An Argument for the Repeal of Tax Preferences to Large One-Time Donations to Non-Profit Higher Educational Institutions with Mega-Endowments

Stuart Schaefer March, 2013

Senior thesis submitted in partial fulfillment of the requirements for a Bachelor of Arts degree in Economics at the University of Puget Sound "It is a wise man who said that there is no greater inequality than the equal treatment of unequals." - Felix Frankfurter, Former Associate Justice of the United States Supreme Court

Introduction

In the United States the tax system is generally separated into three different levels, federal, state and local. In each of the three levels there can be different kinds of taxes, such as estate, excise, income, payroll, property, and sales taxes. The taxes collected by each of the levels of government are used to provide goods and services to the community that it represents. This discussion is focused on federal taxes, particularly the federal income tax of individuals.

This discussion is an examination of a particular exemption for the federal income tax which is obtained through a donation to a qualified non-profit organization designated as a 501(c)(3) as described by the United States Tax Code. Non-profit organizations that are 501(c)(3) are bound by the non-distribution constraint. The non-distribution constraint requires organizations when they have surplus revenue to be retained by the organization and used for expenses related to its mission instead of distributing the revenue as dividends to stock holders or as bonuses to executives. A type of organizations that fall under the 501(c)(3) status includes those of higher education such as private colleges and universities. Some examples of this are: University of Puget Sound, Harvard University, Massachusetts Institute of Technology, Columbia University, etc. These non-profit higher educational institutions are given tax breaks by their non-profit status with the federal government given that they are bound by the non-distribution constraint.

The inspiration for this paper comes from recent discussions on the income distribution in the United States. Particularly what I want to examine is how higher educational institutions perpetuate the income gap in the country. The higher educational institutions benefit greatly from having the incentives for donations, which comes from the ability to reduce their taxable income by donations to these non-profit higher educational institutions. In my research I have come across a substantial body of literature which addresses the topic of non-profit higher educational institutions.

Literature Review

This section describes a small portion of the literature about non-profit higher educational institutions. There is a particular emphasis on the work that has influenced my discussion and from which I have drawn particular definitions and terms. This section should frame my discussion within the present body of literature on non-profit higher educational institutions and how the tax system affects these organizations.

Sarah Waldeck (2009) presents an analysis of non-profit higher educational schools with extremely large endowments and why economists and lawmakers should be concerned about these institutions. She presents three ways of identifying institutions which should be considered wealthy: absolute value, endowment-expense ratios, and endowment per full time student. She considers both absolute value and the endowment expense ratio as measures before finally rejecting them. She rejects absolute value for the obvious reason that small liberal arts colleges need fewer resources than a large research university and therefore it is difficult to accurately compare the two. Waldeck admits the validity of the endowment expense ratio for measuring

endowments in that it "acknowledges that the strength of an endowment depends on the extent in which it can pay for institutional activities" (1800). She ultimately rejects the endowment expense ratio as the ratio is easily manipulated. Waldeck settles on the measure of a schools endowment per full-time student in the range of \$300,000 or more. Given her research, institutions which fall within this range tend to have expense-endowment ratios in which "...a university could spend more without jeopardizing its long-term prospects." (1802). Waldeck acknowledges that this measure is not without its flaws, but it is still the best measure for determining the wealth of an institution. Waldeck labels the schools that fall in the range of endowment per full time student of \$300,000 or greater to have mega-endowments.

Waldeck then articulates the concerns that should be brought forward about schools with mega-endowments with the "...rising cost of tuition, the promise of research and development that takes place in university laboratories, and the inefficiencies that mega-endowments may create at institutions that hold them." (1803). She presents the defense mega-endowments through intergenerational equity, saving for a rainy day, and that the funds in the endowment are restricted by the donors. The defense of mega-endowments is then dismantled as intergenerational equality is supposedly justified to keep pace with inflation. While there is no evidence that this actually occurs; saving for a rainy day is attempting to treat an endowment as individual wealth which is a subjective view that is incongruent with the economic reality; and donor-restricted funds are a reality that do not prevent the university from spending more as a whole. Waldeck then presents the idea that since endowments are primarily used as performance measures for the university, it creates an incentive to make judgements that do not have the health of the university in mind.

Waldeck additionally presents a few possible actions that could alleviate the economic inefficiencies that mega-endowments present non-profit higher educational institutions. The first proposed action is requiring a 5% spending floor on institutions with mega endowments. This would generate higher endowment spending which would increase a university's endowment-expense ratio. The second proposed action would be revising tax Form 990 to include questions that give more insight into a university's standard practices when it comes to their endowment, which could compel the institutions to spend more. The third proposed action is taxing returns on a university's endowment investments. While Waldeck acknowledges that legislature would have to be cautious when implementing an endowment investment tax, the tax revenue could be used to create tuition relief measures, which could offset rising tuition costs.

Herwig Schlunk (2009) addresses the issue of university endowments with a particular interest in uncovering a proxy for the quality of education that these institutions provide. He examines the positives for the ability to deduct donations from taxable income donations to university endowments which, he asserts, can be reduced to three arguments; the ability to deduct donations from taxable income encourage generosity, Federal spending more accurately reflects societal preferences, and that donors are better able to monitor the quality of education services than their donations purchase. Schlunk ultimately rejects all of these theoretical defenses of allowing deductions on taxable income for donations to university endowments with a caveat for small repeat donations that become a revenue item for the university.

Schlunk describes that donations to universities generally come in two forms: "repeat smaller gifts that become a revenue item...and larger one-time gifts that become part of such institutions endowments" (5). Schlunk concedes that the ability to deduct small repeat donations from taxable income are completely justifiable as they encourage the institution to increase their

spending and create incentives for the donors to monitor their donations. Large one-time donations, Schlunk argues, cannot be justified on the same rational as the small repeat donations.

Schlunk rejects the notion that federal spending can more accurately reflect societal preferences for these large one-time donations under the rejection of the crux of that argument, that societal preferences are reflected through the actions of the wealthy individuals who make the donation. Schlunk examines the base of a representative government as elected officials who are supposed to represent their constituency and therefore any allocation of funds that they make is theoretically supposed to represent the constituency's interests. A donor, on the other hand, can be assumed to be a relatively wealthy individual and is therefore not a representative of the constituency as a whole. Therefore "however inefficient the Federal government may be at choosing how to direct such spending, such inefficiency should be tolerated as being significantly more reflective of the public will than is the donor's choice" (8). Schlunk then rejects the argument that donors are better able to monitor the quality of eduction that their donations purchase than the Federal government. After the donations that are given to an organization, the donor has little incentive to monitor how his donation is used by after it has been made.

Schlunk then examines cross-sectional data from the top-twenty private universities as ranked by the US News and World Report for the average percentage increase of their endowments, the average percentage increase in undergraduate enrollment, and the average percentage increase in full-time tuition. He comes to the conclusion that the rate in which these university endowments are increasing is disproportionally outpacing both the growth of full-time student enrollment at these institutions and the rate at which student-to-teacher ratios are decreasing. Schlunk presents his analysis of the data which shows that the rate at which

endowments are growing does seem to be related to the rate at which administration salaries are increasing.

Schlunk recommends four items that address the concerns raised through the disconnect between the quality of education and the size of a university's endowment. First, a very high tax rate should be imposed upon any income that is earned by endowments, second deductions should be repealed for gifts that prohibit the institution from immediately spending the money donated, and third a tax on the income generated from endowments that universities maintain on its own books. Finally the deduction to taxable income should be unavailable to donors that have contractually committed themselves to make annual gifts over a period of more than a few years.

Steinberg, Piranio and Haveman were interested in exploring access to higher education, specifically the variation of the percentage of Pell Grants among higher educational institutions. They were motivated in that while increasing access to college for students from middle and lower income families is high on the priority light of legislators, there was a limited amount of data regarding the income distributions of students. This vacuum of data prevents legislators from making informed decisions about the availability of higher education in the United States.

Steinberg, Piranio and Haveman focus on the proportion of students at higher educational institutions that are supported by Pell Grants as a proxy for students from lower-income families. The authors measure the PPR, or the Pell Prevalence Ratio, which describes the percentage of the undergraduate student body who are receiving a Pell Grant. Their research includes both public and private universities, but for the purpose of my discussion I will be focusing on their analysis of the private higher education sector. Their sample included 408 schools, across 50 states and covered both institutional-level variables and state-level variables to capture as much of the variation in their regression model as possible.

Their results for the private sector institutions found a significant negative correlation between PPR and multiple independent variables. A 1% increase in the cost of attendance yields a 0.19% decrease in the PPR. Similarly, an increase in the median SAT score by 1% leads to a 0.43% decrease in the PPR. As the enrollment size of the university increases by 1%, there is a 0.02% decrease in the PPR. The authors found one significant positive correlation between the institutional grant aid, in which a 1% increase (per enrollee) can be attributed to "a three-fold increase in the PPR among private universities relative to public universities" (257). The positive correlation between institutional grant aid and the PPR is reflective of the negative correlation between cost of attendance and the PPR. The authors believe that this may indicate that lower-income students have greater price sensitivity to the cost of private institutions.

These three papers demonstrate a small but representative group of papers on the topic of higher educational institutions. All of these works have influenced my own discussion into non-profit higher education and I have adopted some definitions and correlations from these papers to solidify my discussion, which I hope serve the purpose of creating a robust theoretical argument.

Adopted Terms and Qualifications

In my research I have come across a substantial field of literature which contains a variety of arguments on the subject of non-profit higher educational institutions. In my effort to have a robust argument, I have adopted some qualifications for my argument that allow me to create a solid theoretical base in which to examine higher education.

Waldeck concludes her discussion by restating that the amount endowment per full-time student is an acceptable proxy for determining institutions which have excessive wealth. Given

her extensive discussion on university endowments and the effects of an excessive endowment on the economy and the market for the higher education, I have adopted the qualification of a higher educational institution with a mega-endowment for my argument. I also believe that her analysis of the proxy of amount of endowment per full-time student to be a proxy for an inefficient endowment expense ratio. As a result I have adopted the definition of an endowment size of \$300,000 per full time student or greater as a qualification for my argument.

Schlunk, as previously discussed, has made a theoretical distinction between the implications of small repeat donations verses large one-time donations to a private higher education institutions. I am convinced of his argument that small repeat donations are justifiable given the current tax system and have as a result omitted them from my discussion. Likewise I am convinced of the economic inefficiencies that are created from large one-time donations to higher education institutions. As a result I have adopted the emphasis on large one-time donations into my own discussion of non-profit higher educational institutions and will use it as a qualification for my argument.

Through adopting qualifications on both the size of an endowment and the type of donation, a stronger argument can be formed. From this point forward I will be talking exclusively of non-profit higher educational institutions with mega endowments, defined by Schlunk as an endowment of \$300,000 or greater per full time student. As well, I will be focusing my argument on the assumption adopted from Waldeck that donations to higher educational institutions are large one-time donations. These qualifications narrow the section of higher education that is being examined in this discussion. It seems appropriate to look at the theory that is being used to analyze the tax deduction of taxable income that is given to large one-time donations to higher educational institutions with mega-endowments.

Tax Burden Theory

How I am looking at these donations and the subsequent tax deduction is through the lens of tax burden, or tax incidence. Miranda Fleischer (2009) helps bring forward the value judgements that are inherent in the tax system, and she attempts to present criteria for which projects deserve subsidy through the tax system. Her biggest concern is the present lack of emphasis on the distributive justice aspect of the tax system. Her ideas are an extremely valuable framework in which to view the tax incidence of the tax deduction to taxable income that large one-time donations receive when given to non-profit higher educational institutions with megaendowments.

The higher tax rates of individuals who have higher incomes make these individuals more sensitive to the incentives provided by the deductions given by donations to charitable causes. An individual who is in a tax bracket which requires them to pay 35% of their income in tax has a higher incentive to give than an individual who is in a tax bracket that requires 10% of their income in tax. For example take the first individual, Person A, who donates \$100 to a charitable cause. Through this donation they are able to deduct \$100 from their taxable income. When this \$100 is subtracted from their taxable income, they no longer have to pay their 35% tax on that \$100; by donating \$100, they are no longer required to pay \$35 in taxes. As they are no longer required to pay the \$35, the actual cost of their \$100 donation is actually \$65. Now consider the second individual, Person B, also donates \$100 to a charitable cause. They are then able to deduct \$100 from their taxable income, same as the Person A. Person B is now no longer required to pay taxes on that \$100, since their tax rate is 10%, they are no longer required to pay

\$10 in taxes. As a result the actual cost of their donation of \$100 is actually \$90. This shows that individuals with higher tax rates, aka the wealthy, have a larger incentive to donate to charitable causes as the true cost of the donation is significantly less than individuals with lower tax rates.

This incentive structure that is built into the tax system initially does not seem to have any issues. Once the target market of the services the organizations provide are taken into account, issues begin to arise. Fleicher states that "the *tax* system...by its very nature raises distributive justice issues in determining how the benefits and burdens of our society are to be apportioned" (27-28). When discussing the tax system it is important to examine how those benefits and burdens are distributed in our society. In an unsubsidized industry, the individuals who consume the good or service of the organization are the same individuals that pay the price to the organization, so the benefit and burden to society is placed directly on the individual who has demand for the service. In the case of a non-profit organization that allows its donors to deduct gifts from their taxable income, there becomes the possibility for issues of equity to arise. When donations are allowed to be deducted from taxable income, the amount of money that the government needs to spend to provide subsidized services does not diminish, therefore a tax burden is placed upon individuals who do not make donations or purchase the service in a subsidized market.

To illustrate this point, lets assume that there are only two socio-economic classes of society, high and low. Given the income distribution, only the high socio-economic class has the quantity of income available to make donations. Lets say a household from the high socio-economic class donates money to a non-profit organization which receives a subsidy to provide a service that is generally used by households of the low socio-economic class. In this case the burden of society is placed on the higher socio-economic class, and the benefit is given to the

households of the low socio-economic class. There are no equity issues in this example, as the action theoretically diminishes the amount of tax revenue that needs to be spent to provide this service. The action therefore validates the value judgements present in the tax system. Now suppose a household from the high socio-economic class donates to a non-profit organization that primarily provides a service to households from the high socio-economic class. This action does not diminish the amount of money that the government needs to spend to provide all subsidized services while at the same time lowering overall tax revenue, therefore this action places a tax burden upon the lower income households who do not use the service.

When applying the theory of tax burden to large one-time donations to higher educational institutions with mega-endowments, the efficiency of the donations and their effects should be taken into account along with the analysis of equity. The efficiency measure I want to focus on is Hicks-Kaldor efficiency.

Efficiency Measures

The efficiency measure behind this discussion on non-profit higher educational institutions with mega-endowments is Hicks-Kaldor efficiency. Hicks-Kaldor efficiency is based off of the efficiency measure of Pareto optimality. Pareto optimality is an efficiency measure that refers to a choice space that encompasses two agents. For example Person A and Person B, that begin with an initial allocation goods that give them a certain level of utility. For a Pareto efficient outcome to occur, a change in the allocation of the agents cannot make any of the agents any worse off then they were before. If this is still possible, the allocation is not a Pareto optimal solution and the change to that allocation is a Pareto improvement. If it is impossible to make an

agent better off without making another worse off, then the allocation is said to be Pareto efficient. The Pareto optimality model is extremely prohibitive in that it does not allow for any changes in allocations that make any individual worse off. The assumption that not making anyone worse off is slightly unrealistic and would not be at all useful in discussing the redistributive tax model that the non-profit tax structure inherently embodies, so to more accurately model the real world tax structure, I have chosen to use the Hicks-Kaldor model.

The Hicks-Kaldor model is very similar to the Pareto optimality model but has less restrictive criteria, and is therefore useful in more situations, like when trying to model situations with re-distributive tax structure of non-profits. Hicks-Kaldor efficiency states that any change from the initial distribution is more efficient if the agent who is better off from the change could, in theory, compensate those that are made worse off. This could, in practice, leave some people worse off, as the compensation does not actually have to occur. Figure 1 below provides a graphical representation of both Pareto improvements from the initial allocation, and of Hicks-Kaldor improvements from the initial allocation.

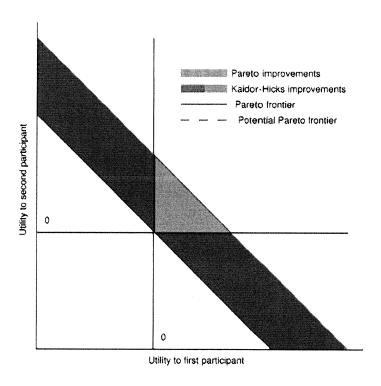


Figure 1

Both the theory of tax burden theory, and the measure of Hicks-Kaldor efficiency present a framework to discuss the available tax deduction to large one-time donations to non-profit higher educational institutions with mega-endowments.

Analysis of Large One-Time Donations to Non-Profit Higher Educational Institutions with Mega-Endowments.

When looking at the market of non-profit higher education, it is possible to observe there are some inherent equity concerns with allowing for tax deductions to large-one time donations. When Pareto efficiency is applied, it is obvious that there are efficiency concerns as well, as Hicks-Kaldor efficiency is applied the concerns become less clear, but are still present. In this

section I will focus on large one-time donations to non-profit higher educational institutions with mega-endowments. I will show that when Tax Burden theory is applied, their are substantial equity concerns for these tax deductions. Then I will apply Pareto efficiency to demonstrate the efficiency issues clearly, and finally apply Hicks-Kaldor efficiency to the deductions.

Literature around the non-profit higher education sector has been centered around issues of equity. The focus of this discussion, based upon the adopted definitions and terms previously discussed, is on large one-time donations to non-profit higher educational organizations that have what have been defined as having mega-endowments, which are an endowment of \$300,000 or greater per full-time student.

For Tax Burden theory to be applied to the donations to non-profit higher educational institutions with mega-endowments, there needs to be evidence that these institutions are primarily providing services to individuals who do not benefit from the subsidies that are created by the deduction of donations from taxable income. Though first we must determine that higher costs of attendance are negatively correlated with students from lower tax brackets.

Schlunk determines through analyzing the top twenty private universities that there is a positive correlation between the cost of attendance and the cost of tuition, this allows the cost of attendance to be used as an acceptable proxy for the cost of attendance. Steinberg, Piranio and Haveman determined a strong negative correlation between the cost of attendance and the percentage of Pell Grant recipients. The proxy of cost of tuition as the cost of attendance allows us to determine a theoretical model which has a negative correlation between the cost of tuition and the percentage of Pell Grant recipients in the undergraduate populations of these institutions. This shows that there is a theoretical relationship that as the cost of attending an institution rises, the percentage of students who come from families from lower tax brackets falls.

There now seems to be a correlation between the cost of attendance for a private university and the percentage of the university population that are underprivileged. Building upon this relationship we need to see if there is evidence for a relationship between the cost of attendance and the size of a university's endowment. Schlunk determines that both the cost of tuition and the size of a universities endowment are both rising above the rate of inflation. While there could be a lurking variable causing both of these to move as if they were correlated, the trend towards increasing both the endowment and the rate of tuition does present evidence that they are related positively in some way.

Schlunk uses the value-added of the starting salary and the median salary of a graduate from a private university compared to the starting salary and median salary from public universities. Schlunk uses this as a proxy to determine the quality of education that graduates from private universities obtain compared to a public university. He finds there is no correlation between the size of a schools endowment and the starting salary or the median salary of its graduates. Waldeck, as discussed before, determines that the size of the endowment is primarily used as a performance measure for university administrators, particularly the president. A study by John Core (2005) of roughly 2,000 educational institutions found a strong positive correlation between executive compensations, namely presidents, and an excess endowment. The amount of compensation increased as the amount of the excess endowment increased. In this way we can see that donations to a non-profit university's endowment have a negligible effect on the students and a significant effect on the salaries of administrators.

The positive relationship between the size of an endowment and the affects on administrator salaries shows that donations to the endowments of higher educational institutions with mega-endowments do not benefit students. The positive relationship between the size of an

endowment and administrator salaries along with the positive relationship between the cost of tuition and the salaries of graduates as well as the lack of relationship between the endowment and the salaries of graduates shows that students are essentially purchasing their future earning potential with the cost of tuition of the institution which they attend are contrary to the justifications of excessive university endowments. These relationships dissolve the perceived connection between the endowment and the quality of education that students receive. Through the negative relationship between the cost of attendance and the percentage of students who receive Pell Grants, it can be seen that the purchasing of a higher salary through attending higher educational institutions is being systematically denied to students from low socio-economic families.

As the experience and benefits of attending higher educational institutions is being denied to students from lower socio-economic households, the deductions to taxable income given to the donors of higher educational institutions with mega-endowments is placing a tax-burden upon these households. The costs of government, which do not change when a donation happens, are being more heavily placed upon the lower socio-economic households, creating more pressure on these households to provide the government with tax revenue.

Applying Hicks-Kaldor Efficiency

This tax burden that is placed upon families of low socio-economic status has efficiency issues present as well as the obvious equity issues. Using Pareto Efficiency, it becomes obvious that the tax burden is an inefficient outcome as these lower income families are worse off having

to be relied upon to pay for more government services through their tax revenue than they previously had to. When Hicks-Kaldor efficiency is applied, the inefficiencies become less clear.

With Hicks-Kaldor efficiency, it could be said that this change in allocations is efficient because the gains that these deductions allow for could be argued to theoretically cover the loss of utility that the lower socio-economic families experience. Though the tax burden is not the only negative effect that occurs. The lower socio-economic families are being systematically denied the ability to purchase a higher salary through the negative relationship between the cost of tuition and the percentage of Pell Grant recipients in higher education. These students are now placed under a tax burden along with being denied an opportunity to obtain a higher salary. To be Hicks-Kaldor efficient the gains that are achieved through these deductions to taxable income would now have to theoretically be able to compensate the loss of utility that occurred from both the tax burden that is placed on the low socio-economic families along with the loss from the opportunity to increase salary provided by attending higher educational institutions. Determining if this is actually Hicks-Kaldor efficient is difficult as the possible utility lost not being able to attend a higher educational institution is very hard to quantify, let alone the aggregate of the utility lost by all individuals affected. I am confident to say that it is highly improbable that the utility gained is greater than the potential utility lost.

Possible Counter-Arguments

A possible counter argument that I have yet to address is the research that is provided by universities which have been argued to be financed through the endowment of the institution.

While this may begin to address the inefficiency issues presented above, the positive correlation

19

between the amount of the endowment per full-time student and the amount that the institution allocates from their annual giving to build their endowment (Ehrenberg, 2003) diminishes the validity of this argument. This relationship along with the previously discussed positive relationship between the size of a university's endowment and the salaries administrators provides evidence that endowment spending towards scientific research is disproportional. If scientific research was financed proportionally to the size of an endowment, this counterargument could be stronger.

Recommendation and Conclusion

The conclusion of this discussion is that there is a theoretical argument which justifies the repeal of the ability for donors to receive a deduction to their taxable income for a large one-time donation to a higher educational institution with a mega-endowment. This could be done through creating a new second of the 501(c) tax code that applies to these higher educational institutions and does not allow for this deduction to occur. To make this change on this discussion alone would be rash and impulsive. My recommendation moving forward from this discussion on tax deductions given to the donors of large-one time donations to higher educational institutions with mega-endowments is to call for an extensive quantitative study to be conducted which extensively investigates the relationships discussed. This study could validate or dismiss the theoretical underpinnings of the argument presented here and from this quantitative study action could be taken to alleviate these economic inefficiencies and address the equity issues that are present.

Bibliography

Adams, James D., and J. Roger. Clemmons. "The Growing Allocative Inefficiency of the U.S. Higher Education Sector." *Science and Engineering Careers in the United States: An Analysis of Markets and Employment*. Cambridge, MA: National Bureau of Economic Research, 2006. 349-82. Print.

Core, John E., Wayne R. Guay, and Rodrigo S. Verdi. "Agency Problems of Excess Endowment Holdings in Not-for-profit Firms." *Journal of Accounting and Economics* 41.3 (2006): 307-33. Web.

Ehrenberg, R. "The Sources and Uses of Annual Giving at Selective Private Research Universities and Liberal Arts Colleges." *Economics of Education Review* 22.3 (2003): 223-35. Web.

Fleischer, Miranda P. "Theorizing the Charitable Tax Subsidies: The Role of Distributive Justice." *Illinois Law and Economics Research Paper Series* (2009): n. pag. Web. <Electronic copy available at: http://ssrn.com/abstract=1348772.

Kaldor-Hicks-en.svg, en:User:Jackson744, Wikipedia, http://upload.wikimedia.org/wikipedia/commons/f/f4/Kaldor-Hicks-en.svg

Schlunk, Herwig. "An Argument for the Repeal of Tax Preferences for Educational Endowments." *Vanderbilt University Law School: Law and Economics* (2009): n. pag. Web. http://ssrn.com/abstract=1533542.

Steinberg, Matthew P., Patrizio Piraino, and Robert Haveman. "Access to Higher Education: Exploring the Variation in Pell Grant Prevalence among U.S. Colleges and Universities." The Review of Higher Education 32.2 (2008): 235-70. Web.

Waldeck, Sarah E. "The Coming Showdown Over University Endowments: Enlisting the Donors." Fordham Law Review 77.4 (2009): 1796-836. Web.

Winston, Gordon C. "Subsidies, Hierarchy and Peers: The Awkward Economics of Higher Education." The Journal of Economic Perspectives 12.1 (1999): 13-36. Web.

Volkwein, Fredericks. "Campus Autonomy and Its Relationship to Measures of University Quality." The Journal of Higher Education 57.5 (1986): 510-28. Web.