	
Payment by Balt. Ravens*	13.0	
Other Authority Sources	18.8	
Total		\$223.0

*HB 1267, enacted during the 1996 session, requires the Ravens to pay the State \$24 million over the life of its lease of the football stadium. The Ravens have agreed to pay up to \$10 million of this amount during the construction of the stadium. The remaining \$3 million is for additional construction work for offices and a kitchen.

The financial plan anticipates that the Stadium Authority will receive \$32 million in lottery revenues annually for fiscal 1997 through 1999. Of this \$96 million

appropriated during the construction period, \$42.8 million will be available for pay-as-you-go financing once the debt service is paid on both the baseball and football bonds. The State Lottery Agency instituted a multi-state lottery in September 1996, The Big Game, with the proceeds directed to the Stadium Authority to supplement the revenue generated by sports-related instant games.

Earlier versions of the financing plan had assumed that the authority would receive as much as \$5 million from the sale of permanent seat licenses (PSLs). This was based on an estimated \$80 million to be raised from the PSLs with the first \$75 million

being credited to the football team. The team's marketing plan for PSLs was scaled back to raise a total of \$68 million, all of which will be retained by the team to cover relocation expenses, debts owed in Ohio, construction of the training facility, and NFL assessments. The Stadium Authority had discussed the possibility of deferring the approved renovations to the Camden Station as a source of funds to cover this shortfall. That project has taken longer than anticipated to get underway, as the Babe Ruth Museum was having trouble accumulating the matching funds needed for its share of the project. A recent gift from the Baltimore Orioles has helped the museum reach its goal, and the project is again progressing. Recent cash-flow projections from the Stadium Authority show the Camden Station project being funded in fiscal 1999 and 2000. The success of the Orioles' 1997 season and increases in ticket prices contributed to the Stadium Authority's improved cash flow.

House Bill 1267 (Chapter 327 of the Laws of 1996) requires that the lease agreement with the Baltimore Ravens include a provision that the team reimburse the authority for \$24 million in stadium construction costs, including the construction, fitting out, and furnishing of the private suites. The act also establishes the Public School Construction Fund that will receive a total of \$24 million from the Stadium Authority, payable at \$2.4 million annually from fiscal 2001 through 2010.

Budget bill language was adopted with the fiscal 1998 budget expressing the General Assembly's intent that no additional State funds (over the contributions outlined in the financing plan adopted in March 1996) would be appropriated to the stadium construction project. The reality of the cost overruns, therefore, required the Stadium Authority to find funds from other sources, with the team being a logical one.

In July 1997, the Board of Public Works approved amendments to the agreement with the Baltimore Ravens that address this issue of funding the stadium's construction costs. First, the amendment established the payment stream for the \$24 million in construction costs to be reimbursed by the team. The team has agreed to pay up to \$10 million on or before June 30, 1999 if needed to pay for "unique design elements" of the construction, with the balance to be paid at \$800,000 annually. Secondly, the team will pay \$10 million on or before December 31, 1997 for construction expenses. In exchange for this additional contribution of \$10 million, and to provide a source of revenue for timely payments toward the \$24 million obligation, the team now owns the rights to sell the name of the football stadium to a corporate sponsor. The team has also

agreed to pay \$3 million for additional construction, both for a suite of offices for the team and for a second kitchen for the concessionaire.

The no-rent provision in the Ravens agreement has allowed the Stadium Authority to issue tax-exempt bonds. A provision in the 1986 Tax Reform Act allows for tax-exempt issues if no rent is charged or if the rent is less than 10 percent of the debt service payment. The Stadium Authority estimates that the tax-exempt debt saves \$1.3 million annually in interest costs compared to taxable revenue bond debt.

Combined Camden Yards Debt and Debt Service

With the December 1998 sale of bonds (as discussed above), the outstanding debt on the Camden Yards Sports Facilities complex will total \$232.8 million as follows:

Series 1989 D Bonds (Baseball)	\$123.915	million
Series 1996 Bonds (Football)	87.565	
Series 1997 Bonds (Football)	4.240	
Series 1998 Bonds (Land Refinancing)	17.100	
Total	\$232.820	million

Beginning in fiscal 2000, annual debt service for these projects totals \$20.7 as follows:

Series 1989 D Bonds (Baseball)	\$11.779	million
Series 1996 Bonds (Football)	6.419	
Series 1997 Bonds (Football)	.588	
Series 1998 Bonds (Land Refinancing)	1.879	
Total	\$20.665	million

Convention Center Financing

Baltimore Convention Center

During the 1993 Session, legislation was enacted (Chapter 400) which authorized the expenditure of \$101 million in State funds to expand and renovate the Baltimore Convention Center. The Maryland Stadium Authority issued the financing plan for expansion of the Baltimore Convention Center that was approved by the Board of Public Works on September 1, 1993. The legislation also provides that operating deficits will be paid one-third by Baltimore City and two-thirds by the State.

The project costs totaled \$178.4 million as set forth below:

<u>Revenue</u>	<u>(\$ in Millions)</u>
State general obligation bonds	\$58.0
Authority lease/revenue bonds	55.0
Baltimore City contribution	50.0
Vendor and utility rebates	13.4
Interest on construction fund	2.0
Total	\$178.4

<u>Expenditures</u>	
Construction	\$172.2
Capitalized interest, revenue bonds	5.7
Issuance costs-revenue bonds	0.5
Total	\$178.4

The State included \$20 million for the expansion project in its October 1993 bond sale, and the Stadium Authority issued \$55 million (including capitalized interest and cost of issuance) in revenue bonds in August 1994. The State provided an additional \$20 million in general obligation bond funding in fiscal 1996 and the final \$10 million of the State's \$50 million general obligation bond funding commitment was provided in fiscal 1997. The remaining \$50 million cost of the center expansion has been borne by the City of Baltimore, which issued \$57 million in city revenue bonds.

Cost overruns became apparent during the budget deliberations in the 1996 session. The Stadium Authority received an additional appropriation of \$8 million in general obligation bonds to cover the escalating price of steel and gypsum. The project was also able to take advantage of \$11 million from Baltimore Gas and Electric for utility rebates (\$6 million) in their energy conservation program and for the construction of a chilled water plant (\$5 million) to serve several downtown blocks. Smaller rebates were received from the concessionaire and the steam company.

Debt outstanding and debt service for the Baltimore Convention Center are included in the debt affordability exhibits. Principal and interest payments for the Stadium Authority bonds total approximately \$4.9 million annually for fiscal 1998 through 2014. (Payments in fiscal 1995, 1996, and 1997 were interest only, at \$3.1 million or less annually.)

Construction of the expansion was completed as scheduled in September 1996. Renovation of the existing center was then undertaken, and the entire facility was open for business in April 1997.

Ocean City Convention Center

The 1995 General Assembly passed HB 1370 (Chapter 603) authorizing the Maryland Stadium Authority to issue revenue bonds for the renovation and expansion of the Ocean City Convention Center. The construction was estimated to cost \$30.75 million with funding split 50/50 between the State and Ocean City. The Maryland Stadium Authority's issuance of \$17.34 million in October 1995 included capitalized interest. In addition, the General Assembly authorized \$500,000 in general obligation bonds in the 1994 session for planning purposes. Although the total project was projected to cost \$34.9 million, savings of \$950,000 resulted during the construction process. The project revenues and uses of funds are set forth below:

<u>Revenue</u>	<u>(\$ in Millions)</u>
State general obligation bonds (1994)	\$.50
Maryland Stadium Authority revenue bonds, inc. capitalized interest (Oct 1995)	17.34
Ocean City contribution (1994)	.50
Ocean City Contribution (Oct 1995)	14.70
Interest on construction fund	1.86
Total	\$34.90
<u>Expenditures</u>	
Planning	\$1.00
Construction	29.80
Contingencies	1.29
Capitalized interest on revenue bonds	1.62
Issuance cost on revenue bonds	0.24
Project savings applied to debt service	0.95
Total	\$34.90

During fiscal 1998, savings in the construction budget became evident. As a result, the fiscal 1999 appropriation from the general fund for debt service on the Stadium Authority bonds was reduced by \$850,000. Stadium Authority officials indicate that approximately \$100,000 more will remain in the project budget upon final closeout. These excess funds will also be applied to debt service, reducing the fiscal 2000 general fund appropriation. Principal and interest payments total approximately \$1.48 million annually for fiscal 1999 through 2016. (Payments in fiscal 1996, 1997, and 1998 were interest only and less than \$900,000 each.)

Under the terms of HB 1370 the Maryland Stadium Authority entered into a written agreement with Ocean City requiring:

- the Maryland Stadium Authority to be in charge of the expansion and renovation project;
- Ocean City to promote, operate and maintain the completed center in a manner which maximizes the centers economic return and keeps the facility in first class operating condition;
- the authority to contribute one-half and the city to contribute one-half to the annual operating deficits of the completed center for the life of the State's bonds (20 years); and
- the authority and the city to each annually contribute \$50,000 to a capital improvement reserve fund for the center.

The bonds issued by the Stadium Authority were not general obligation bonds and thus were not included within the annual general obligation bond limit. They are State tax supported, however, and are thus included within the 3.2 percent affordability standard for outstanding State tax supported debt. The project was completed by the end of 1997.

Montgomery County Conference Center

The fiscal 1995 operating budget contained a \$300,000 grant to provide funds for preparing various studies concerning a Montgomery County Conference Center. In addition the capital budget authorized \$150,000 to assist in the preliminary design of a new center. Chapter 407 of the Laws of 1996 authorizes the Stadium Authority to issue bonds sufficient to contribute \$17,304,000 to the capital costs of this center.

The conference center is planned to include nearly 100,000 square feet of ballroom, meeting, and exhibition space. A 225-room hotel is also planned for the complex that is to be located in Rockville, across from the White Flint Metro station. Marriott International and Quadrangle Development are partners with the Stadium Authority and county in the project. In all, the complex represents a \$60 million

investment.

The total cost of construction of the conference facility is estimated at \$27.5 million. The State has agreed to participate at 50 percent of that total (\$13.75 million). In addition, the Stadium Authority's bonds provide an amount equivalent to the first 36 months of debt service (\$3.554 million) on the bonds to be issued by Montgomery County for its 50 percent share of construction costs. Bond issuance costs are estimated at \$300,000 for the Stadium Authority bonds. Montgomery County has an agreement to purchase a 12-acre parcel on the west side of Rockville Pike for \$7.5 million from the Washington Metro Area Transit Authority. In June 1998, the County Council gave final approval to the rezoning of the property to allow for the development of the center. Modifications to the original plans for traffic flow and parking were modified by the county in light of community opposition and issues raised by a zoning hearing examiner. Legal appeals are on-going to have the rezoning overturned; a court ruling is expected before the end of 1998.

Pending the conclusion of all legal actions, the Stadium Authority will resume the design process. The Montgomery County Council has approved the business agreements with the private-sector partners, and the county intends to submit those agreements to the Board of Public Works in December 1998. Sale of the bonds could occur toward the end of fiscal 1999, with ground-breaking in late summer or early fall. Construction would then take 20 to 24 months.

Under the terms of Chapter 407, the Maryland Stadium Authority will enter into a written agreement with Montgomery County requiring:

- that Montgomery County contribute \$10.2 million for the capital construction costs;
- that any cost overruns or savings on the construction of the center be shared equally between the State and the county;
- that both the Stadium Authority and the county each own a 50 percent leasehold interest as tenants in common for the duration of the Stadium Authority's bonds;
- Montgomery County to market, promote and operate the center in a manner that maximizes its economic return;
- Montgomery County to maintain the facility in a first class operating condition; and
- Montgomery County to be solely responsible for all expenditures relating to the operation of the center, including any net operating deficits (the county will keep any operating profits).

The bonds to be issued by the Stadium Authority are not general obligation bonds and thus are not included within the annual general obligation bond limit. They

are State tax supported, however, and are thus included within the 3.2 percent affordability standard, with the sale anticipated during fiscal 1999.

Bond Anticipation Notes (BANS)

In response to the savings and loan crisis in May 1985, the General Assembly authorized \$100 million in general obligation bonds. The State utilized the authorization as security for the issuance of Bond Anticipation Notes (BANS). The final BANS redemption occurred in fiscal 1990 and during the 1990 session the \$100 million general obligation bond authorization was canceled.

Early in the land acquisition phase of the new baseball stadium, the Maryland Stadium Authority issued \$18 million in Bond Anticipation Notes. These were retired with funds from the first bond sale.

There are no plans to issue additional BANS at this time nor is there debt outstanding on BANS.

Chapter 5. Economic Factors and Affordability Analysis

Economic factors have a strong influence on whether a particular level of debt is affordable under the criteria adopted by the State. Maryland personal income levels and revenues make up one half of the affordability calculations. Changes in these factors can have a profound effect.

Personal Income

The Department of Legislative Services' estimates of personal income differ from those of the Capital Debt Affordability Committee. The Department of Legislative Services is predicting a slightly higher level of growth for calendar years 1998 through 2003 than is used by the CDAC for those years. This results in the Legislative Services' estimate exceeding that of the CDAC by \$538 million in 1998 and increasing to \$2.9 billion in 2004. **Exhibit 5.1** compares Legislative Services' estimates of personal income with those of the CDAC.

Exhibit 5.1
Maryland Personal Income - Historical Data and Projections
Comparison of DLS and CDAC Projections
(\$ in Millions)

Calendar Year	DLS		CDAC		DLS - CDAC
	Personal Income	% Change	Personal Income	% Change	
1996	\$140,047	4.9%	\$140,047	4.9%	\$0
1997	148,019	5.7%	148,019	5.7%	0
1998	156,300	5.6%	155,762	5.2%	538
1999	164,217	5.1%	163,306	4.8%	911
2000	172,754	5.2%	171,407	5.0%	1,347
2001	181,752	5.2%	179,962	5.0%	1,790
2002	190,998	5.1%	188,587	4.8%	2,411
2003	200,891	5.2%	198,113	5.1%	2,778
2004	211,202	5.1%	208,316	5.2%	2,886

Source: DLS 1987 - 1996 Bureau of Economic Analysis
 1997 - 2003 Department of Legislative Services
CDAC CDAC report, September 1997

Changes in personal income have a large impact on the affordability of the State's debt level. Lower personal income results in higher ratios of debt outstanding for any given level of debt. Levels of outstanding debt that were projected to be affordable in past years may suddenly be close to or over the limit if poor economic conditions result in sizable downward revisions. Improvements in personal income levels have the opposite effect and improve the affordability picture.

Revenue Projections

Exhibit 5.2 presents revenue projections to fiscal 2004. The Department of Legislative Services is projecting slightly higher revenues for fiscal 1999 through 2004 than is the CDAC. Most of the difference is in the general fund and transportation revenue estimates. The Department of Legislative Services' total fiscal 1998 revenues number is lower than CDAC's reflecting the lower actual general fund number from the fiscal 1998 closeout.

Exhibit 5.2
Maryland State Revenue Projections
(\$ in Millions)

<u>Fiscal Year</u>	<u>General Fund</u>	<u>Property Taxes</u>	<u>Transp.</u>	<u>Stadium Related</u>	<u>Total DLS Revenues</u>	<u>CDAC Revenues</u>	<u>DLS - CDAC</u>
1997	\$7,622.0	\$236.0	1,293.0	\$22.0	\$9,173.0	\$9,173.1	\$0
1998	8,051.0	240.8	1,333.0	24.5	9,649.3	9,658.4	(9.1)
1999	8,150.0	242.1	1,355.0	25.1	9,772.2	9,665.0	107.2
2000	8,429.0	250.0	1,346.0	29.5	10,054.5	10,027.4	27.1
2001	8,678.0	256.3	1,383.0	30.2	10,347.5	10,305.5	42.0
2002	8,919.0	262.7	1,419.0	30.8	10,631.5	10,604.7	26.8
2003	9,239.0	269.2	1,457.0	30.8	10,996.0	10,959.6	36.4
2004	9,613.0	276.0	1494	30.8	11,413.8	11,325.0	88.8

Source:

General Fund: Per DLS October report to the Spending Affordability Committee
 Property Tax: 1997 - 1998 Commission on State Debt
 1999: State Treasurer's Office
 2000 - 2004 Department of Legislative Services
 Transportation: 1997 - 1998: Department of Transportation
 1999 - 2004: Department of Legislative Services
 Stadium: CDAC Report, September 1998
 CDAC: CDAC Report, September 1998

Revenue levels are factored into the debt service criteria. Higher revenues result in lower ratios of debt service to revenues. Conversely, when revenue growth is slow, higher debt service to revenue ratios occur.

Affordability Analysis

Exhibits 5.3 and 5.4 incorporate the debt limits recommended by the CDAC along with the personal income and revenues estimated by the Department of Legislative Services to determine compliance with the established guidelines for debt affordability. Exhibit 5.3 shows that, for the forecast period, debt outstanding as a percent of personal income peaks in fiscal 1999 at 2.93 percent and steadily declines until it reaches 2.67 percent in fiscal 2004. These ratios are well below the affordability limit of 3.2 percent and are a marked improvement over the 1996 estimates which, due to lower personal income projections, showed the outstanding debt ratio reaching the 3.2 percent limit in 1998.

Exhibit 5.4 shows that debt service as a percent of revenues starts at 6.35 percent in fiscal 1999 and climbs to 7.04 percent and 7.03 percent in fiscal 2003 and 2004 respectively. These ratios, as in past forecasts, are well below the 8 percent affordability criteria. However, acceleration of the current income tax reduction, or an increase above the current 10 percent planned reduction with the resultant decrease in general fund revenues, could push the debt service-to-revenue ratio much closer to the 8 percent level. This would make the debt service affordability criteria more of a limiting factor on the State's debt issuance whereas in the past the 3.2 percent debt outstanding as a percentage of personal income has been the limiting factor in the State's debt management.

Exhibit 5.3
State Tax Supported Debt Outstanding
Components and Relationship to Personal Income

Fiscal Year	General Obligation (a)(b)	Department of Transportation (c) Consolidated (d)	County	Total	Capital Leases	Stadium Authority	Total Tax Supported Debt
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State Tax Supported Debt Outstanding (\$ in Thousands)

1995	2,619,069	1,015,167	15,198	1,030,365	125,191	204,520	3,979,145
1996	2,859,935	946,685	10,200	956,885	115,778	307,185	4,239,783
1997	3,025,394	923,885	5,637	929,522	98,351	302,905	4,356,172
1998	3,270,627	844,015	5,261	849,276	90,301	297,740	4,507,944
1999	3,500,293	849,000	4,736	853,736	159,093	292,255	4,805,377
2000	3,673,842	895,000	4,177	899,177	175,595	284,295	5,032,909
2001	3,804,806	1,020,000	3,582	1,023,582	185,150	277,140	5,290,678
2002	3,893,491	1,064,000	2,944	1,066,944	188,574	268,860	5,417,869
2003	4,007,836	1,066,000	2,270	1,068,270	191,159	260,050	5,527,315
2004	4,142,041	1,063,000	1,549	1,064,549	189,555	237,545	5,633,690

State Tax Supported Debt Outstanding as a Percent of Personal Income
(Affordability criteria standard = 3.2%)

1995	1.96%	0.76%	0.01%	0.77%	0.09%	0.15%	2.98%
1996	2.04%	0.68%	0.01%	0.68%	0.08%	0.22%	3.03%
1997	2.04%	0.62%	0.00%	0.63%	0.07%	0.20%	2.94%
1998	2.09%	0.54%	0.00%	0.54%	0.06%	0.19%	2.88%
1999	2.13%	0.52%	0.00%	0.52%	0.10%	0.18%	2.93%
2000	2.13%	0.52%	0.00%	0.52%	0.10%	0.16%	2.91%
2001	2.09%	0.56%	0.00%	0.56%	0.10%	0.15%	2.91%
2002	2.04%	0.56%	0.00%	0.56%	0.10%	0.14%	2.84%
2003	2.00%	0.53%	0.00%	0.53%	0.10%	0.13%	2.75%
2004	1.96%	0.50%	0.00%	0.50%	0.09%	0.11%	2.67%

(a) Reflects presumed new authorizations as follows:

General Assembly Session:	1999	2000	2001	2002	2003	2004
For Fiscal Year:	2000	2001	2002	2003	2004	2005
(millions)	\$445	\$460	\$475	\$490	\$505	\$520

(b) Assumes debt service on minibonds is paid at maturity and no minibond put options are exercised.

(c) Net of sinking funds or debt service reserve funds.

(d) Does not include the following:

(1) Transfers of \$25, \$40, and \$10 million from the Transportation Authority to the Department of Transportation in fiscal 1991, 1992, and 1993. DOT transferred \$25 million per year in fiscal 1995-1997; (2) The authority investment of \$11.9 million for the development of Berth 4 at the Seagirt Marina Terminal. The department is repaying this amount in annual payments of \$567,280 including interest over a 33-year period; (3) Financing the construction of the Masonville Terminal during fiscal 1999 in the amount of \$20 million to be repaid in annual payments of \$1,674,000 including interest over a 20 year period; (4) \$24 million to be transferred by the authority during fiscal 1999 to the department. The department will transfer \$12 million during fiscal 2002 and \$12 million during fiscal 2003.

(e) Assumptions: (millions)	1999	2000	2001	2002	2003	2004
G.O. issues	\$475	\$450	\$429	\$410	\$458	\$483
DOT issues	100	145	202	130	100	110
Stadium Authority issues	18	0	0	0	0	0
Capital Leases - Equip. & EPC	25	25	25	25	25	25
Real Property	55	10	10	10	10	10
Personal Income (billions)	164	173	182	191	201	211

Exhibit 5.4
State Tax Supported Debt Service
Components and Relationship to Revenues

<u>Fiscal Year</u>	<u>General Obligation</u>	<u>Department of Transportation</u>			<u>Capital Leases</u>	<u>Stadium Authority</u>	<u>Total Tax Supported Debt Service</u>
	(a)	<u>Consolidated</u>	<u>County</u>	<u>Total</u>			
		(b)	(c)				
State Tax Supported Debt Service (\$ in thousands)							
1995	374,178	100,626		100,626	31,702	16,154	522,660
1996	382,147	121,406		121,406	32,015	17,412	552,980
1997	392,733	135,693		135,693	36,316	22,033	586,775
1998	417,543	142,768		142,768	25,220	24,474	610,005
1999	418,498	137,000		137,000	25,242	25,072	605,812
2000	466,475	143,000		143,000	28,826	29,536	667,837
2001	493,687	124,000		124,000	36,741	30,244	684,672
2002	519,949	137,000		137,000	43,465	30,815	731,229
2003	548,899	151,000		151,000	43,283	30,810	773,992
2004	560,792	167,000		167,000	43,545	30,832	802,169
State Tax Supported Debt Service as a Percent of Revenues							
(Affordability criteria standard = 8%)							
1995	5.11%	8.12%		8.12%	0.43%	100.00%	6.09%
1996	5.14%	9.63%		9.63%	0.43%	100.00%	6.34%
1997	5.00%	10.49%		10.49%	0.46%	100.00%	6.40%
1998	5.04%	10.71%		10.71%	0.30%	100.00%	6.32%
1999	4.99%	10.11%		10.11%	0.30%	100.00%	6.20%
2000	5.37%	10.62%		10.62%	0.32%	100.00%	6.64%
2001	5.53%	8.97%		8.97%	0.41%	100.00%	6.62%
2002	5.66%	9.65%		9.65%	0.47%	100.00%	6.88%
2003	5.77%	10.36%		10.36%	0.46%	100.00%	7.04%
2004	5.67%	11.18%		11.18%	0.44%	100.00%	7.03%

(a) Forecast assumes debt service on minibonds is paid at maturity and no minibond put options are exercised.

(b) Does not include the following:

(1) Transfers of \$25 million per year in fiscal 1995 through 1997 from the Department of Transportation (DOT) to the Transportation Authority (TA) to repay the TA for the transfer of \$25, \$40, and \$10 million in fiscal 1991, 1992, and 1993; (2) Annual payments of \$567,280 beginning in fiscal 1999 from the DOT to the TA to repay the Authority's \$11.9 million investment for the development of Berth 4 Seagirt Marine Terminal; (3) Annual payments of \$1,674,000 beginning in fiscal 2000 for the DOT to repay the Transportation Authority's \$20 million financing of the Masonville Auto Terminal; (4) \$12 million transfer per year in fiscal 2002 and 2003 from the DOT to the TA to repay a \$24 million transfer in fiscal 1999.

(c) Repayments from counties equal or exceed debt service requirements.

(d) Includes \$30 million early redemptions of Series 1979 and 1980.

(e) Transfers from the Stadium Facilities Fund to the Stadium Authority are assumed to be just sufficient, when coupled with the Authority's own-source revenues, to meet debt service requirements.

The debt outstanding ratios based on Legislative Services' personal income estimates are slightly lower in the first half of the forecast period than the ratios estimated by the CDAC, and slightly higher in the second half than those of the CDAC. The lower ratios result from Legislative Services' higher estimates of personal income. In the second half of the forecast period, the higher levels of transportation debt outstanding contained in the Legislative Services forecast lead to the higher ratios. **Exhibit 5.5** compares the two sets of debt outstanding ratios.

Exhibit 5.5
Comparison of Debt to Personal Income Ratios

<u>Fiscal Year</u>	<u>DLS</u>	<u>CDAC</u>
1999	2.93%	3.01%
2000	2.91%	3.02%
2001	2.91%	2.96%
2002	2.84%	2.82%
2003	2.75%	2.69%
2004	2.67%	2.55%

Chapter 6. Non-Tax Supported Debt

In addition to the five types of tax supported debt that Maryland issues, there are various forms of non-tax supported debt that are issued by State agencies and non-state public purpose entities. While this debt is not backed by the full faith and credit of the State and is not included within the tax supported debt criteria, a default in payment of debt service on this debt could negatively impact other Maryland debt.

Revenue Bonds

Debt service on revenue bonds is generally derived from the revenue generated from facilities built with the bond proceeds. The Department of Housing and Community Development's Community Development Administration (CDA) makes housing loans with revenue bond proceeds and the mortgage payments help pay debt service. Likewise the Maryland Transportation Authority constructs toll facilities with bond proceeds and the tolls collected pay off the bonds. Other State agencies issue bonds for various purposes.

Debt Issuance

Growth in the amount of non-tax supported agency debt has been a concern of both the General Assembly and the Capital Debt Affordability Committee. During the 1989 session the General Assembly passed SB 337 in an attempt to establish a measure of control over agency debt. This legislation was vetoed by the Governor who addressed the issue through the issue of Executive Order 01.01.1989.13 that established a procedure whereby the Governor set a revenue bond debt ceiling each year and allocated the debt allowance among the State agencies. The Department of Budget and Management was tasked with administering the process and was required to submit a report annually on the amount of agency debt outstanding. During the 1997 interim, a workgroup comprised of DBM staff and staff from agencies that issue revenues bonds, met to review the provisions of the executive order and make recommendations for improvement. The workgroup recommended removing higher education institutions from the process because their levels of debt are already limited by statute. Additionally, the CDA Infrastructure Program was recommended for removal from the process because debt of that program is issued on behalf of local governments and is not a debt of the State. Finally, the workgroup recommended changes in reporting dates and notification requirements. It was decided that prior notification of issuances need be made only for issuances of \$25 million or more. On February 10, 1998, the Governor instituted the recommendations of the workgroup by signing Executive Order 01.01.1998.07 superceding the 1989 process. The new order is included as Appendix

2. **Exhibit 6.1** shows the allocations and issues for fiscal 1997 and 1998 and the issuance levels for 1999.

Exhibit 6.1
State Agency Debt Allocations and Issuances
(\$ in Millions)

Agencies Subject to Allocation Cap	FY 1997			FY 1998			FY 1999
	---Allocation---			---Allocation---			Issuance Levels (a)
	<u>Original</u>	<u>Final</u>	<u>Issued</u>	<u>Original</u>	<u>Final</u>	<u>Issued</u>	
Balt. Comm. College	--	--	--	--	(a)		
CDA - Local Infra.	\$7,500	\$15,000	\$9,860	\$10,000	(a)		
MD Environ. Service	10,000	5,000	3,546	16,500	\$16,500	\$1,250	\$8,000
MD Food Ctr. Auth.	--	--	--	--	--	--	10,000
Morgan State Univ.	--	--	--	5,000	(a)		
St. Mary’s College	--	--	--	--	(a)		
MD Trans. Auth.	--	--	--	--	--	(b)	30,000
Univ. System of MD	70,000	70,000	55,000	60,000	(a)		
Water Qual. Fin. Ad.	--	--	--	50,000	50,000	--	50,000
Total	\$87,500	\$90,000	\$68,406	\$141,500	\$66,500	\$1,250	\$98,000

(a) Executive Order 01.01.1998.07, effective February 7, 1998, requires debt issuance levels only for Maryland Environmental Service, Maryland Food Center Authority, Maryland Transportation Authority, and the Water Quality Financing Authority.

(b) The Maryland Transportation Authority issued \$16.380 million of refunding bonds during 1998; under the new Executive Order, debt issuance levels apply only to issuances net of refundings.

Source: Department of Budget and Management. *Debt Issued by Maryland State Agencies and Independent Authorities: Fiscal year 1998*, November 1998.

Private Activity Bonds

Agency debt not subject to the Executive Order is funded through private activity bonds. The Community Development Administration, the Maryland Industrial Development Financing Authority and the Maryland Energy Finance Authority issue private activity bonds to fund projects. These bonds are subject to the unified volume cap set in federal tax law. Originally imposed by the Tax Reform Act of 1986, the unified volume cap set a ceiling on annual tax-exempt private activity bond volume for each state equal to the greater of \$50 per capita or \$150 million. The Omnibus

Appropriation Act of 1998 contains provisions to increase the cap to the greater of \$75 per capita or \$225 million. The increase is to be phased in from federal fiscal 2003 to 2007. The only tax-exempt private activity bonds not subject to the cap are those issued for nonprofit organizations, for government owned airports, docks, wharves, solid waste facilities, and for other public properties.

The unified volume cap legislation also imposed a 50/50 split of the volume cap between State issuing authorities and local issuing authorities that is subject to change should the Governor or legislature propose an alternative allocation. Unused capacity under the unified volume cap that is not used during the year in which it is received may be carried forward for a period of three years.

Debt Outstanding

Exhibit 6.2 summarizes the increase in debt outstanding for various categories between the years 1988 and 1998. A table containing debt outstanding by year for the individual agencies included in the summary is included as Appendix 3.

Between fiscal 1988 and 1998 general obligation bond and State capital lease debt outstanding has increased by 57.2 percent. Over the same period, agency debt subject to the Governor's issuance cap has increased by \$326.1 million, an increase of 154.4 percent. Agency debt that is not subject to the Governor's cap (excluding debt of the Maryland Industrial Financing Authority for which debt outstanding figures for years prior to 1997 is unavailable), has grown by over \$1.6 billion, an increase of 94.8 percent.

Although agency debt is not considered an obligation of the State, the Capital Debt Affordability Committee noted in its 1988 report that:

...the default of such debt can have a dramatic impact upon the general credit worthiness of a state even when no appearance of a moral obligation exists. In 1983, the Washington Public Power Supply System defaulted on \$2.25 billion in tax-exempt bonds issued to build two nuclear power generating plants. This default had a negative impact upon bond market conditions for issuers throughout the Pacific Northwest. (p. 31)

Additionally, increased revenue debt is felt by the citizens of Maryland in the form of higher fees and tuition at State colleges and universities, and as higher utility and other service fees.

In November 1994, the Legislative Auditor issued a report on State created entities that issue revenue bonds. The report stated that there were no indications of

problems regarding either debt service coverage ratios or bond ratings, but that periodic review of this debt was advisable.

Exhibit 6.2
Debt Outstanding as of June 30th
(\$ in Millions)

	<u>1988</u>	<u>1998</u>	<u>% Change</u>
Agency debt subject to issuance cap	211.2	537.3	154.4%
Agency debt not subject to issuance cap*	1,719.3	3,349.9	94.8%
General obligation & State lease debt	2,138.4	3,360.8	57.2%
Transportation debt	168.0	844.0	402.4%
Public purpose/private debt	1,206.1	2,821.0	133.9%

*Excluding Maryland Industrial Financing Authority debt for which debt outstanding numbers prior to 1997 are unavailable.

Source: CDAC Report 1998 and Department of Budget and Management

In December 1996, Moody's Investor Services placed under review for possible downgrade Multiple-Family Housing Revenue Bonds issued by the Maryland Community Development Administration (CDA) under its 1982 parity indenture. Moody's also indicated its intent to expedite its review of CDA's single-family housing bonds. Moody's concerns were prompted by its review of audited statements of the Maryland Housing Fund (MHF) which insures a portion of the loans financed with proceeds of CDA housing revenue bonds. Moody's questioned the adequacy of the MHF insurance reserves given increased expenses related to provision for possible insurance and loan losses. The Department of Housing and Community Development moved swiftly to address Moody's concerns. The department restructured the single-family housing program so that the bonds will no longer rely on the MHF. A new multi-family bond indenture that does not rely in the MHF had already been created in November 1996. These actions along with other changes in the management of the MHF and bond programs led Moody's to reaffirm the AA ratings for both the multi-family and single-family housing bonds. This experience highlights the importance of continual review of agency debt activities.

Debt Service on Academic Revenue Bonds

Chapter 93 of the Acts 1989 gave Morgan State University, St. Mary's College, and the University System of Maryland (USM) the authority to issue bonds for academic and auxiliary facilities. Chapter 208 of the Acts of 1992 granted the same authority to Baltimore City Community College. Academic facilities are those primarily used in the instruction of students. Classrooms, for example, are academic facilities. Auxiliary facilities are those that produce fees or revenues from the use of the facility. A residential dormitory is an example of an auxiliary facility. Debt service on auxiliary and academic debt may be paid from auxiliary and academic fees, a State appropriation expressly authorized for that purpose, or revenues from contracts, grants or gifts.

The statute specifies that academic facilities must be expressly approved by an act of the General Assembly that determines both the project and bond issue amount. Each year, the University System of Maryland Administration introduces legislation entitled Auxiliary and Academic Facilities Bonding Authority that lists the specific academic projects that require authorization. This legislation may also increase the USM total debt limit when warranted. In fiscal 1999, the debt limit was raised to \$750 million. According to the projections contained in the Report to the Capital Debt Affordability Committee, the debt limit for the University System of Maryland will not need to be raised until fiscal 2002. To date, only USM has issued academic debt.

Exhibit 6.3 provides a summary of academic revenue bond debt service payments for the University of Maryland System between fiscal 1994 and 2000. Since academic revenue bonds have a twenty-year maturity, each bond issuance means that debt service will be spread over many years. For example, bonds issued in fiscal 2000 will impact USM's operating budget through fiscal 2020.

In 1995, the Board of Regents adopted a policy recommended by consultants that limits the percentage of unrestricted funds and mandatory transfers used for debt service to 5.5 percent. In fiscal 1999, total debt service will be approximately 4.0 percent of that total. Though the percentage of unrestricted funds used for debt service is below the recommended limit, the forecast is for the percentage to exceed 5.2 percent by fiscal 2004. The debt service recommendation was based on 10 criteria, of which the system rated favorably in seven. Three areas that warrant monitoring were endowment, debt to endowment, and unrestricted funds as a percentage of debt. Should the system resolve the concerns raised by the consultant's study, it could then consider increasing its debt service payment ceiling. Since 1993, the debt to endowment ratio and the unrestricted fund to debt service ratio have gotten worse which will prevent consideration of raising the debt service payment ratio in the near term.

During the 1998 legislative session, the General Assembly enacted Chapter 426, the annual authorization for academic revenue debt to be issued for the upcoming fiscal year. The bill was amended to state the General Assembly's intent that for fiscal 2000,

the USM should limit the amount of academic revenue bonds to no more than \$25 million. Based on the legislation and the information contained in the Capital Debt Affordability Committee's September 1998 report, USM intends to issue approximately \$25 million in academic debt and \$53 million in auxiliary debt in fiscal 2000. If \$25 million in debt is issued, the total USM debt outstanding (principal only) will be approximately \$697 million in fiscal 2000, which is still within the current debt limit. Based on the projections in **Exhibit 6.4**, the total debt outstanding will exceed the current limit of \$750 million by fiscal 2002.

It is recommended that no more than \$25 million in academic revenue projects be authorized for fiscal 2000. It is further recommend that the cap remain at \$750 million. The University System of Maryland has sufficient capacity within the existing cap to issue \$25 million in academic and \$53 million in auxiliary debt.

Exhibit 6.3
University System of Maryland
Academic Facilities Bonds Debt Service

<u>Institution</u>	<u>Projects</u>	<u>Amount Authorized</u>	<u>FY 1994</u>	<u>FY 1995</u>	<u>FY 1996</u>	<u>FY 1997</u>	<u>FY 1998</u>	<u>FY 1999</u>	<u>FY 2000</u>
<u>FY 1990</u>									
College Park	Coll. of Business & Mgmt./Sch Pub Affairs	18,205,000							
College Park	A.V. Williams Modular Research, Phase II	16,755,000							
Salisbury	New Academic Building	16,055,000							
	Total	51,015,000	4.6	4.6	4.6	4.6	4.6	4.6	4.6
<u>FY 1991</u>									
College Park	Animal Science Bldg. Addn/Alt, Phase II	15,935,000							
Eastern Shore	Academic/Extension Center	7,900,000							
Baltimore County	Facilities Renewal (HVAC- Soc. Sc. Bldg.)	600,000							
Frostburg	Music/Theater Facility	17,180,000							
	Total	41,615,000	3.8	3.8	3.8	3.8	3.8	3.8	3.8
<u>FY 1992</u>									
Baltimore County	Kuhn Library Addition	19,240,000							
CEES	Geochemistry Facility	5,710,000							
College Park	Computer & Space Sciences Bldg., Ph 1	15,280,000							
College Park	Renov. of Skinner Hall	2,470,000							
	Total	42,700,000	3.3	3.3	3.3	3.3	3.3	3.3	3.3
<u>FY 1993</u>									
College Park	Plant Sciences Building		40,000,000	2.5	2.5	2.5	2.5	2.5	2.5
<u>FY 1994</u>									
Various	Facilities Renewal	6,482,000							
at Baltimore	Health Sciences Facility	1,201,000							
CEES	Geochemistry	535,000							
Bowie State	Bowie Utilities Upgrade	1,003,000							
UMES	Physical Education	400,000							
Bowie State	Marshall Library	193,000							
at Baltimore	Physical Plant Shops	4,127,000							
at Baltimore	University Center	300,000							
College Park	Health & Human Performance III	7,974,000							
College Park	Music Theater	2,240,000							
	Total	24,455,000		0.6	2.5	2.5	2.5	2.5	2.5

Exhibit 6.3 (Continued)
University System of Maryland
Academic Facilities Bonds Debt Service

<u>Institution</u>	<u>Projects</u>	<u>Amount Authorized</u>	<u>FY 1994</u>	<u>FY 1995</u>	<u>FY 1996</u>	<u>FY 1997</u>	<u>FY 1998</u>	<u>FY 1999</u>	<u>FY 2000</u>
<u>FY 1995</u>									
College Park	Music Theater	4,439,000							
at Baltimore	Health Sciences Library	25,485,384							
at Baltimore	Health Sciences Facility (Equipment)	3,250,000							
Salisbury	Holloway Hall	8,537,876							
	Total	41,712,260			0.9	1.8	2.9	3.3	3.4
<u>FY 1996</u>									
College Park	Music Theater	40,000,000				2.0	3.0	3.3	3.3
<u>FY 1997</u>									
College Park	Music Theater	23,500,000							
Various	Facilities Renewal Projects*	16,500,000							
	Total	40,000,000				0.1	2.0	3.0	3.3
<u>FY 1998</u>									
College Park	Steam Plant Improvements	7,609,000							
College Park	Music Theater	1,242,000							
College Park	TAP Replacement Facility	745,000							
Towson	7800 York Road	7,000,000							
UMBI	Medical Biotechnology Ctr.	1,500,000							
Various	Facilities Renewal	11,904,000							
	Total	30,000,000					1.0	1.5	2.4
<u>FY 1999</u>									
at Baltimore	School of Law	1,654,000							
	School of Nursing	1,500,000							
College Park	Symons Hall	1,265,000							
	Performing Arts Center	3,048,000							
Baltimore County	Power Plant	10,298,000							
Various	Facilities Renewal	13,735,000							
	Total	31,500,000							2.8
Total Debt Service			14.2	14.8	17.6	20.6	25.6	27.8	31.9

Exhibit 6.4
University System of Maryland
Capital Program Financing Program
(\$ in Millions)

	<u>1999</u>	<u>2000</u>	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>	<u>Total</u>
Projected University Debt Issuances							
Academic Revenue Bonds	25	25	25	25	25	25	150
Auxiliary Revenue Bonds	53	53	53	53	53	53	318
Subtotal	78	78	78	78	78	78	468
 State General Obligation Bonds	 51	 55	 70	 52	 69	 55	 352
 Total	 129	 133	 148	 130	 147	 133	 820
 USM Academic and Auxiliary Debt Outstanding as of June 30	 650	 700	 725	 725	 725	 725	

Source: Fiscal 2000 Capital Debt Affordability Report, USM 5-year Capital Improvement Program, and University System of Maryland Headquarters

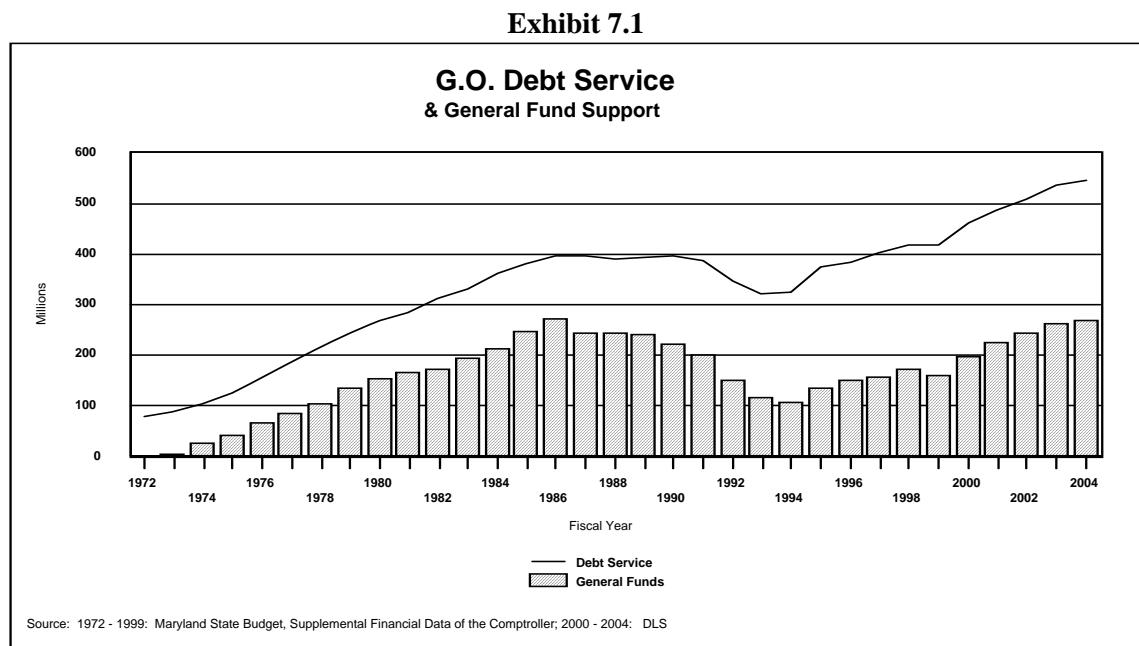
Prepared by: Department of Legislative Services

Chapter 7. Issues

This section discusses issues related to Maryland debt and debt management.

General Obligation Debt Service

Concern has been expressed recently about the increases in general obligation debt service that are projected for the next few years. In particular, concerns focus on the ever increasing general fund support that will be necessary to pay debt service while maintaining a stable property tax rate. From a historic perspective, debt service has only recently exceeded the levels experienced in the mid-eighties and general fund support of debt service won't reach the \$270 million level experienced in fiscal 1986 until after fiscal 2004. **Exhibit 7.1** shows the historical debt service from fiscal 1972 and projected debt service to fiscal 2004. Appendix 4 provides the data in table format.



There are essentially three ways to moderate debt service requirements:

- **Pay Down Existing Debt:** Reduce debt service by decreasing the amount of debt outstanding. This can be accomplished by defeasing bonds, a process

whereby sufficient funds are placed in escrow to pay the principal and interest when due, or calling bonds, whereby bonds are actually paid off before they mature. Defeating bonds removes them from the State's balance sheet but does not result in savings since the full principal and interest are paid when due. Calling bonds, however results in savings since the principal is paid early and interest payments are avoided. Calling bonds usually requires payment of a premium on the principal amount so that the savings realized is less than the interest payments avoided. Not all bonds are callable. Maryland has typically only put call provisions on bonds maturing later than ten years after sale. Of the \$3.5 billion in currently outstanding debt, only \$1.5 billion is callable with first call dates ranging from the present to the year 2008.

- **Reduce the Planned Authorizations of New Debt:** The Capital Debt Affordability's long term plan includes annual increases in general obligation bond authorization levels of \$15 million per year. These authorization assumptions are the basis for the projected level of debt service noted in the chart above. Slowing or eliminating the growth in new authorizations will result in decreased debt service in the future. The impact of reducing authorizations is not felt immediately due to the issuance pattern. Only half the bonds authorized in a given year are authorized over the following two years. It typically takes five years for an authorization to be fully issued. Further, there is currently over \$1 billion in authorized but unissued debt. Due to these existing authorizations, bond issues in the near term might remain the same despite reductions in planned new authorizations. If new authorizations were capped at the fiscal 1999 level of \$430 million, and planned issuances were decreased each year by the amount equal to the reductions in authorizations, the debt service requirement for fiscal 2000 would be \$169,000 less than under current projections and by fiscal 2004 debt service would be nearly \$10 million less than current projections. Reducing the authorizations would require a curtailment of the capital program or an increased reliance on paygo funding of the capital program.
- **Substitute General Funds for Currently Authorized but Unissued Debt:** Section 8-126 of the State Finance and Procurement Article provides for the reduction of authorized but unissued State debt in the event other funds are appropriated to pay for the projects. Thus, funds could be provided in the fiscal 2000 budget to replace unissued bond funding for projects authorized in previous sessions. Unlike reducing planned authorizations, substituting paygo for bond authorizations could take effect immediately. For example, bonds issues totaling \$450 million are currently planned for fiscal 2000. If \$50 million in paygo is provided in the budget to replace previously authorized but unissued bonds, the fiscal 2000 issues could be reduced to \$400 million resulting in savings of \$2.25 during the first two years (when interest only payments are made) and \$5.1 million per year for the remaining 13 years the bonds are outstanding.

Higher Education Debt Reporting

The new executive order governing agency revenue debt (discussed in chapter 6) removed higher education debt from the issuance limits and reporting requirements. Higher education debt was exempted from this process because the level of debt is controlled through the Title 19 of the Education Article. However, as a result, historical information on higher education debt issues, debt service, and debt outstanding is no longer included in the agency debt report prepared by the Department of Budget and Management and presented to the General Assembly in November of each year. Since the Capital Debt Affordability Committee has the responsibility to take higher education debt into account as part of the affordability analysis when making its recommendations on authorization of new State debt, the report of the Capital Debt Affordability Committee is the logical place for information on higher education debt to be reported. The CDAC report already provides this historical information for general obligation debt and transportation debt. **It is recommended that the Capital Debt Affordability include in its future reports historical information on higher education debt issues, debt service, and debt outstanding in a form similar to information provided on general obligation and transportation debt.**

Chapter 8. Market Analysis

This section deals with the market for Maryland's securities, and in particular, how Maryland's general obligation bonds compared to various national scales.

Delphis Scale

Because of the tremendous size of the State and municipal bond market, there are independent companies that gather information about the yield on State and municipal bonds. One such independent company, the Delphis Hanover Corporation, prepares an index that measures the average yield on State and municipal bonds based on daily market activity (Delphis Scale). The Department of Legislative Services has reviewed Maryland's bond yields on the day of sale or day prior to sale from 1990 to the latest sale in 1998 in relation to the Delphis Scale in order to help assess how well the State is performing compared to average yield. (The Treasurer's Office maintains a subscription to the Delphis Hanover Scale and uses this in reviewing Maryland's bond sales.) Maryland's bond yields were compared to the ten-year bond index¹ for AAA and AA+ bonds.

The Treasurer's Office believes the yield on Maryland bonds in the past may have been higher than the yield on AAA and AA+ bonds because of the different institutional setting surrounding the sale of Maryland's bonds and the bonds measured in the Delphis Scale. Maryland's bond sales are "wholesale" transactions to a syndicate of bond brokers, while the Delphis Scale measures transactions on the secondary market. Because Maryland deals with a syndicate at the "wholesale" level, the bonds are sold at a higher yield. The Delphis Scale, however, only measures the transactions in the secondary market, after the bond brokers have already placed the bonds on the market. Because these market transactions tend to have lower yields than the "wholesale" transactions, the Delphis Scale tends to have a lower yield. Although the Delphis Scale is not directly comparable with Maryland's bonds, the relationship is important. A significant change in relationship would raise a question and signal a need for closer review.

¹ The ten-year index is used because Maryland's bonds are serial bonds, that repay the principal over a number of years, whereas the Delphis Scale measures the yield on term bonds, that pay back all their principal in a single payment at the end of the bond life. In order to adjust the Maryland bonds to the Delphis Scale, it is necessary to determine the average maturity of the Maryland bonds, and then compare the average maturity of the Maryland bonds to the corresponding maturity of the Delphis Scale. The average maturity of Maryland bonds is ten years, thus the ten-year bond index is used.

A review of **Exhibit 8.1** indicates some variation between the yield on Maryland bonds and the Delphis AAA and AA scale. During 1990 to mid 1992 the average yield for the sale of Maryland bonds was slightly above the ten-year bond on the Delphis AAA scale. During 1993 and early 1994, the yield on Maryland bond sales was at or slightly below the Delphis AAA scale. Since the October 1994 sale, the yield on Maryland's bond sales returned to being slightly above the Delphis AAA scale.

Exhibit 8.1
Interest Rates on Maryland Bonds*
Compared with the Delphis Hanover Ten-Year Scale

<u>Date of Sale</u>	<u>Rate on MD Bonds</u>	<u>Delphis Hanover AAA</u>	<u>MD Rate as % of AAA Rate</u>	<u>Delphis Hanover AA+</u>	<u>MD Rate as % of AA+ Rate</u>
02/07/90	6.67	6.55	101.8%	6.65	100.3%
06/27/90	6.78	6.60	102.7%	6.70	101.2%
09/26/90	7.00	6.90	101.4%	7.00	100.0%
03/13/91	6.31	6.15	102.6%	6.25	101.0%
07/10/91	6.37	6.20	102.7%	6.30	101.1%
10/09/91	5.80	5.70	101.8%	5.80	100.0%
05/13/92	5.80	5.75	100.9%	5.85	99.1%
01/13/93	5.38	5.40	99.6%	5.50	97.8%
05/19/93	5.10	5.10	100.0%	5.20	98.1%
10/06/93	4.45	4.45	100.0%	4.55	97.8%
02/16/94	4.48	4.50	99.6%	4.60	97.4%
05/18/94	5.36	5.35	100.2%	5.45	98.3%
10/05/94	5.69	5.50	103.5%	5.60	101.6%
03/08/95	5.51	5.35	103.0%	5.45	101.1%
10/11/95	4.95	4.80	103.0%	4.90	100.9%
02/14/96	4.51	4.35	103.6%	4.45	101.3%
06/05/96	5.30	5.10	103.9%	5.20	101.9%
10/09/96	4.97	4.90	101.5%	5.00	99.4%
02/26/97	4.90	4.70	104.3%	4.80	102.1%
07/30/97	4.64	4.50	103.1%	4.55	102.0%
02/18/98	4.43	4.25	104.2%	4.30	103.0%
07/08/98	4.57	4.40	103.8%	4.45	102.6%
Average	5.41	5.30	102.1%	5.39	100.3%

*Maryland rate expressed as True Interest Cost (TIC).

Source: Department of Legislative Services and Delphis Hanover

Bond Buyer Index

The Bond Buyer prepares on a weekly basis four indices of the yields of general

obligation bonds. Of these four indices, the Department of Legislative Services uses the Bond Buyer Index of 20 general obligation bonds, and the Bond Buyer Index of 11 general obligation bonds to determine how well Maryland's general obligation bonds are performing. The Bond Buyer Index 20 is an index of 20 bonds with 20 year maturities and an average quality of A1. The Bond Buyer Index 11 is a subset of the Bond Buyer Index 20, that measures 11 bonds, with 20 year maturities with an average quality of AA.

For the past 15 years, Maryland's bonds have consistently outperformed the Bond Buyer Index 20 and Index 11. The average yield of the Bond Buyer Index 20 and Index 11 since 1982 are 6.80 percent and 6.68 percent, respectively, while Maryland has an average yield of 5.99 percent. From 1983 to the beginning of 1988, Maryland's yield was especially low, when compared to the Bond Buyer Index 20. Since 1988, however, Maryland's yield has been much closer to the indices. (See **Exhibit 8.2**).

The spread between Maryland's general obligation bonds and the Bond Buyer Index 20 and Index 11 it is to be expected. Maryland's superior performance can be explained by the fact that the indices measure bonds with 20 year maturities, while Maryland's longest maturity is 15 years and the average maturity of a Maryland bond is about 10 years. The second reason that Maryland's general obligation bonds perform comparatively better is because the Bond Buyer Index 20 has an average rating of A1 and the Bond Buyer Index 11 has an average rating of AA, while Maryland's bonds are rated AAA. While confirming the superior quality of Maryland's AAA bonds, this information only provides a measure of the spread between Maryland's bonds and those of other states.

Although it isn't clear why the spread narrowed between 1988 and 1991, the narrowing of the spreads did coincide with two changes in Maryland's bidding procedures that were instituted in December 1987. The first major change in bidding procedures was the introduction of a call feature that would clearly lead to an increase in the yield on Maryland's general obligation bonds. While the call feature has particular value to the State at a time of high interest rates, and has resulted in the State's ability to refinance certain bonds, it would appear to have little value when the interest rates are at low levels.

The second major change in bidding procedures was the allowance of bond discounts in the bids which should serve to decrease the yield on Maryland bonds. If these changes in bond procedures are the reasons for the narrowing of the spread between Maryland's yields and the Bond Buyer Index, then it appears that the ability of syndicates to include discounts in bids is not sufficient to offset the additional yield that investors demand for the call provisions.

Exhibit 8.2
Interest Rates on Maryland Bonds*
Compared with The Bond Buyer Indexes for the Thursday Following Sale

<u>Date</u>	<u>Rate on MD Bonds</u>	<u>Index of 20 G.O. Bonds</u>	<u>MD Rate as % of 20 Bond</u>	<u>Index of 11 G.O. Bonds</u>	<u>MD Rate as % of 11 Bond</u>
06/07/83	8.31	9.70	85.7%	9.45	87.9%
02/08/84	8.18	9.56	85.6%	9.40	87.0%
08/15/84	8.78	10.02	87.6%	9.90	88.7%
02/19/86	6.50	7.44	87.4%	7.34	88.6%
06/25/86	6.68	7.59	88.0%	7.43	89.9%
06/17/87	6.44	7.63	84.4%	7.49	86.0%
12/09/87	6.91	8.10	85.3%	7.94	87.0%
04/27/88	6.60	7.77	84.9%	7.63	86.5%
10/05/88	6.72	7.53	89.2%	7.42	90.6%
02/08/89	6.83	7.38	92.5%	7.28	93.8%
06/28/89	6.59	7.02	93.9%	6.93	95.1%
02/07/90	6.67	7.20	92.6%	7.06	94.5%
06/27/90	6.78	7.27	93.3%	7.13	95.1%
09/26/90	7.00	7.53	93.0%	7.36	95.1%
03/13/91	6.31	7.13	88.5%	6.97	90.5%
07/10/91	6.37	7.07	90.1%	6.92	92.1%
10/09/91	5.80	6.66	87.1%	6.52	89.0%
05/13/92	5.80	6.54	88.7%	6.41	90.5%
01/13/93	5.38	6.17	87.2%	6.08	88.4%
05/19/93	5.10	5.77	88.4%	5.68	89.8%
10/06/93	4.45	5.30	83.9%	5.21	85.4%
02/16/94	4.48	5.42	82.7%	5.33	84.1%
05/18/94	5.36	6.14	87.3%	6.04	88.7%
10/05/94	5.69	6.50	87.5%	6.41	88.8%
03/08/95	5.51	6.18	89.2%	6.00	91.8%
10/11/95	4.95	5.82	85.0%	5.74	86.2%
02/14/96	4.51	5.33	84.6%	5.23	86.2%
06/05/96	5.30	5.94	89.2%	5.84	90.7%
10/09/96	4.97	5.73	86.8%	5.63	88.3%
02/26/97	4.90	5.65	86.8%	5.55	88.3%
07/30/97	4.64	5.23	88.7%	5.15	90.1%
02/18/98	4.43	5.07	87.4%	5.00	88.6%
07/08/98	4.57	5.12	89.2%	5.06	90.3%
Average	5.99	6.80	87.9%	6.68	89.5%

*Beginning Dec. 1987, interest rates are reported in True Interest Cost (TIC) rather than Net Interest Cost (NIC).

The Treasurer's Office believes that the narrowing of the spreads is primarily a function of a change in the yield curve. Since Maryland's bonds tend to be shorter term than the Bond Buyer Index bonds, changes in the relationship between interest rates of bonds with different maturities would impact the spread between the Maryland yield and the Bond Buyer Index.

Proposed General Obligation Authorizations and Estimated Issuances
(\$ in Millions)

General Assembly Session	Proposed Authorizations	-----Estimated Issuances During Fiscal Year (a)-----										Total Issued
		1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	
	(b)											
1999	445	0	138	111	89	67	40	0	0	0	0	445
2000	460		0	143	115	92	69	41	0	0	0	460
2001	475			0	147	119	95	71	43	0	0	475
2002	490				0	152	123	98	74	44	0	490
2003	505					0	157	126	101	76	45	505
2004	520						0	161	130	104	78	473
2005	535							0	166	134	107	407
2006	550								0	171	138	308
2007	565									0	175	175
2008	580										0	0
Total		0	138	254	351	429	483	498	513	528	543	3,738
Current Authorizations (b)	1,050	475	312	175	59	29	0	0	0	0	0	1,050
Total Issuances		475	450	429	410	458	483	498	513	528	543	4,788
Sales	First	250	225	210	210							
	Second	225	225	219	200							
	Total	475	450	429	410							

Notes:

(a) Percentage issuance assumptions by fiscal years:

Fiscal year following year of authorization:	1st	2nd	3rd	4th	5th
Percent of original authorization	31%	25%	20%	15%	9%

(b) Net of \$3 million - the remaining bonds authorized by the Outdoor Recreation Loan of 1969 that are unissued at June 30, 1998.
This amount will be canceled.

Source: Report of the Capital Debt Affordability Committee, September 1998.

Appendix 2



The State of Maryland

Executive Department

EXECUTIVE ORDER

01.01.1998.07

Debt Issued by State Entities

(Rescinds Executive Order 01.01.1989.13)

- WHEREAS, In 1989, the Governor issued Executive Order 01.01.1989.13 pertaining to debt issued by State Agencies;
- WHEREAS, Since 1989, certain statutory changes have provided greater review and management of higher education debt; and
- WHEREAS, Experience has disclosed certain economies and improvements in the process of monitoring and coordinating the issuance of debt by State entities.
- NOW, THEREFORE, I, PARRIS N. GLENDENING, GOVERNOR OF THE STATE OF MARYLAND, BY VIRTUE OF THE AUTHORITY VESTED IN ME BY THE CONSTITUTION AND THE LAWS OF MARYLAND, HEREBY RESCIND EXECUTIVE ORDER 01.01.1989.13 AND PROCLAIM THE FOLLOWING ORDER, EFFECTIVE IMMEDIATELY:
- A. Definitions.
- In this Executive Order the following words have the meanings indicated:
- (1) "Board" means the Board of Public Works;
 - (2) "Department" means the Department of Budget and Management;
 - (3) "Secretary" means the Secretary of the Department of Budget and Management;
 - (4) "State entity" means any agency or instrumentality of the State other than the Board of Public Works;
 - (5) "Debt" means a bond, note, bond anticipation note, capital lease, or any other evidence of indebtedness; and
 - (6) "Transaction" means the issuance of debt.

B. Duties of the Department of Budget and Management.

The Department is assigned the responsibility for monitoring levels of debt of certain State entities. Specifically, the Department shall:

- (1) Recommend to the Governor the level of annual debt issuances for certain State entities;
- (2) Report annually on the levels of debt issued and outstanding by certain State agencies;
- (3) Serve as the coordinating agency for issuances of debt by State agencies and instrumentalities; and
- (4) Arrange for centralized procurement, when appropriate.

C. Issuance Amounts.

(1) After consultation with the State entities, each year the Department shall recommend to the Governor for the next fiscal year the amount of debt, net of refunding debt, that may be issued by each of the following entities:

- (a) Maryland Environmental Service;
- (b) Maryland Food Center Authority;
- (c) Maryland Transportation Authority; and
- (d) Maryland Water Quality Financing Administration.

(2) On or before March 15 of each year, the Department shall notify the affected State entities and the Board of the amounts as set by the Governor for the next fiscal year and shall cause the amounts to be published in the *Maryland Register*.

(3) During the fiscal year, the Governor may increase or decrease the amounts by notice to the Department. The Department shall notify the affected State entity and the Board of any change and shall cause such changes to be published in the *Maryland Register*.

(4) If a State entity does not issue all of its approved amounts during the fiscal year, such unused portion may not be used in any succeeding fiscal year.

(5) The Secretary may add other State entities that issue non-tax supported debt not otherwise limited by law to those listed in Section C.(1) of this Executive Order.

D. Reporting Requirements.

(1) No later than October 1 of each year, each State entity that issues debt not otherwise limited in amount by State law shall report to the Department for the previous fiscal year:

(a) For each transaction, the title, amount, and other information required by the Department; and

(b) The amount of debt outstanding at the beginning of the fiscal year, issued during the fiscal year, redeemed, refunded, or otherwise retired during the fiscal year, and outstanding at the end of the fiscal year.

(2) By November 1, the Department shall report to the General Assembly, subject to the provisions of Section 2-1312 of the State Government Article, and to the Board on the transactions, the level of outstanding debt, and the levels of debt issued and redeemed in the preceding fiscal year.

E. Notification.

Any State entity planning a transaction of \$25,000,000 or greater principal amount shall provide notice to the Department at least 30 days prior to the transaction. The notice may take the form of a preliminary official statement, if available. If no such statement is available, the notice shall include:

(1) The purpose of the transaction;

(2) The proposed sale date;

(3) The nature of the transaction;

(4) The proposed principal amount of the transaction; and

(5) Any other information which the Department may request.

This notice shall be in addition to any notice required under other provisions of law or regulation.

F. Financial Services and Technical Assistance.

(1) Upon recommendation of the Governor, the Board may delegate to the Treasurer procurement of any financial services and technical assistance required in connection with the issuance of debt, but the fees for such services shall be paid from the proceeds of the transaction or other funds as provided.

(2) At the request of the Governor, the Treasurer may issue debt on behalf of a State entity.

G. Compliance with Executive Order.

(1) The Secretary may waive or extend any deadlines for action under this Executive Order, other than any action to be taken by the Governor. Any waiver or extension shall be in writing.

(2) At the request of any State entity, the Secretary shall:

(a) Certify the amount of debt that may be issued by such State entity as of the date of such certification; or

(b) Certify compliance with Section E. of this Executive Order.

GIVEN Under My Hand and the Great Seal of the State of Maryland, in the City of Annapolis, this 10th Day of February, 1998.



Parris N. Glendening
Parris N. Glendening
Governor

ATTEST:

John T. Willis
John T. Willis
Secretary of State

Debt Outstanding As of June 30th
(\$ in Millions)

	<u>FY88</u>	<u>FY89</u>	<u>FY90</u>	<u>FY91</u>	<u>FY92</u>	<u>FY93</u>	<u>FY94</u>	<u>FY95</u>	<u>FY 96</u>	<u>FY 97</u>	<u>FY 98</u>	<u>FY88-98</u>
	(d)											
<u>Agency Debt Subject to Ceiling and Allocation Caps</u>												
MD Envir Service	8.3		12.1	19.0	18.4	27.2	27.2	29.9	34.8	33.7	31.0	273.8%
MD Wholesl Fd Ctr Auth	4.7		14.2	11.2	11.0	11.0	7.3	7.2	7.2	7.1	7.0	48.3%
MD Trans Authority	198.2		249.1	272.8	272.8	302.5	302.5	465.2	408.4	391.9	347.9	75.6%
MD Water Qual Finan Adm	--	--	25.6	68.8	107.9	134.0	133.2	163.2	163.4	157.8	151.3	--
Revenue Cap Total	211.2	--	301.0	371.8	410.1	474.7	470.2	665.5	613.8	590.6	537.3	154.4%
% change/prior year	-1.3%	--	--	23.5%	10.3%	15.7%	-0.9%	41.5%	-7.8%	-3.8%	-9.0%	
<u>Agency Debt Not Subject to Ceiling and Allocation Caps</u>												
Balt. City Comm. College	--	--	--	--	--	--	--	--	--	--	--	--
Comm Devel Admin (a)	1,615.4		1,844.2	1,988.5	2,334.9	2,275.6	2,457.4	2,446.5	2,340.8	2,238.3	2,321.1	43.7%
Local Govt Infra (CDA)	6.1	6.9	20.0	28.5	41.0	39.7	42.3	48.5	55.0	62.5	66.1	--
MD Energy Financ Admin	--		11.1	14.1	49.8	48.0	44.6	202.6	300.9	307.4	306.2	--
MIDFA				---Not Available---						352.3	330.4	--
Morgan State University	4.0		30.7	30.4	26.7	27.0	28.0	28.9	29.4	29.9	27.9	598.4%
St. Mary's College	4.7		4.4	4.2	4.0	8.9	8.7	8.5	8.1	7.8	17.5	272.0%
Univ of MD System (b)	89.1		259.6	355.0	412.1	461.5	473.8	518.3	505.9	534.5	611.0	585.7%
Non-cap Total	1,719.3	--	2,170.0	2,420.7	2,868.5	2,860.7	3,054.9	3,253.3	3,240.1	3,532.9	3,680.3	114.1%
% change/prior year	7.6%	--	--	11.6%	18.5%	-0.3%	6.8%	6.5%	-0.4%	9.0%	4.2%	
<u>Capital Leases and General Obligation Debt</u>												
Capital Leases - BPW	47.6	45.0	43.6	73.3	100.5	110.7	140.8	125.2	117.1	98.4	90.3	89.8%
General Obligation Debt	2,090.8	2,005.4	1,986.9	2,038.4	2,178.2	2,279.4	2,504.0	2,619.1	2,859.9	3,025.4	3,270.5	56.4%
Total Leases + GO	2,138.4	2,050.4	2,030.5	2,111.7	2,278.7	2,390.1	2,644.8	2,744.3	2,977.0	3,123.8	3,360.8	57.2%
% change/prior year	4.7%	-4.1%	--	4.0%	7.9%	4.9%	10.7%	3.8%	8.5%	4.9%	7.6%	
<u>Non-state Debt (Not Subject to Ceiling and Allocation Caps)</u>												
Higher Ed Suppl Ln Ath (c)	NA	NA	5.7	5.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	--
Hlth/Higher Ed Fcl Ath	1,206.1	1,279.0	1,351.9	1,655.6	1,863.8	2,064.9	2,254.2	2,256.6	2,348.4	2,489.7	2,821.0	133.9%
Total Non-state	1,206.1	1,279.0	1,357.6	1,660.9	1,863.8	2,064.9	2,254.2	2,256.6	2,348.4	2,489.7	2,821.0	133.9%
% change/prior year	3.6%	6.0%	--	22.3%	12.2%	10.8%	9.2%	0.1%	4.1%	6.0%	13.3%	

(a) Does not include Local Govt Infrastructure.

(b) Combination of University System and State Universities and Colleges debt prior to creation of USM.

(c) Loans were sold to 1st National Bank of Maryland in FY1992

(d) Data for FY 1989 not compiled.

Source:

1979 to 1987: Report of the Capital Debt Affordability Committee, Aug. 1987

1988: Report of the Capital Debt Affordability Committee, Sep. 1988

1990 to 1997: Department of Budget & Management

1998: Dept. of Budget & Management, St. Mary's College, Morgan State U., USM

G.O. Debt Service by Fund Source
(\$ in Thousands)

Fiscal Year	Debt Service Components			Total Debt Serv	% Change Debt Serv	% Change Gen Funds
	Property Tax	Misc. Special Funds	General Funds			
1972	\$36,159	\$43,979	\$0	\$80,138		
1973	45,836	37,000	6,000	88,836	10.9%	NA
1974	49,934	29,390	25,994	105,318	18.6%	333.2%
1975	52,314	32,449	41,024	125,787	19.4%	57.8%
1976	59,748	29,066	66,649	155,462	23.6%	62.5%
1977	72,448	25,617	86,686	184,751	18.8%	30.1%
1978	80,395	31,879	104,524	216,797	17.3%	20.6%
1979	72,976	35,519	136,159	244,653	12.8%	30.3%
1980	83,235	32,260	153,558	269,054	10.0%	12.8%
1981	88,840	29,688	167,475	286,003	6.3%	9.1%
1982	99,472	39,342	172,558	311,372	8.9%	3.0%
1983	109,218	26,213	195,060	330,491	6.1%	13.0%
1984	116,115	31,335	213,829	361,279	9.3%	9.6%
1985	104,834	27,867	247,388	380,089	5.2%	15.7%
1986	112,232	14,194	270,941	397,367	4.5%	9.5%
1987	121,163	29,854	244,928	395,945	-0.4%	-9.6%
1988	134,946	12,723	243,830	391,500	-1.1%	-0.4%
1989	146,958	7,336	239,785	394,079	0.7%	-1.7%
1990	162,495	10,623	222,000	395,118	0.3%	-7.4%
1991	174,948	11,406	202,045	388,400	-1.7%	-9.0%
1992	189,179	5,950	150,768	345,897	-10.9%	-25.4%
1993	205,923	(158)	116,486	322,251	-6.8%	-22.7%
1994	217,602	(1,184)	108,055	324,474	0.7%	-7.2%
1995	224,512	14,784	134,189	373,485	15.1%	24.2%
1996	228,324	6,810	149,230	384,364	2.9%	11.2%
1997	235,642	10,229	155,935	401,807	4.5%	4.5%
1998	240,770	5,048	172,108	417,926	4.0%	10.4%
1999	242,078	16,720	159,688	418,486	0.1%	-7.2%
2000	250,008	13,210	198,956	462,175	10.4%	24.6%
2001	256,259	3,500	225,343	485,101	5.0%	13.3%
2002	262,665	3,500	243,080	509,245	5.0%	7.9%
2003	269,232	3,500	262,897	535,628	5.2%	8.2%
2004	275,962	3,500	267,359	546,822	2.1%	1.7%

Sources

Property Tax & Debt Service

1972- 1980: Supplemental Financial Date of the Comptroller of the State of Maryland

1981 - 1999: Maryland State Budget

2000 - 2004: DLS Estimate

General Fund Debt Service

1972 - 1976: Maryland State Budget

1977 - 1980: Supplemental Financial Date of the Comptroller of the State of Maryland

1981 - 1999: Maryland State Budget

2000 - 2004: DLS Estimate

Miscellaneous Special Funds

1972 - 1999: Computed as Debt Service less all other revenues

2000 - 2004: DLS Estimate