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Analysis of Ability to Pay

Minnesota State Grant Review

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Minnesota Office of Higher Education

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Dr. Gerald Setter died unexpectedly in 2008 after completing most of the in-depth analysis reflected in this report. The Office of Higher Education is grateful for his thoughtful insight, hard work and nearly 30-year commitment to public service.

Introduction

This report provides analysis of how the financial expectations placed on families within the State Grant model compare to the families' ability to pay. From this analysis, policymakers gain information that may help them to make determinations about whether expectations of families, at varying income levels, are reasonable.

The report reviews the Federal Need Analysis, which is used as the starting point for determining the Assigned Family Responsibilities within the Minnesota State Grant program. The results of the Federal Need Analysis are a dollar amount a family is expected to pay for postsecondary education. Variables used in the Federal Need Analysis are described and applied to family examples.

In addition, the report compares the Minnesota State Grant program's Assigned Family Responsibilities to other government activities that use alternative measures of ability to pay. The Minnesota State Grant program's Assigned Family Responsibilities are intended to reflect a family's ability to pay for postsecondary education. In this report, the State Grant program's Assigned Family Responsibilities are compared to the following programs, all of which incorporate ability to pay measures.

- Federal and state individual income taxes
- Minnesota's property tax refund program
- Minnesota's reimbursement for care of children with disabilities
- Minnesota's Child Care Sliding Fee program

Each analysis reveals a slightly different approach to defining and family's ability to pay. Taken together, they provide context for the Assigned Family Responsibilities in the Minnesota State Grant program.

Family Share Is Based on Federal Need Analysis

The State Grant program assigns the price of attendance to three parties: the student, the family and the taxpayer, if necessary. Students are currently assigned 46 percent of the total price of attendance. Next, financial responsibility falls to families, based on a measure of their ability to pay. The results of the Federal Need Analysis are used as a starting point in assigning the family share.

Families are defined as follows in determining the Minnesota State Grant program's Assigned Family Responsibilities.

1. Parents of dependent students
2. Students who are independent and married, with children
3. Students who are independent and not married, with children
4. Students who are independent and married, with no children
5. Students who are independent and not married, with no children

Assigned Family Responsibilities are determined through the assessment of family income and net worth, with adjustments to income and for family size. Families first report income and net worth to the federal government on the Free Application for Federal Student Financial Aid (FAFSA). The federal government uses an assessment tool called the Federal Need Analysis to determine an amount a family is expected to pay for postsecondary education. Assessment rates inside the Federal Need Analysis are similar for families with children (those under definitions 1-3 in the above list) and higher for families who do not have children (those under definitions 4 and 5 in the above list).

Minnesota uses the definitions and rates in the Federal Need Analysis, but does not accept the dollar amount results in determining the Minnesota State Grant program's Assigned Family Responsibilities. For Fiscal Year 2008, Minnesota assigned 96 percent of the federal results to parents of dependent students, 86 percent of the federal results to independent students with dependents, and 68 percent to independent students with no dependents other than a spouse. The Minnesota Legislature established these lower percentages as the Federal Need Analysis results for families came to be viewed as too high.

Ultimately, the State Grant expects some families to cover the full Assigned Family/Taxpayer Responsibility, even after Minnesota adjustments. For other families, the expected dollar amount covers only some of the Assigned Family/Taxpayer Responsibilities and the remainder is paid for with federal Pell grants first and with Minnesota State Grants if necessary. Finally, some families are not expected to contribute anything. For these families, the Assigned Family/Taxpayer Responsibilities are the responsibility of taxpayers through the federal Pell grant and the Minnesota State Grant if necessary.

Fiscal Year 2007 data and Minnesota State Grant program parameters served as the basis for this analysis.

Dependent Students and Their Families

The results of the Federal Need Analysis are used as a starting point to determine Assigned Family Responsibilities in the Minnesota State Grant program for parents of dependent students. The Federal Need Analysis starts with federal adjusted gross income.

The Federal Need Analysis adds a wide range of untaxed income, including welfare payments and interest on tax-exempt bonds, to adjusted gross income. The analysis subtracts a number of deductions from total income, such as taxes paid and employee expenses. The examples in this report include the following deductions.

- Federal income taxes paid, which were estimated assuming the adjusted gross income shown on the first line for a family size of four with the federal standard deduction.
- Social Security taxes, which were based on earned income equal to adjusted gross income;
- State and other taxes, which were set at the Federal Need Analysis standard percentage of total income; and
- An employment expense allowance of \$3,100, which assumes both parents were employed and both earned at least \$3,500 during the year.

The Federal Need Analysis also includes an income protection allowance. Amounts used in the examples presented here were determined from the income protection allowance as shown in Table 2.

Total income minus total deductions determines available income in the Federal Need Analysis. Available income is the base measure of income used in the Federal Need Analysis.

In addition to income, the Federal Need Analysis assesses family net worth. Certain assets are excluded, such as personal residences. Not all other assets included on families' balance sheets are counted. If an asset is not included in the Federal Need Analysis, the corresponding liabilities are not counted. Net worth was assumed to equal Adjusted Gross Income in the examples in this paper.

Adjusted net worth is determined by subtracting an educational savings and asset protection Allowance from net worth. The educational savings and asset protection allowance is based on the age of the older parent.

The Federal Need Analysis adds available income and the contribution from assets to determine an adjusted available income amount. This amount is multiplied by a set of assessment rates to determine what the federal government calls the Expected Family Contribution. The assessment rates are shown on Table 3.

About Table 1

Federal Need Analysis calculations for parents of dependent students are shown on Table 1, titled “Calculation of Assigned Family Responsibilities for Parents of Dependent Students, Three Examples for Fiscal Year 2007”. Three family examples are shown. The examples vary by federal adjusted gross income, set at the 20th, 40th and 60th percentile for families in the United States.¹ It was assumed each family contributed five percent of adjusted gross income to a 401k plan and this amount was added to adjusted gross income to determine total income in the examples.

For purposes of these examples, it was assumed the older parent was age 45 with an educational savings and asset protection allowance of \$44,300. The Federal Need Analysis specifies an asset conversion rate of 12 percent applied to adjusted net worth. The result is a contribution from assets amount, as shown on Table 1.

Assigned Family Responsibilities used in the Minnesota State Grant program in Fiscal Year 2007 were the lesser of the Expected Parental Contribution and the Assigned Family/Taxpayer Responsibilities at the institution the student attended. Five Assigned Family Responsibilities, based on the average Recognized Prices of Attendance at different institution types, are shown on Table 1. The examples highlight two characteristics of Assigned Family Responsibilities:²

- Assigned Family Responsibilities increased as adjusted available income and expected parental contributions increased, up to the full Assigned Family Responsibilities amount.
- For the highest income family, Family 3, Assigned Family Responsibility was dependent on the institution attended, not family income, because the Minnesota State Grant program’s Recognized Price of Attendance is constrained in law.

¹ U.S. Census Bureau Table F-1. Income Limits for Each Fifth and Top 5 Percent of Families (All Races): 1947 to 2005 [accessed at www.census.gov/hhes/www/income/histinc/f01ar.html (August 22, 2007)]. For 2006 and 2007, it was assumed all values would increase by two percent per year.

² See the section on Family-Taxpayer Shares and Recognized Prices in the *Overview of the Design for Shared Responsibility* paper for more detail.

Table 1: Calculation of Assigned Family Responsibilities for Parents of Dependent Students, Three Examples for Fiscal Year 2007

Item		Family 1	Family 2	Family 3
Adjusted Gross Income	Assumed the 20th, 40th & 60th percentile incomes as reported by U.S. Census Bureau	\$26,651	\$46,840	\$71,063
Untaxed Income	Assumed employee contributions to 401 k (= 5% of AGI)	\$1,333	\$2,342	\$3,553
Total Income		\$27,983	\$49,182	\$74,617
Federal Income Taxes	Assumed family of 4 used form 1040 and standard allowance for deductions	\$315	\$2,718	\$6,352
Social Security Taxes	7.65% of earned income (Earned income assumed to be AGI in this example)	\$2,141	\$3,762	\$5,708
State and Other Taxes	Specified as 5% of Income if income \$15,000 or more; otherwise 6% of income by the Federal Need Analysis.	\$1,399	\$2,459	\$3,731
Employee Expense Allowance	Specified as \$3,100 or 35% of earned income for the parent with the lowest income by the Federal Need Analysis; assumed \$3,100 in this example.	\$3,100	\$3,100	\$3,100
Income Protection Allowance	From Income Protection Allowance Table on next page	\$22,200	\$22,200	\$22,200
Total Deductions		\$29,155	\$34,240	\$41,091
Available Income	Total Income - Total Deductions	\$0	\$14,942	\$33,526
Net Worth	Assumed equal to AGI	\$26,651	\$46,840	\$71,063
Educational Savings and Asset Protection Allowance	Assumed oldest parent is 45	\$44,300	\$44,300	\$44,300
Adjusted Net Worth	Net Worth - Educational Savings and Asset Protection Allowance	\$0	\$2,540	\$26,763
Contribution from Assets	12% of Adjusted Net Worth	\$0	\$305	\$3,212

Table 1: Calculation of Assigned Family Responsibilities for Parents of Dependent Students, Three Examples for Fiscal Year 2007

Item		Family 1	Family 2	Family 3
Adjusted Available Income	Available Income + Contribution from Assets	\$0	\$15,247	\$36,737
Expected Parental Contribution	From Assessment of Adjusted Available Income Table	\$0	\$3,425	\$16,785
Assigned Family Responsibility	Lesser of Expected Parental Contribution or Family-Taxpayer Share			
Attending Minnesota State College	Family-Taxpayer Share = \$5,571	\$0	\$3,425	\$5,571
Attending Minnesota State University	Family-Taxpayer Share = \$6,491	\$0	\$3,425	\$6,491
Attending University of Minnesota	Family-Taxpayer Share = \$8,350	\$0	\$3,425	\$8,350
Attending Private 4-Year Institution	Family-Taxpayer Share = \$7,891	\$0	\$3,425	\$7,891
Attending Private 2-Year Institution	Family-Taxpayer Share = \$6,704	\$0	\$3,425	\$6,704

Table 2: Income Protection Allowance

Number in Parents' Household, Including Student	Number of College Students in Household				
	1	2	3	4	5
2	\$14,430	\$11,960			
3	\$17,970	\$15,520	\$13,050		
4	\$22,200	\$19,730	\$17,270	\$14,800	
5	\$26,190	\$23,720	\$21,270	\$18,800	\$16,340
6	\$30,640	\$28,170	\$25,710	\$23,240	\$20,790
<p align="center">Note: For each additional household member, add \$3,460. For each additional college student (except parents), subtract \$2,460.</p>					

Table 3: Assessment of Adjusted Available Income

If Parents' Adjusted Available Income			
More Than:	And Less Than:	Fixed Amount	Rate
	\$(3,410)	\$(750)	
\$(3,409)	\$12,900	\$0	22%
\$12,901	\$16,200	\$2,838	25%
\$16,201	\$19,500	\$3,663	29%
\$19,501	\$22,800	\$4,620	34%
\$22,801	\$26,100	\$5,742	40%
\$26,101		\$7,062	47%

Unmarried Independent Students with No Dependents

The analysis of Assigned Family Responsibilities for unmarried independent students with no dependents follows the format used in the previous analysis for parents of dependent students. Minnesota conforms to the definitions, allowances and assessment rates used in the Federal Need Analysis in calculating Assigned Family Responsibilities for unmarried independent students with no dependents.

About Table 4

Adjusted gross income amounts were set at \$10,000, \$20,000 and \$30,000 in the examples shown on Table 4.

In calculating federal individual income tax liabilities, it was assumed the student had:

- one exemption,
- no untaxed income, and
- other deductions as defined in the Federal Need Analysis.

Net worth was assumed to be \$10,000. The Federal Need Analysis assessed net worth at 35 percent and Available Income at 50 percent in Fiscal Year 2007. The Minnesota Adjustment for unmarried students with no dependents was 72 percent of the results of the Federal Need Analysis, as shown on Table 5.

Assigned Family Responsibilities are the lesser of the Minnesota Adjusted Federal Need Analysis result and the Assigned Family/Taxpayer Responsibility. The examples in Table 4 highlight two characteristics of Assigned Family Responsibilities:³

- For students 1 and 2, those with the lower incomes, their Assigned Family Responsibilities increased with income.
- For student 3, at a higher income, the resulting Assigned Family Responsibility depended on the institution attended, not the student's income, because the Minnesota State Grant program's Recognized Price of Attendance is constrained in law.

³ See the section on Family-Taxpayer Shares and Recognized Prices in the *Overview of the Design for Shared Responsibility* paper for more detail.

Table 4: Calculation of Assigned Family Responsibilities for Unmarried independent Students with No Dependents, Three Examples for Fiscal Year 2007

Item	Assumption	Student 1	Student 2	Student 3
Adjusted Gross Income	Assumed for these examples	\$10,000	\$20,000	\$30,000
Untaxed Income		\$0	\$0	\$0
Total Income		\$10,000	\$20,000	\$30,000
Federal Income Taxes	Assumed filer used form 1040 and standard allowance for deductions	\$155	\$1,341	\$2,841
Social Security Taxes	7.65% of earned income (Earned income assumed to be AGI in this example)	\$734	\$1,499	\$2,264
State and Other Taxes	Specified as 4% of Income by the Federal Need Analysis.	\$400	\$800	\$1,200
Income Protection Allowance	Specified by the Federal Need Analysis	\$5,790	\$5,790	\$5,790
Total Deductions		\$7,079	\$9,431	\$12,096
Available Income	Total Income - Total Deductions	\$2,921	\$10,569	\$17,904
Net Worth	Assumed for these examples	\$10,000	\$10,000	\$10,000
Expected Student Contribution x Minnesota Adjustment	(50% of Available Income + 35% of Net Worth) x Minnesota Adjustment [See next table]	\$3,571	\$6,325	\$8,966
Assigned Family Responsibility	Lesser of Expected Student Contribution x Minnesota Adjustment or Family-Taxpayer Share			
Attending Minnesota State College	Family-Taxpayer Share = \$5,571	\$3,571	\$5,571	\$5,571
Attending Minnesota State University	Family-Taxpayer Share = \$6,491	\$3,571	\$6,325	\$6,491
Attending University of Minnesota	Family-Taxpayer Share = \$8,350	\$3,571	\$6,325	\$8,350
Attending Private 4-Year Institution	Family-Taxpayer Share = \$7,891	\$3,571	\$6,325	\$7,891
Attending Private 2-Year Institution	Family-Taxpayer Share = \$6,704	\$3,571	\$6,325	\$6,704

Table 5: Minnesota Adjustments to the Results of the Federal Need Analysis

Household Status	Fiscal Year 1997	Fiscal Year 1998	Fiscal Year 1999	Fiscal Year 2000	Fiscal Year 2001	Fiscal Year 2002	Fiscal Year 2003	Fiscal Year 2004	Fiscal Year 2005	Fiscal Year 2006	Fiscal Year 2007
Married with Dependents Other than Spouse	100%	100%	100%	100%	100%	90%	90%	90%	90%	90%	90%
Unmarried with Dependents	100%	100%	100%	100%	100%	90%	90%	90%	90%	90%	90%
Married with No Dependents Other than Spouse	100%	80%	80%	80%	80%	72%	72%	72%	72%	72%	72%
Unmarried with No Dependents	100%	80%	80%	80%	80%	72%	72%	72%	72%	72%	72%

Assigned Family Responsibilities Compared to Federal and Minnesota Individual Income Tax Liabilities

This section compares Assigned Family Responsibilities with individual income tax liabilities as measures of ability to pay. Assigned Family Responsibilities in the Minnesota State Grant program are payment expectations based on income and net worth as described in the previous section. Assigned Family Responsibilities are a measure of a family's ability-to-pay for postsecondary education, derived from the results of the Federal Need Analysis and Minnesota's adjustments.

Individual income tax liabilities are government-imposed financial obligations. Federal and state individual income systems presume a tax filer's ability to pay his or her financial obligation based on income.

Dependent Students and Their Families

Federal and Minnesota individual income tax liabilities calculated for this analysis assumed the following:

- two parent household filing jointly with two children claimed as dependents,
- a standard deduction,
- no alternative minimum tax liability, and
- tax rates for tax years 1995, 1998, 2001, 2004 and 2007.⁴

Federal and Minnesota individual income tax burdens were calculated as the ratio of tax liability to adjusted gross income for each income group shown on the charts on page 15.

The results show tax burdens increased continuously as incomes increased for federal and Minnesota individual income taxes. In the examples, both tax systems were progressive: as income increased, tax liabilities as a percent of income increased. Both tax systems presumed a tax filer's ability to pay increased as income increased.

Federal individual income tax burdens decreased between 1995 and 2007. Minnesota individual income tax burdens also decreased, but to a lesser extent, as shown on the charts on page 16 and 17.

Similar to tax burdens, Assigned Family Efforts are the ratio of Minnesota State Grant program Assigned Family Responsibilities to adjusted gross income. Assigned Family Efforts for typical families of dependent student attending the University of Minnesota in Fiscal Year 2007 are shown on the lower right side of page 16 and 17. As the chart indicates, Assigned Family Efforts

⁴ At the time this paper was prepared, the general rates for federal and state taxes were known but those for calculation of federal Hope and Lifetime Tax Credits were not known so 2006 rates were used for 2007.

have remained about the same, from 1995 to 2007, for families with up to \$55,000 adjusted gross income. Assigned Family Efforts for other families have been increasing.

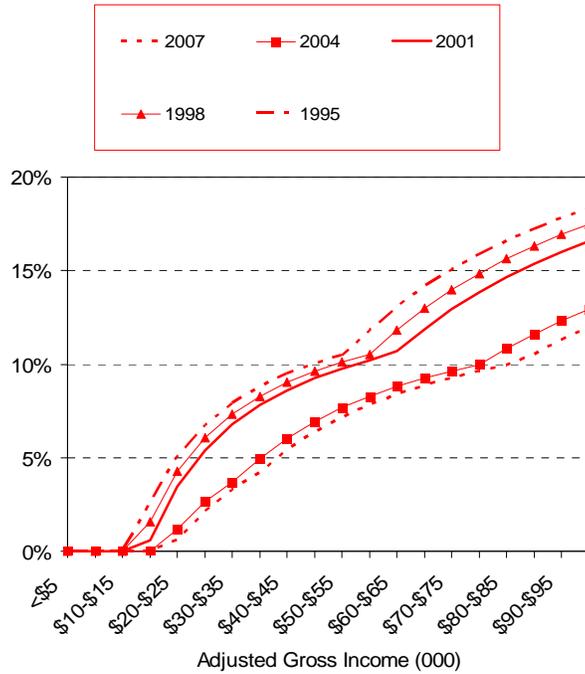
Individual income tax burdens and Assigned Family Efforts' are compared on the charts titled, "Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Efforts, Dependent Students and Their Families".

The charts demonstrate more clearly that as federal individual income tax burdens decreased, Assigned Family Efforts in the Minnesota State Grant program increased and shifted up the income spectrum. Assigned Family Efforts exceeded federal income tax burdens for families with dependent students at the University of Minnesota in the \$30,000 to \$80,000 federal adjusted gross income range in Fiscal Year 2007. The data suggest both the state of Minnesota and the federal government presumed families, with \$30,000 to \$80,000 adjusted gross income, had a greater ability to pay for postsecondary education in Fiscal Year 2007 than in previous years.

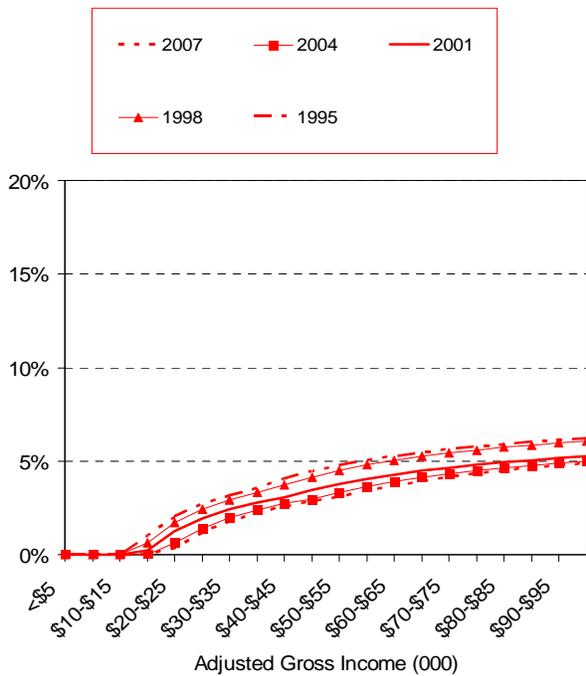
In addition, federal and state individual income tax burdens generally decreased for each of the four-quintile income levels identified on the charts on page 17. This tax burden decrease is in contrast to the Assigned Family Efforts increase shown on the chart on the lower right hand of page 17. Assigned Family Efforts for the two lower income groups, the 20th and 40th percentiles, increased, but increased less than for families in the 60th and 80th income percentiles. For families at the 60th income percentile, the effort increased about five percentage points, from five to 10 percent, and for families at the 80th income percentile, the effort increased two points, from five to seven percent.

Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Efforts for Families of Dependent Students

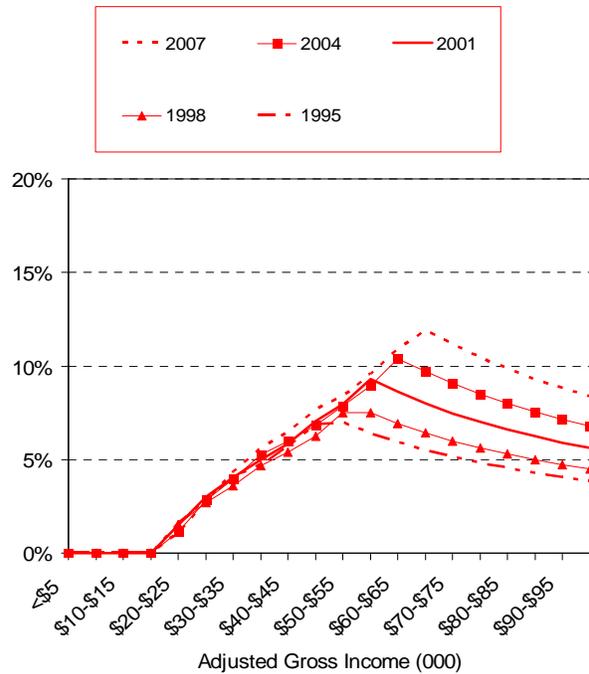
Federal Income Tax Burdens
Typical Families of Dependent Students



Minnesota Income Tax Burdens
Typical Families of Dependent Students

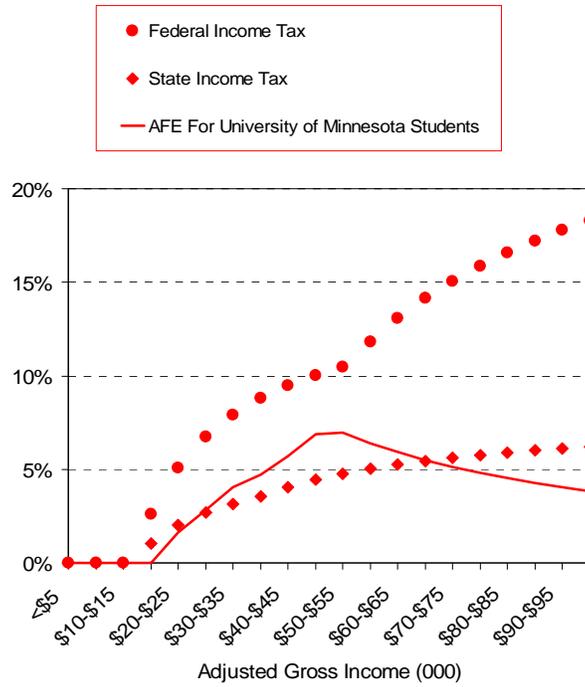


Assigned Family Efforts
Typical Families of Dependent Students Attending the University of Minnesota

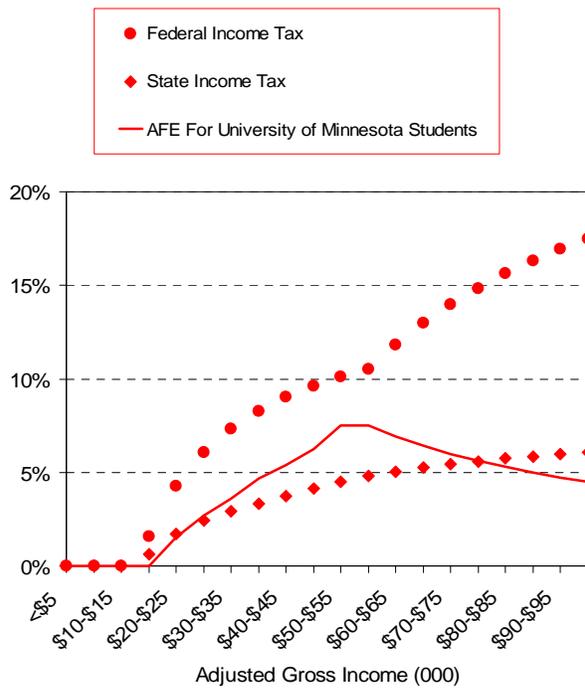


Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Efforts for Families of Dependent Students

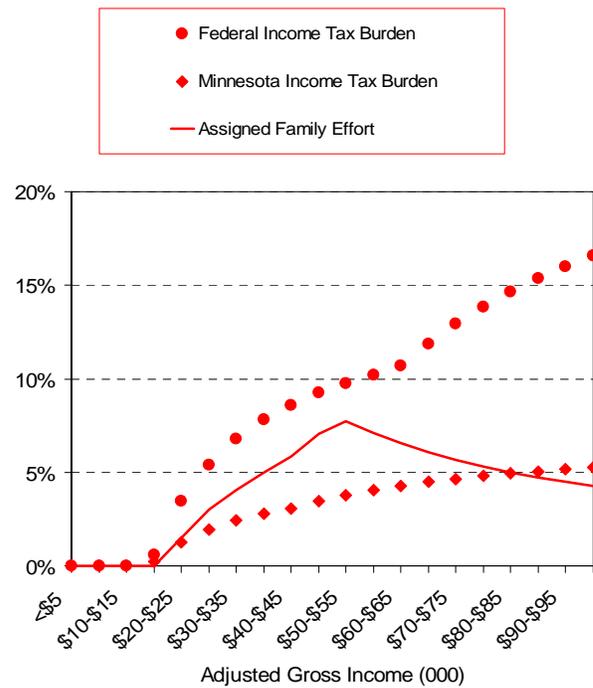
1995



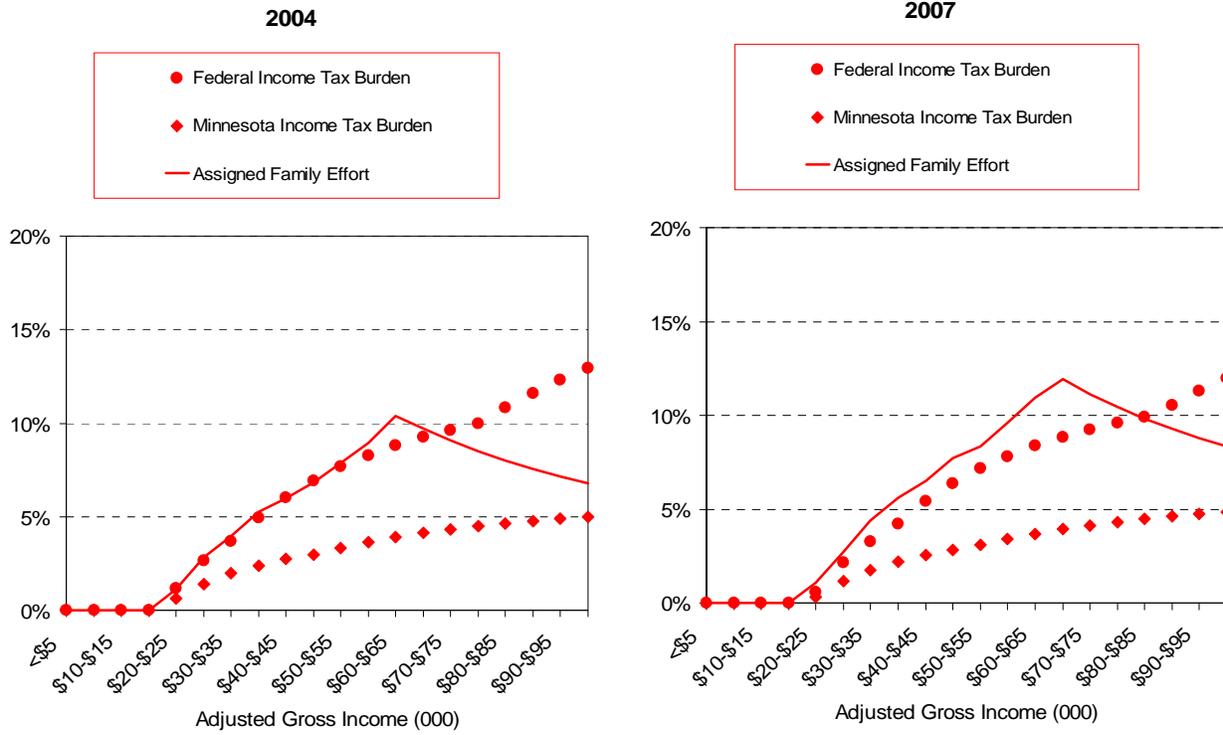
1998



2001

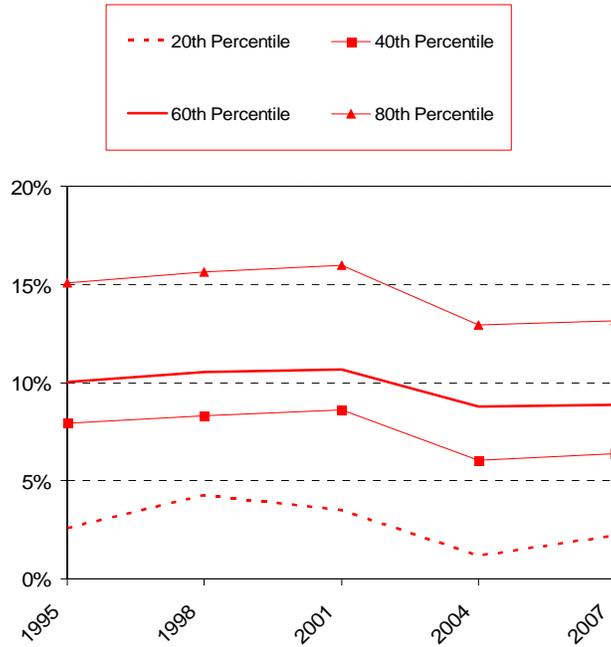


Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Efforts for Families of Dependent Students, Continued

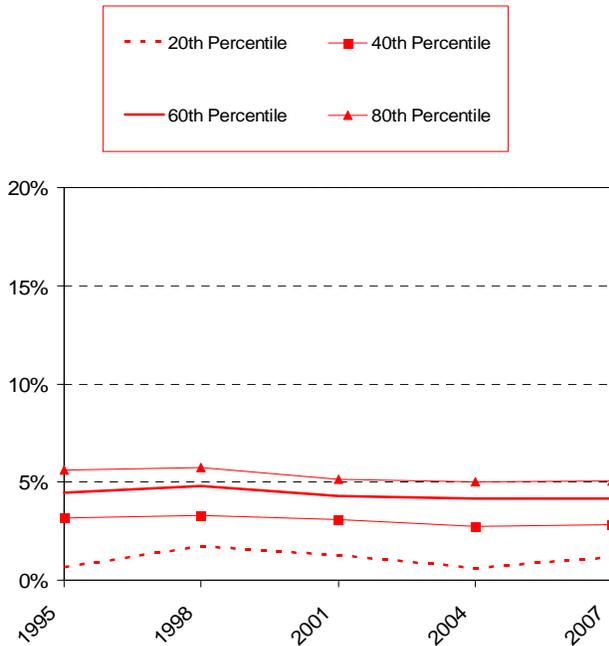


Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Efforts for Families of Dependent Students

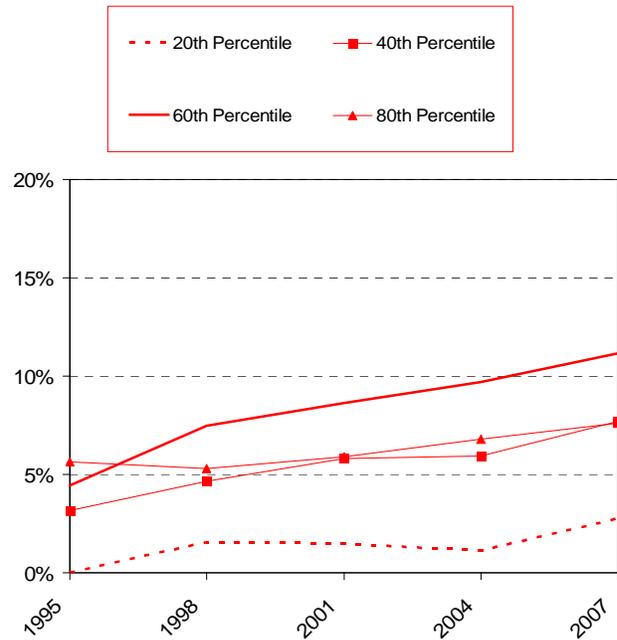
Federal Tax Burdens



State Tax Burdens



Assigned Family Efforts Typical Dependent Students Attending the University of Minnesota



Unmarried Independent Students with No Dependents

The comparative analysis in this section for unmarried independent students with no dependents follows the format of the previous analysis for parents of dependent students.

The income tax liabilities calculated in this section assumed

- a single filer claiming self as an exemption,
- a standard deduction, and
- tax rates for tax years 1998, 2001 and 2004.

Tax burdens for both federal and Minnesota individual income taxes were calculated as the ratio of tax liability to adjusted gross income for each income group.

Tax burdens increased continuously as incomes increased for both federal and state taxes, as shown on page 20. Again, both tax systems were progressive in these examples: as income increased, tax liabilities as a percent of income increased.

Federal individual income tax burdens decreased between 1998 and 2004. Minnesota individual income tax burdens decreased, but less so.

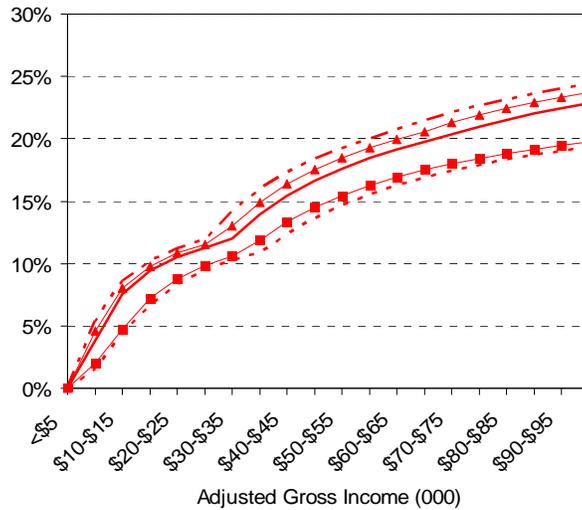
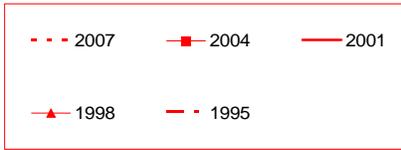
Assigned Family Efforts are shown on the lower right hand chart on page 20. The Maximum Assigned Family Efforts for typical unmarried independent students with no dependents attending the University of Minnesota in Fiscal Year 2007 were at adjusted gross incomes of \$20,000 to \$30,000.

A comparison of federal and state income tax burdens and Assigned Family Efforts for typical unmarried students with no dependents attending the University of Minnesota is shown on pages 21 and 22. The charts show modest decreases in tax burdens between 1995 and 2007 with maximum Assigned Family Effort shifting to the right on the income scale.

Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Effort

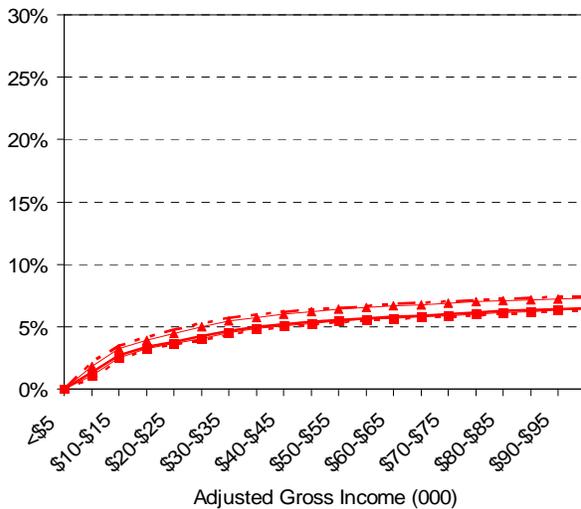
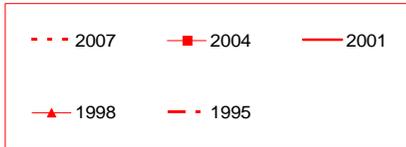
Federal Income Tax Burdens

Typical Unmarried Independent Students with No Dependents



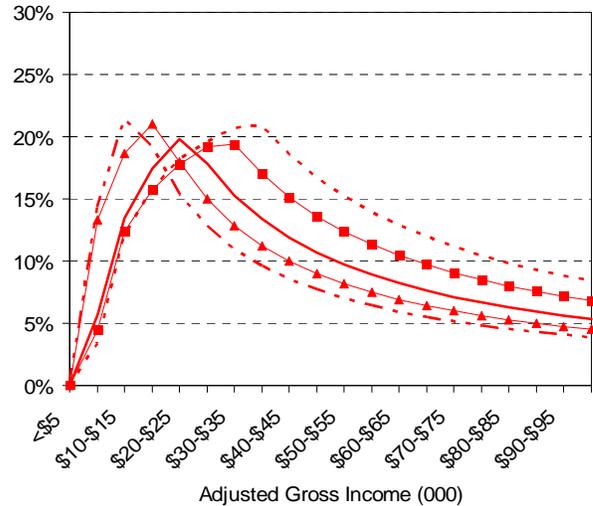
Minnesota Income Tax Burdens

Typical Unmarried Independent Students with No Dependents



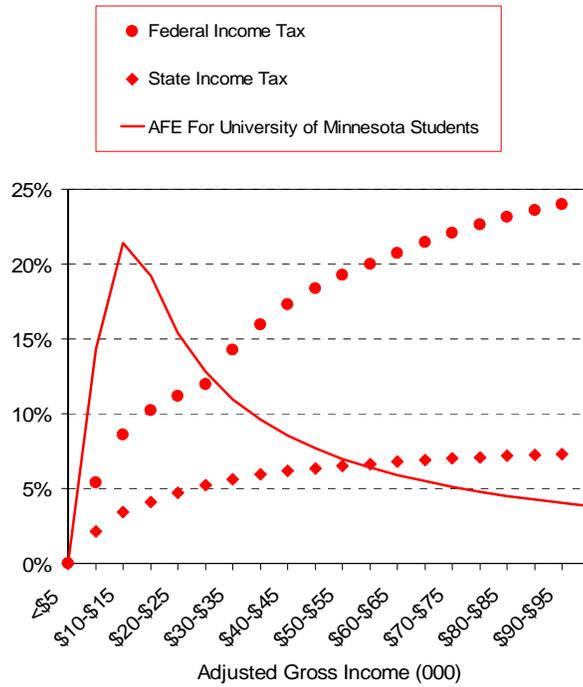
Assigned Family Efforts

Typical Unmarried Independent Students with No Dependents Attending the University of Minnesota

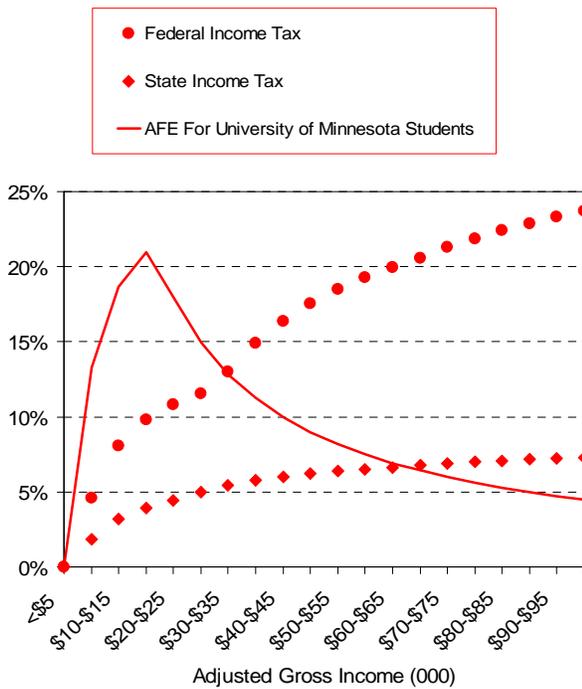


Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Efforts, Unmarried Independent Students with No Dependents

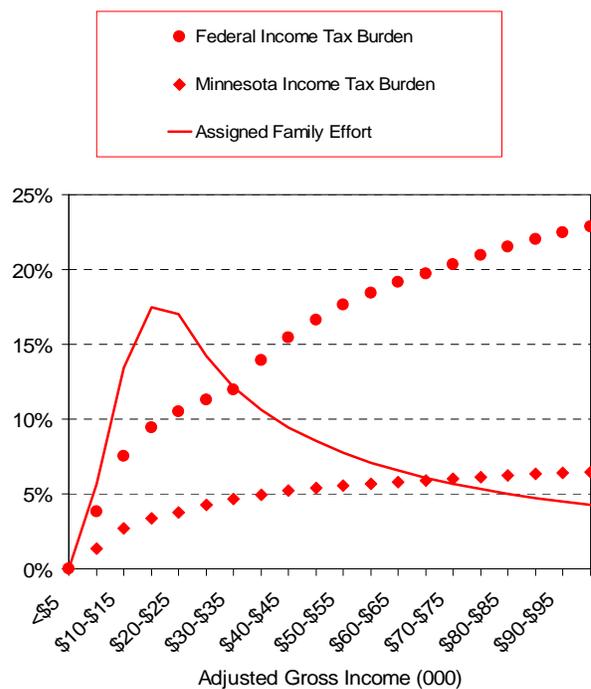
1995



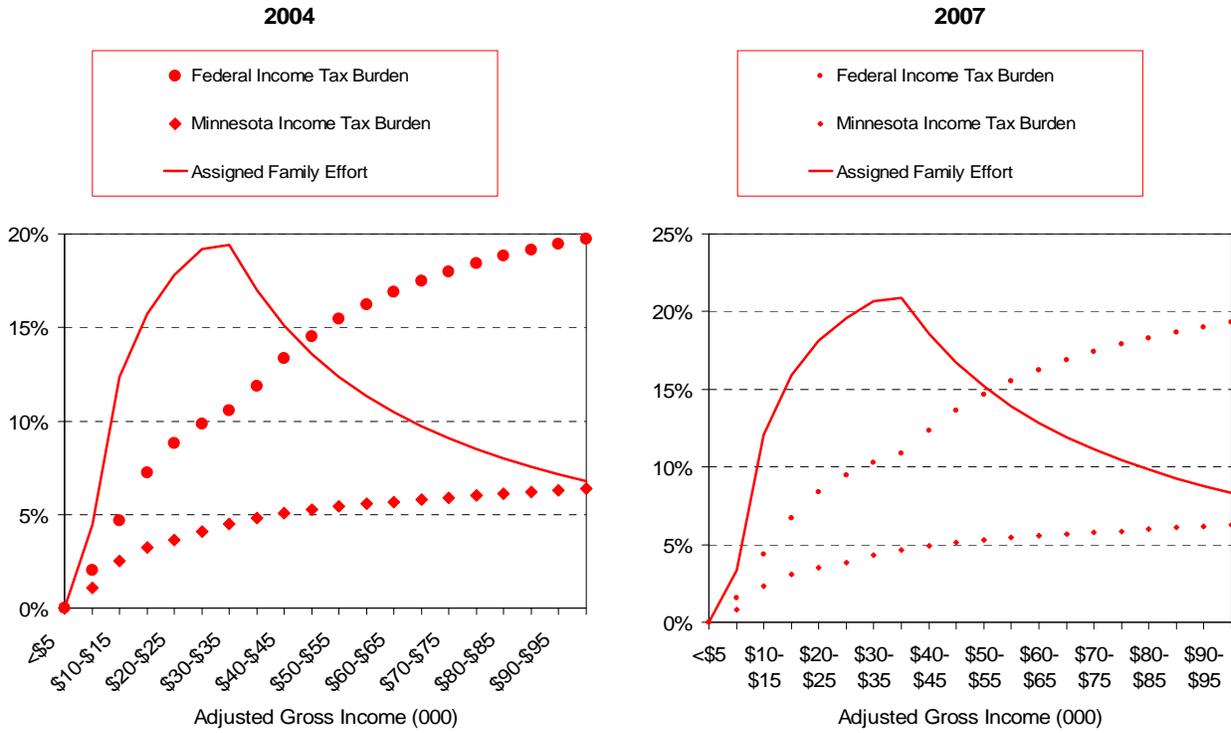
1998



2001



Comparisons of Federal and Minnesota Personal Income Tax Burdens and Assigned Family Efforts, Unmarried Independent Students with No Dependents, Continued



Assigned Family Responsibilities Compared to Minnesota Property Tax Refunds

Minnesota State Grant program Assigned Family Responsibilities are payment expectations based on income and net worth. Minnesota property taxes are tax liabilities based on the value of property. Homeowners are directly responsible for property taxes. Renters are indirectly responsible for property taxes through the rent they pay.

Minnesota adjusts property taxes to a homeowner or renter's income and family size through Minnesota property tax refunds. This section compares the Minnesota State Grant program's Assigned Family Responsibilities with what Assigned Family Responsibilities and Efforts would have been using the formula for calculating Minnesota property tax refunds.

Minnesota homeowners and renters qualify for property tax refunds based on their property tax liabilities, family sizes, and incomes. The property tax refund formula for homeowners was used here.⁵ Assigned Family/Taxpayer Responsibilities in the Minnesota State Grant program were substituted for property tax liabilities in the property tax refund formula. Adjusted gross income was substituted for total income. The calculations assumed a family with two dependents, as defined by the property tax refund formula to obtain an alternative to Assigned Family Responsibilities for parents of dependent students.⁶

The Minnesota State Grant program results shown here as Assigned Family Effort, Assigned Family Responsibility and Assigned Taxpayer Responsibility were based on Fiscal Year 2007 parameters for parents of dependent students attending the University of Minnesota. These assignments were compared to what they would have been using the Minnesota property tax refund formula.

The resulting comparisons are shown page 24. Family Efforts resulting from Minnesota's property tax refund differ from Assigned Family Efforts in the Minnesota State Grant program. Minnesota State Grant program Family Efforts were zero up to about \$25,000 adjusted gross income, progressively increased from \$25,000 to \$65,000 and regressively decreased at incomes above \$65,000. In comparison, the Assigned Family Efforts resulting from the Minnesota property tax refund formula decreased across the entire income spectrum.

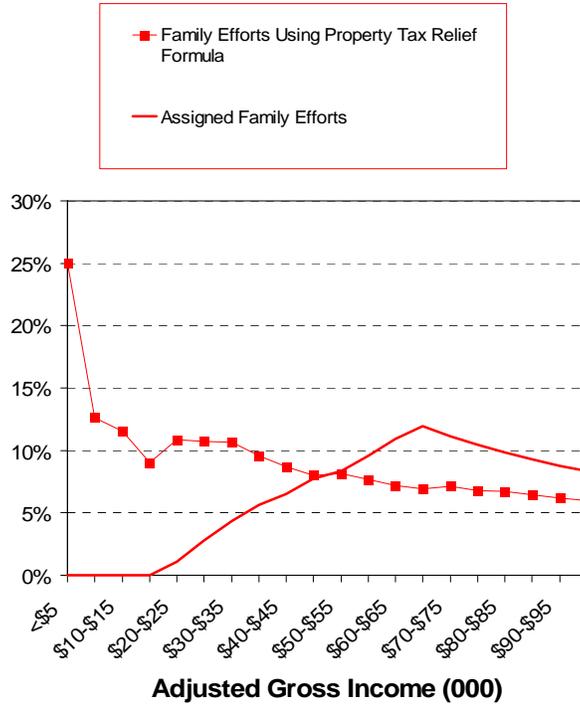
The Assigned Family Responsibility dollar amount using the Minnesota property tax refund formula was higher for lower income families and lower for higher income families when compared to the Minnesota State Grant program's Assigned Family Responsibility, as shown in the lower left hand chart on page 24. The converse was true for assignment to taxpayers as shown on the lower right chart on page 24.

⁵ Accessed at www.taxes.state.mn.us/prop_refund/algorithms/ho_algorithm_06.pdf (November 28, 2007).

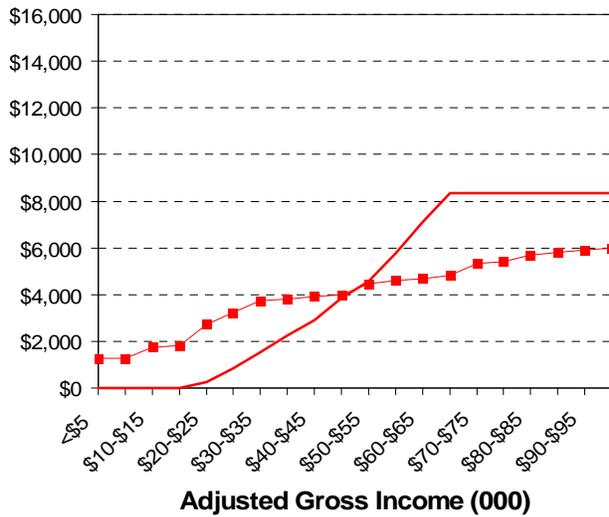
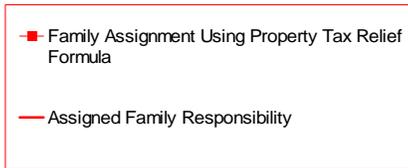
⁶ The maximum refund values in the formula were not used in this analysis.

Property Tax Refund

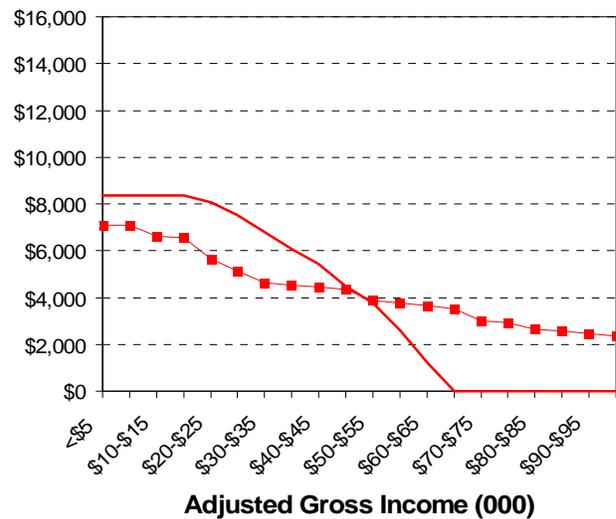
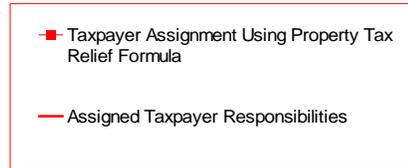
Family Efforts



Assignments to Families



Assignments to Taxpayers



Assigned Family Responsibilities Compared to Minnesota's Payments for the Care of Disabled Children

Minnesota State Grant program Assigned Family Responsibilities are payment expectations based on income and net worth. Minnesota has a reimbursement program to help families with the costs associated with caring for disabled children. Families can qualify for reimbursements based on medical and care expenses, family sizes, and family incomes

Similar to the previous section, this section compares the Minnesota State Grant program's Assigned Family and Taxpayer Responsibilities and Assigned Family Efforts to the payment assignments based on the formula used in Minnesota's reimbursement for the care of disabled children.⁷ The Minnesota State Grant program's Assigned Family/Taxpayer Responsibility was substituted for the costs of dependent care. Adjusted gross income was substituted for total income. A family size of four was assumed.

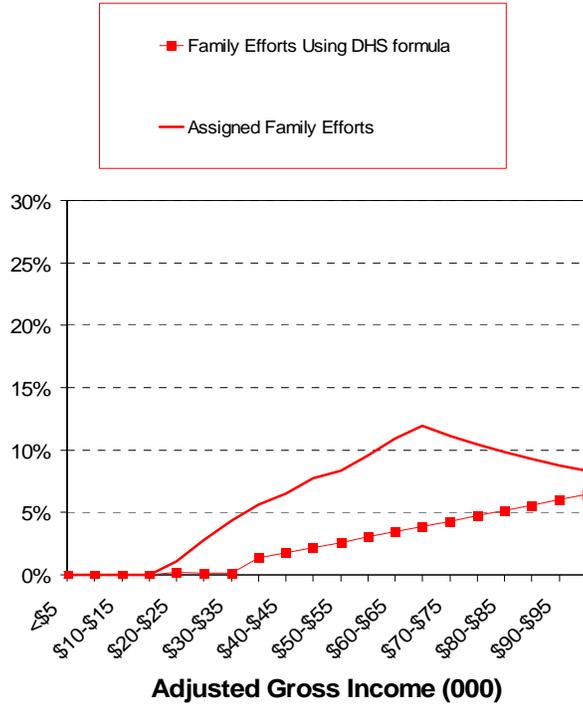
The Minnesota State Grant program results shown here as Assigned Family Effort, Assigned Family Responsibility and Assigned Taxpayer Responsibility were based on Fiscal Year 2007 parameters for parents of dependent students attending the University of Minnesota. These assignments were compared to what they would have been using the reimbursement for the care of disabled children and are shown on the following page.

Starting at about \$20,000 adjusted gross income, the Assigned Family Efforts in the Minnesota State Grant program were higher when compared to the state's reimbursement program for care of disabled children. Similarly, the dollar amount assigned to families was higher and the dollar amount assigned to taxpayers was lower in the Minnesota State Grant program when compared to the results using the state's reimbursement for the care of disabled children formula, as shown on page 26.

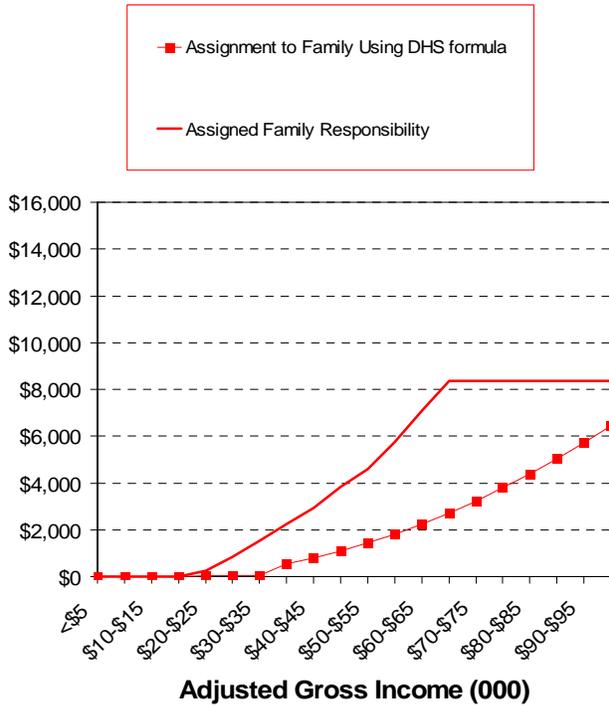
⁷ Accessed at *Laws of Minnesota 2007*, Chapter 147, Article 2, Section 2.

Care of Disabled Children

Family Efforts



Assignments to Families



Assignments to Taxpayers



Assigned Family Responsibilities Compared to Minnesota's Child Care Sliding Scale

Minnesota State Grant program Assigned Family Responsibilities are payment expectations based on income and net worth. Minnesota's Child Care Sliding Scale program reduces child care costs for some Minnesota families based on income.

Similar to the previous section, this section compares the Minnesota State Grant program's Assigned Family and Taxpayer Responsibilities and Assigned Family Efforts to the payment assignments if Minnesota's formula used in the Child Care Sliding Scale program were used instead.⁸

The Minnesota State Grant program's Assigned Family/Taxpayer Responsibility was substituted for child care costs. Adjusted gross income was substituted for total income. A family size of four was assumed.

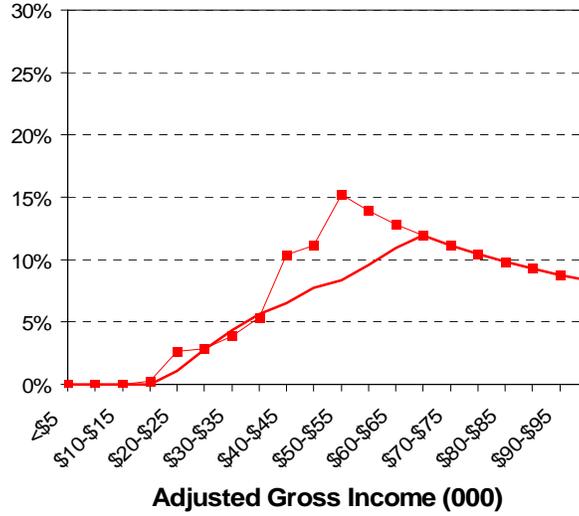
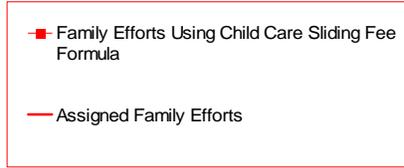
The Minnesota State Grant program results shown here as Assigned Family Effort, Assigned Family Responsibility and Assigned Taxpayer Responsibility were based on Fiscal Year 2007 parameters for parents of dependent students attending the University of Minnesota. These assignments were compared to what they would have been using the Minnesota's Child Care Sliding Scale program.

The Assigned Family Efforts in the Minnesota State Grant program were similar to the resulting efforts using the Child Care Sliding Scale program parameters up to about \$45,000 and again above \$65,000 adjusted gross income. Between \$45,000 and \$65,000 adjusted gross income, family efforts were higher using the Child Care Sliding Scale program parameters. These results were reflected in the dollar amount assignments to families and taxpayers, as shown on the following page.

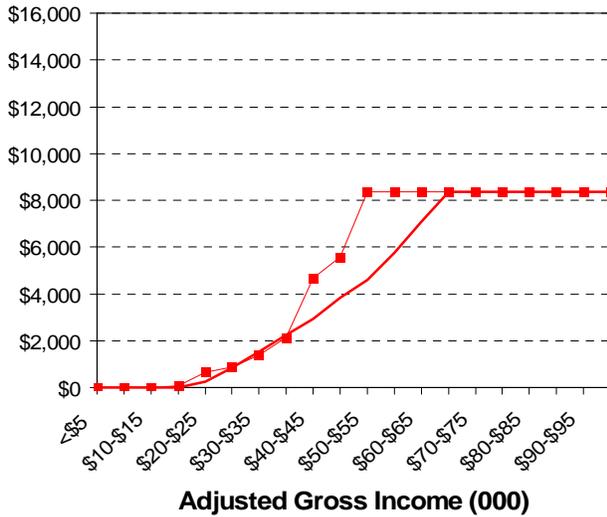
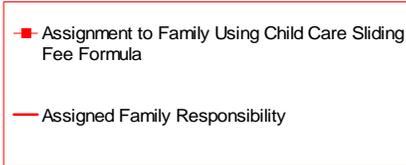
⁸ Accessed at *Laws of Minnesota 2007*, Chapter 147, Article 2, Section 9.

Child Care Sliding Scale

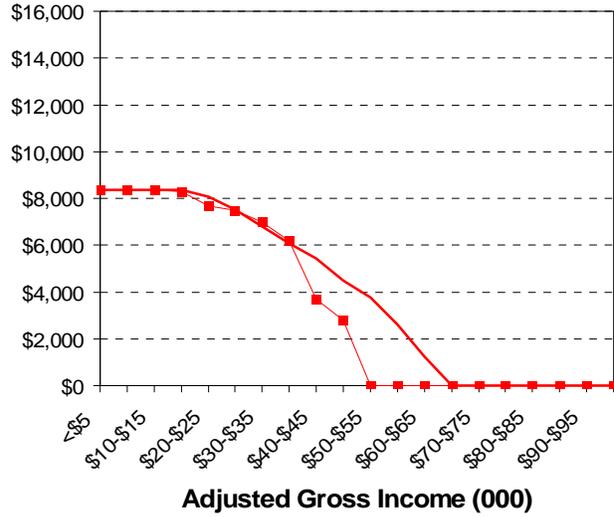
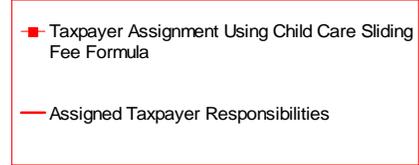
Family Efforts



Assignments to Families



Assignments to Taxpayers



Findings

The following highlight the results of comparing federal and Minnesota individual income tax liabilities and burdens to Assigned Family Responsibilities and Efforts. The following also highlight the results of substituting ability to pay measures from other government programs for the Minnesota State Grant program's Assigned Family Responsibilities and Efforts.

- Federal and Minnesota individual income tax burdens were progressive; as income increased, tax liabilities were a larger percent of income.
- Minnesota's property tax refund program tempered property tax regressivity, but property taxes remained overall regressive.
- The Minnesota State Grant program's Assigned Family Efforts, in comparison to federal and Minnesota individual income taxes and Minnesota's property tax refund program, were zero for families on the lowest end of the income spectrum, steeply progressive for moderate income families and regressive for families on the high end of the income spectrum.
- The Minnesota State Grant program's Assigned Family Efforts, starting at about \$20,000 adjusted gross income, were higher when compared to the state's reimbursement program for care of disabled children.
- The Minnesota State Grant program's Assigned Family Responsibilities were higher and Assigned Taxpayer Responsibilities were lower when compared to the dollar amount results using the state's reimbursement formula for care of disabled children.
- The Minnesota State Grant program's Assigned Family Efforts were similar to the resulting efforts using the Child Care Sliding Scale program parameters up to about \$45,000 and again above \$65,000 adjusted gross income, but between \$45,000 and \$65,000 adjusted gross income, Assigned Family Efforts were higher using the Child Care Sliding Scale program parameters.
- The Minnesota State Grant program Assigned Family and Taxpayer Responsibilities were similar to the resulting dollar amounts using the Child Care Sliding Scale program up to about \$45,000 and again above \$65,000 adjusted gross income, but between \$45,000 and \$65,000 adjusted gross income, they were higher using the Child Care Sliding Scale program parameters.