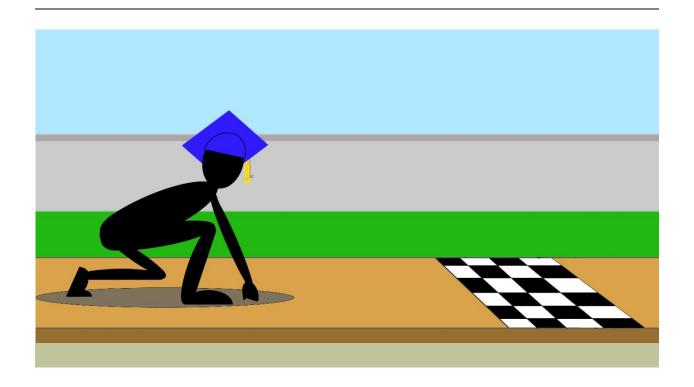
Starting out Behind: Trends in Student Loan Burdens at For-Profit Colleges





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# Starting out Behind: Trends in Student Loan Burdens at For-Profit Colleges

## **Executive Summary**

This study analyzes the impact of postsecondary institution type and student characteristics on students' decision whether to borrow and how much to borrow to finance their education. Using data from the National Postsecondary Student Aid Study from the 2011-2012 academic year, the study uses a two-stage regression model in order to estimate the impacts of student and institutional characteristics on the probability that a student would borrow and, for students who borrowed, their student debt burdens. The model controls for a number of financial resources available to students, institution characteristics, and student and family characteristics that could contribute to variations in debt between for-profit, nonprofit, and public colleges, including the total cost of attendance, amount of parental support, expected family contribution, and amount of grants received.

#### The study found that:

- Students at two-year for-profit colleges were nearly 50 percent more likely to borrow than students at public colleges, all other factors being equal.
- Latino and white students at four-year for-profit colleges were significantly more likely to borrow than Latino and white students at public or nonprofit schools.
- Students who took out debt borrowed over \$1,300 more on average to attend two-year for-profit colleges than to attend two-year public colleges.
- There were few significant differences in predicted amount borrowed at four-year colleges.
- Students' financial resources had a significant impact on the likelihood of borrowing and the amount borrowed.
- Student characteristics other than race or ethnicity had a bigger impact on the likelihood of borrowing than on the amount borrowed.

#### Based on these findings, we recommend:

- The Department of Education should strongly enforce the gainful employment rule to limit federal loans and aid to poorly performing for-profit colleges.
- The Department of Education should discharge the federal student debt of for-profit college students harmed by deceptive college practices.
- Regulators should continue to investigate and publicly report on the incentives and lending practices of for-profit colleges.
- The Consumer Financial Protection Bureau should enact student loan servicing standards that encourage affordable repayment options.

#### Introduction

Student debt is becoming an increasingly common way for students to finance their educations. Outstanding student debt totaled more than \$1.2 trillion as of November 2014, Students who graduated from public and nonprofit colleges owed an average of \$28,400 in debt in 2013. The recent explosion in student debt has prompted policymakers and the public to investigate why students are borrowing so much to go to college, whether certain institutional or student characteristics are associated with higher levels of debt, and whether student debt will ultimately help or hinder students.

This analysis examines the relationship among the type of institutions students attend, their likelihood of borrowing, and the amount they borrow to finance their educations. The first question is whether students at for-profit colleges are more likely to take out student loans, controlling for a number of student-level characteristics, than students at public and nonprofit colleges. The second question is whether students at for-profit colleges borrow more on average than students at other types of schools, all else being equal. Given the poor educational outcomes associated with for-profit colleges, excessive debt incurred at these schools may ultimately hurt student borrowers' economic outcomes, rather than increasing their human capital.

Student debt has risen in recent years for a variety of reasons. For one, college costs have increased significantly over time. From the 1994-1995 school year to the 2014-2015 school year, the average net tuition and fees at private four-year institutions grew by 29 percent.<sup>3</sup> While college costs have been increasing rapidly, students and families have also had to bear a greater proportion of the costs. The federal government has shifted away from a policy of relying heavily on grant aid to finance education towards a model more reliant on providing loans for educational purposes. In the 1970s, student loans comprised about one-fifth of student aid;<sup>4</sup> today, more than three-quarters of federal aid to students is in the form of student loans.<sup>5</sup> State governments have also moved away from investing in or subsidizing higher education and are relying more on students and families to bear the costs, especially in the wake of the Great Recession.<sup>6</sup>

Finally, some institutions, including many for-profit colleges, <sup>7</sup> have business models that encourage students to take on significant debt. Operating as businesses seeking to maximize returns to shareholders, for-profit colleges differ from the more traditional models where colleges are run by state or local governments or non-profit organizations. For-profit colleges are educating a growing proportion of American undergraduates. Enrollment at for-profit colleges has grown from 4.6 percent of all undergraduates in 2000 to 10.3 percent of all undergraduates in 2012.<sup>8</sup>

In addition, for-profit colleges that are eligible for federal aid rely heavily on federal loans and grants to bring in revenues. While federal regulations prohibit for-profit colleges from receiving more than 90

<sup>&</sup>lt;sup>1</sup> Chopra, Rohit. "Student Debt Swells, Federal Loans Now Top a Trillion." Consumer Financial Protection Bureau. July 17, 2013.

<sup>&</sup>lt;sup>2</sup> Reed, Matthew and Debbie Cochrane. "Student Debt and the Class of 2013." The Institute for College Access and Success. November 2014.

<sup>&</sup>lt;sup>3</sup> "Trends in College Pricing 2014." CollegeBoard. 2014.

<sup>&</sup>lt;sup>4</sup> Gladieux, Lawrence E. "Federal Student Aid Policy: A History and an Assessment." Proceedings of The National Conference on the Best Ways for the Federal Government to Help Students and Families Finance Postsecondary Education. October 8-9, 1995.

<sup>&</sup>lt;sup>5</sup> "2013 Annual Report of the Office of Federal Student Aid." Department of Education. December 11, 2013.

<sup>&</sup>lt;sup>6</sup> Baylor, Elizabeth. "State Disinvestment in Higher Education Has Led to an Explosion of Student-Loan Debt." Center for American Progress. December 3, 2014.

<sup>&</sup>lt;sup>7</sup> Deming, David J., Claudia Goldin, and Lawrence F. Katz. "The For-Profit Postsecondary School Sector: Nimble Critters or Agile Predators?" National Bureau of Economic Research Working Paper 17710. December 2011.

<sup>&</sup>lt;sup>8</sup> Ginder, Scott A. and Janice E. Kelly-Reid. "Enrollment in Postsecondary Institutions, Fall 2012; Financial Statistics, Fiscal Year 2012; Graduation Rates, Selected Cohorts, 2004-09; and Employees in Postsecondary Institutions, Fall 2012 First Look (Provisional Data)." Institute of Education Sciences: National Center for Education Statistics. U.S. Department of Education. December 2013.

percent of revenues from federal aid, many for-profits approach that cutoff. More than 37 percent of for-profit colleges receive at least 80 percent of their revenues from federal aid, while more than 60 percent receive at least 70 percent of their revenues from federal aid. In fact, since veterans-related aid is exempt from the "90/10" rule, a small number (1 percent) of for-profit schools receive more than 90 percent of their revenue from federal loans and aid.<sup>9</sup>

For-profit colleges also tend to be more expensive than public colleges and some nonprofit colleges. The average net price (annual tuition and fees minus grants and scholarships) of for-profit colleges was \$3,420 in 2013-2014, compared to \$3,120 for public four-year colleges and \$0 for public two-year colleges. Due to the high costs, growing enrollment, and heavy reliance of for-profit colleges on federal loans and aid, some of the recent growth in student loan debt can be attributed to the rise of for-profit colleges.<sup>10</sup>

The outcomes for students at for-profit colleges can have a major impact in Illinois. In the 2013-2014 school year, nearly 100,000 students (or 11 percent of all students) in Illinois were enrolled in for-profit colleges. Regulators and law enforcement officials have investigated the performance of some Illinois for-profit colleges. For example, Illinois Attorney General Lisa Madigan filed suit against Westwood College, alleging that it deceived students by claiming that their criminal justice program would prepare them for jobs in law enforcement. Many law enforcement agencies in Illinois will not consider Westwood graduates for positions because Westwood is not regionally accredited. Westwood students often accrued \$50,000-70,000 for a degree that would not land them a relevant job. 12

The Department of Education enforces regulations that limit federal loans and aid to career colleges (including most for-profit programs and certificate programs at public and nonprofit schools) that fail to adequately prepare their students for gainful employment. The Department examines schools' program cohort default rate and the ratio of their graduates' debt to earnings in order to determine whether students are finding gainful employment. In Illinois in 2012, students at 130 schools (39 percent of schools covered by the regulation) spent more than 20 percent of discretionary income on loan repayment and more than 30 percent of students at 47 schools (14 percent of covered schools) defaulted on their loans. The Department also restricts aid to schools when it has concerns about the schools' financial management or regulatory compliance. Of the 18 schools in Illinois on "heightened cash monitoring" as of March 1, 2015, 13 were for-profit colleges. These findings raise concerns about the sustainability of debt incurred at Illinois for-profit colleges and their marketing and management practices.

Student debt can be a positive human capital investment, particularly if it opens up educational opportunities that students would not have been otherwise able to access and that result in expanded earning potential. On average, college graduates greatly out-earn those who did not graduate from college. However, excessive student debt has the potential to drain wealth from borrowers and cause them to delay other life cycle milestones. Excessive student debt could have broader economic impacts since debt repayment ties up income that could be spent elsewhere in the economy. If student debt repayment takes up a large portion of borrowers' income, they will be limited in their ability to engage in other wealth-building activities, including saving for retirement, purchasing a home, or starting a small

11 Woodstock Institute analysis of data from Integrated Postsecondary Education Data System. April 17, 2015.

<sup>&</sup>lt;sup>9</sup> "Proprietary School 90/10 Revenue Attestation Percentages from Financial Statements with Fiscal Year Ending Dates Between 7/1/2012 and 6/30/2013." U.S. Department of Education Office of Federal Student Aid. July 22, 2014.

<sup>10</sup> Deming, Goldin, and Katz op. cit.

<sup>&</sup>lt;sup>12</sup> "Madigan Sues National For-Profit College: Westwood College Used Deceptive Marketing to Lure Students into Thousands in Debt, Limited Job Opportunities." Office of Illinois Attorney General Lisa Madigan. January 18, 2012.

<sup>&</sup>lt;sup>13</sup> Woodstock Institute analysis of 2012 Gainful Employment Information Rates. April 1, 2015.

<sup>&</sup>lt;sup>14</sup> Stratford, Michael. "Cash Monitoring List Unveiled." Inside Higher Education. March 31, 2015.

<sup>&</sup>lt;sup>15</sup> Baum, Sandy, Jennifer Ma, and Kathleen Payea. "Education Pays 2013: The Benefits of Higher Education for Individuals and Society." CollegeBoard. 2013.

business.<sup>16</sup> Excessive student debt may delay the formation of new households if borrowers are unable to afford to move out of their parents' home or a living situation with roommates.<sup>17</sup> Some studies suggest that students with more debt are less likely to get married.<sup>18</sup>

Finally, student debt can become so unaffordable that it could cause students to default on their loans. Indeed, the number of borrowers who defaulted on their student loans more than doubled over the past decade. Federal student loans have many programs, such as income-based repayment and deferment, that help students avoid default, but students must know about and apply for these options, and research suggests that these repayment programs are not reaching many students who need them. Private student loans made by banks or non-depository lenders do not have guaranteed programs to help borrowers avoid default. Unlike nearly every other type of consumer credit, student debt is nearly impossible to discharge in bankruptcy. Student loan defaults can stay on borrowers' credit reports for many years, making it difficult to access other kinds of credit. Students who default on federal loans are subject to the extraordinary and invasive debt collection powers of the federal government, including garnishment of wages, tax refunds, or Social Security.

Students who experience poor educational outcomes during their postsecondary education are more likely to be burdened with unaffordable debt than students who have higher-quality outcomes. Some programs may not actually prepare students for employment in their field of study—they may not provide the necessary credentials, for example—so students who graduate may not be able to find relevant jobs that increase their earning capacity. Students who graduate from their programs are 20 percent less likely to default on their student loans than students who do not graduate.<sup>23</sup> Schools that have both low graduation rates and high levels of student indebtedness raise concerns that they are setting students up to fail.

Many for-profit colleges fit the profile of schools where students may be at high risk of being unable to afford their loans because of poor educational outcomes. For-profit colleges tend to have lower graduation rates than other types of schools, and some have been criticized for low education quality. Among African Americans, 27 percent of students at for-profit colleges graduated in six years, compared to 44 percent of nonprofit college students.<sup>24</sup> The Department of Justice<sup>25</sup> and several state Attorneys General, including in Illinois, Massachusetts, and California, have sued for-profit colleges for deceiving students about how well their programs prepare students to find jobs in their field of study in order to boost enrollment and receipts of federal loans and aid.<sup>26</sup> According to the Department of Education, 72 percent of for-profit college graduates earn less than high school dropouts.<sup>27</sup> Indeed, the high default

<sup>&</sup>lt;sup>16</sup> Mishory, Jen and Rory O'Sullivan. "Denied? The Impact of Student Debt on the Ability to Buy a House." Young Invincibles. August 2012.

<sup>&</sup>lt;sup>17</sup> Dayen, David. "When Millennials Can't Move Out of Their Parents' Basements the Entire Economy Suffers." The New Republic. February 21, 2014.

<sup>&</sup>lt;sup>18</sup> Gicheva, Dora. "In Debt and Alone? Examining the Causal Link between Student Loans and Marriage." University of North Carolina at Greensboro. June 2012.

<sup>&</sup>lt;sup>19</sup> Hillman, Nicholas W. "College on credit: A multilevel analysis of student loan default." The Review of Higher Education, (2), 169-195.

<sup>&</sup>lt;sup>20</sup> Cunningham, Alisa F., and Gregory S. Kienzl. "Delinquency: The Untold Story of Student Loan Borrowing." Institute for Higher Education Policy (IHEP), Washington, DC. March 3, 2011.

<sup>&</sup>lt;sup>21</sup> "Default of Federal Student Loans Frequently Asked Questions." Illinois Student Assistance Commission.

<sup>&</sup>lt;sup>22</sup> Loonin, Deanne and Jillian McLaughlin. "The Student Loan Default Trap: Why Borrowers Default and What Can Be Done." National Consumer Law Center. July 2012.

<sup>&</sup>lt;sup>23</sup> Hillman op. cit.

<sup>&</sup>lt;sup>24</sup> Ginder and Kelly-Reid op. cit.

<sup>&</sup>lt;sup>25</sup> Lewin, Tamar. "For-Profit College Group Sued as U.S. Lays Out Wide Fraud." New York Times. August 8, 2011.

<sup>&</sup>lt;sup>26</sup> See "For-Profit School Sued for Deceiving Students and Facilitating Unfair Loans." Office of Massachusetts Attorney General Martha Coakley. April 3, 2014; "Madigan Sues National For-Profit College: Westwood College Used Deceptive Marketing to Lure Students into Thousands in Debt, Limited Job Opportunities." Office of Illinois Attorney General Lisa Madigan. January 18, 2012; "Attorney General Kamal D. Harris Files Suit in Alleged For-Profit College Predatory Scheme." Office of California Attorney General Kamala D. Harris. October 10, 2013

<sup>&</sup>lt;sup>27</sup> Ritsch, Massie. "Fact: Too many career-training programs lead to low wages, high debt." Homeroom: The Official Blog of the U.S. Department of Education. March 2014.

rates of for-profit college students on federal student loans suggest that they are unable to afford their loans. For-profit college students comprise 13 percent of all college students, but nearly half of all defaults on federal student loans. <sup>28</sup> Even for controlling for individual factors that may contribute to defaults, such as post-graduation unemployment, socioeconomic status, and demographics, for-profit college students are two to three times more likely to default on their loans than students at other types of colleges. <sup>29</sup>

In addition to encouraging students to take out federal student loans, some for-profit colleges lend directly to students as well. Some of the practices around these institutional loans have sparked regulatory action. For example, the Consumer Financial Protection Bureau (CFPB) initiated an enforcement action on Corinthian Colleges for its Genesis loan program. The CFPB alleged that Corinthian trained staff to push students into Genesis loans, and that staff hid the loans' extraordinarily high costs from students and deceived students about Genesis' very high default rate.<sup>30</sup>

Such poor outcomes and high default rates are of particular concern to policymakers because for-profit colleges disproportionately educate students who historically have had fewer economic and educational opportunities, such as low-income students and students of color. Low-income students comprise 50 percent of students at for-profit colleges, while 37 percent of the students are minorities. People of color have significantly less wealth than whites, and borrowing student loans from for-profit colleges that are unaffordable and unproductive could exacerbate the racial wealth gap or, at least, hold students of color back from engaging in wealth-building activities. For-profit colleges are the most expensive option for low-income students—which are the majority of students that they educate. On average, after grant aid, for-profit colleges cost low-income students nearly \$10,000 in 2011-2012, while nonprofit four-year colleges cost about \$2,000, and public two- and four-year colleges cost \$0.33 The higher out-of-pocket cost that low-income students must pay at for-profit colleges means that the students who are most at risk of default may need to take out more debt to finance their educations at for-profit schools than at other schools.

In this paper, I analyze the impact of institution type and student characteristics on students' decision to borrow to finance their education in the 2011-2012 academic year, as well as the amount borrowed. Given the incentives that for-profit colleges have to encourage students to borrow federal and institutional loans, and the high out-of-pocket costs for the large number of low-income students that for-profit colleges educate, my hypothesis is that students at for-profit colleges will be more likely to borrow, and will take out more debt, than students at public or nonprofit colleges, even controlling for student-level characteristics that may influence debt levels.

Analysis of the data shows that, holding key student demographic and financial characteristics constant, most students at for-profit colleges are more likely to borrow than students at non-profit and public colleges. The exception to this pattern is African American students attending four-year colleges, who are equally likely to borrow regardless of the type of school they attend.

<sup>&</sup>lt;sup>28</sup> Ibid.

<sup>&</sup>lt;sup>29</sup> Hillman *op. cit.* 

 <sup>30 &</sup>quot;CFPB Sues For-Profit Corinthian Colleges for Predatory Lending Scheme." Consumer Financial Protection Bureau. September 16, 2014.
 31 Lynch, Mamie, Jennifer Engle, and Jose L. Cruz. "Subprime Opportunity: The Unfulfilled Promise of For-Profit Colleges and Universities."

The Education Trust. November 2010.

32 Kochhar, Rakesh and Richard Fry. "Wealth inequality has widened along racial, ethnic lines since end of Great Recession." Pew Research

<sup>&</sup>lt;sup>32</sup> Kochhar, Rakesh and Richard Fry. "Wealth inequality has widened along racial, ethnic lines since end of Great Recession." Pew Research Center. December 12, 2014.

<sup>33 &</sup>quot;Trends in College Pricing 2013." CollegeBoard. 2013

<sup>&</sup>lt;sup>34</sup> Hillman op. cit.

Student and institutional characteristics have a mixed impact on the size of debt burdens for students who borrow. Latino and white students at two-year for-profit colleges who borrow take out significantly more debt than Latino and white students at two-year public and nonprofit colleges. However, at four-year colleges, African American and white students at for-profit colleges who borrow take out less or equal amounts of debt than similar students at public or nonprofit schools. There were no statistically significant institutional differences in the sizes of the debt burdens of African American students at two-year colleges or Latino students at four-year schools.

These findings reinforce the need for further investigation by state and federal regulators into what is happening at for-profit colleges that results in more students borrowing at these institutions, even holding financial circumstances such as tuition and fees, grants, and expected family contribution constant. Business practices and financial incentives may be behind the relatively high amount of debt incurred by for-profit college students. This is particularly concerning because students may not be getting good returns on their investments in their for-profit educations, given the poor job placement and educational outcomes at many of these schools.

#### Theoretical Framework

In this analysis, I test the hypothesis that for-profit college students are more likely to borrow and will borrow more than students at public and nonprofit colleges. I include in the model other independent variables that may contribute to students' need or willingness to take on debt to finance their educations.

The characteristics of the students and their families may impact the total amount of loans students take. Students whose parents did not attend college may be unfamiliar with the college application and student aid process and might therefore incur higher debt levels. Students who are older students may be more likely than traditional students to take out loans because the older students may not have access to their parents' resources to contribute to college costs. Married students may be less likely than unmarried students to take out loans if their spouse could contribute to living expenses or college costs.

In addition, the financial circumstances of a student's family will likely impact how much debt they will need to take out to pay for college costs. Racial differences in debt at for-profit and other types of schools could be explained by the racial wealth gap, since families of color tend to have fewer resources to contribute to a post-secondary education. In order control for family resources, I include the expected family contribution (EFC), which the federal government calculates to determine student eligibility for federal need-based aid, as a proxy. Families may not contribute what the government expects them to contribute, however, and so students still may need to borrow more than if their families contributed the full EFC amount. The total costs of attending a school, including tuition, fees, and non-tuition expenses, would clearly be expected to increase the amount of debt students take on as costs increase. Whether students work and how much they work could have varying impacts on the amount of debt students take out. Working students may have more income, which would reduce the amount of debt students take out, but needing to work could also be an indicator that students have fewer personal or family resources to contribute to their education costs, which may mean they take out more debt. The student's dependency status could have a big difference in the amount of need-based grant aid students can qualify for, since schools do not take into account the resources of independent students' parents, which are presumably higher than the students' resources. Total grant aid would presumably decrease the amount of debt students take out, but if the grant aid is need-based, it could be an indicator of strained financial resources, which may lead students to take out more debt. Finally, the amount of financial help dependent students receive from parents would presumably reduce the amount of debt they take out.

For-profit  Nonprofit  African American  Latino  Years of age  Student marital status  Married  Separated  Parental education	+ + + + +
African American Latino Years of age Student marital status  Married Separated Parental education	+ + + +
Latino Years of age Student marital status  Married Separated Parental education	+
Years of age Student marital status  Married Separated Parental education	+
Student marital status  Married  Separated  Parental education	
Married Separated Parental education	-
Separated Parental education	-
Parental education	
	+/-
D 11	
Do not know	+/-
Did not complete HS	+
Vocational/tech training	+
Associate's degree	-
Some college	-
Bachelor's degree	-
Master's degree	-
Doctoralresearch	-
Doctoralprofessional	-
Student financial resources	
Tuition, fees, and non-tuition expenses	+
EFC	+/-
Independent	+/-
Total grants	+/-
Parental help	-
Student employment	
Part time	
Full time	+/-

Note: + indicates a predicted increase in likelihood of borrowing and amount borrowed, - indicates a predicted decrease in likelihood of borrowing and amount borrowed, and +/- indicates ambiguous or contradictory impacts

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#### Data

The data used in the analysis are from the 2011-2012 National Postsecondary Student Aid Study, administered by the Department of Education's Institute for Education Statistics every four years. That study examines the characteristics of students in postsecondary education with particular attention to how they finance their education. The dataset is comprised of student-level records and the data come from institutional records, government databases, and student interviews.

The 2011-2012 NPSAS sampled from all students at Title IV eligible postsecondary institutions in the United States using a stratified two-stage design (1,690 total institutions and 128,120 total graduate and undergraduate students).<sup>35</sup> Because the sample was not a simple random sample, standard statistical techniques may produce estimates of confidence intervals that are misleadingly narrow. I used the Balanced Repeated Replication method (BRR) to more accurately estimate sampling variance when analyzing the data, using study weights included with the NPSAS data. BRR repeatedly re-estimates the statistics of interest using half the sample at a time, then compares the difference between each half-sample to estimate the sampling variance of the statistic of interest.

For the purposes of this analysis, I limited the sample to undergraduate students, citizens and resident aliens (because non-resident students cannot qualify for Title IV aid), students who attend one college during the 2011-2012 (which simplifies tracking financial aid), and students who attend full time. I also limit the student population to white, African American, and Latino students. There are approximately 46,300 observations in my sample.

#### Model

In this analysis, I used a two-stage model in order to estimate the impacts of student and institutional characteristics on the probability that a student would borrow and, for students who borrowed, their student debt burdens. Approximately two-thirds of two-year college students and one-third of four-year college students in the sample did not borrow at all. This large proportion of zeroes in the dependent variable could bias an ordinary least squares regression (OLS) analysis of student and institutional characteristics on the amount borrowed. Instead, I first ran a probit regression of the independent variables for all students on a binary dependent variable indicating whether the student borrowed or not. Second, I ran an OLS regression of the independent variables on the amount borrowed for only the students who took out loans to finance their educations. The results are reported in terms of predicted probabilities of borrowing and predicted amount borrowed for typical students; that is, I predicted the likelihood of borrowing and amount borrowed for each racial/institutional group using the mean value of continuous variables, or the modal value of categorical variables, in the model. A regression results table is included in the technical appendix. I used chi-squared tests with p < 0.05 to test for differences in the predicted likelihood of borrowing and F-tests with p < 0.05 to test for differences in the predicted amount borrowed.

Total debt includes all loans, excluding Direct PLUS loans to parents, received during the 2011-2012 school year, including federal loans, state loans, institutional loans, and private commercial or alternative loans. I ran the same specifications separately on students at schools where the program's highest offering was two years or less and students at schools where the program's highest offering was four years. A year

<sup>&</sup>lt;sup>35</sup> Wine, Jennifer, Michael Bryan, Peter Siegel, and Tracy Hunt-White. "2011–12 National Postsecondary Student Aid Study Data File Documentation." U.S. Department of Education. December 2013.

at a four-year college is more expensive on average than a year at a two-year college, which would increase the likelihood of students borrowing. Indeed, students at four-year colleges are more likely to borrow, and borrow more, than students at two-year colleges (see table 1).

I selected a number of covariates that are likely to impact the amount of debt that students take out. These covariates fall into three categories: financial resources available to students, institution characteristics, and student and family characteristics.

Financial resources available to students: This category includes the financial demands on students as well as the resources students have to meet those demands. These covariates include the costs of attendance (tuition, fees, and non-tuition expenses); the expected family contribution to the costs of education (EFC); whether the student works full time, part time, or not at all; whether the student is legally independent of his or her parents; total grants; and financial help from parents.

Students at four-year colleges look quite different than students at two-year colleges on their financial characteristics (see table 1). The costs of attendance and expected family contributions were much higher at four-year colleges than at two-year colleges. Students received more grants and more help from parents at four-year colleges than at two-year colleges.

More than half of students at both two- and four-year colleges were employed full- or part-time. Slightly more students at four-year colleges were employed part-time than students at two-year colleges, while slightly more students at two-year colleges were employed full-time than students at four-year colleges. Over half of students at two-year colleges were independent from their parents, compared to about a third of students at four-year colleges.

*Institution characteristics*: The institution characteristic included in the model is for-profit or nonprofit school, with public school as the omitted variable. More two-year colleges were for-profit than four-year colleges, while very few two-year colleges were nonprofit. Due to the small sample size, I omitted two-year nonprofit colleges from this analysis.

Student/family characteristics: Student and family characteristics included in the model include student race or ethnicity (white, African American, or Latino), student age, the highest level of education achieved by either of the student's parents, and the student's marital status.

Again, there were marked differences in individual and family characteristics between students at twoand four-year colleges. African American and Latino students comprised a larger percentage of the student body at two-year colleges than at four-year colleges. Students at two-year college students were older on average than students at four-year colleges. A larger percentage of students at four-year colleges had a parent who attained a bachelor's degree or higher than students at two-year colleges. Most students at two- and four-year colleges were single, though a higher percentage of students at two-year colleges were married than students at four-year colleges.

**Table 1. Descriptive statistics** 

Table 1. Descriptive statistics	Two-year colleges	Four-year colleges
	Mean/Standard Deviation	Mean/Standard Deviation
Dependent variables		
Total loans (if borrowed=1)	\$6,060.63	\$7,871.72
· · · · · · · · · · · · · · · · · · ·	\$5,124.81	\$4,666.78
Proportion who borrowed	0.36	0.65
	0.51	0.46
Student and institutional characteristic		0.40
For-profit	0.23 0.45	0.18 0.37
Nonprofit	0.45	0.27
Nonpront	0.14	0.43
For-profit x African American	0.06	0.05
·	0.25	0.22
For-profit x Latino	0.06	0.03
	0.26	0.16
Nonprofit x African American	3.95E-03	0.04
Nonprofit x Latino	0.07 4.24E-03	0.18 0.03
Nonpront x Latino	0.07	0.03
African American	0.20	0.17
	0.43	0.36
Latino	0.21	0.14
	0.43	0.33
Years of age	26.04	23.97
	9.85	7.52
Student marital status	2.12	244
Married	0.16	0.11 0.30
Separated	0.39	0.02
Separateu	0.03	0.12
Parental education	0.10	0.12
Do not know	0.05	0.02
	0.23	0.14
Did not complete HS	0.09	0.05
	0.30	0.20
Vocational/tech training	0.05	0.04
A a a a i atala da ava a	0.24	0.19
Associate's degree	0.08 0.29	0.07 0.25
Some college	0.15	0.25
come conege	0.39	0.33
Bachelor's degree	0.16	0.23
	0.39	0.41
Master's degree	0.07	0.16
	0.28	0.35
Doctoral degreeresearch	0.02	0.04
Doctoral dagrae professional	0.14	0.19
Doctoral degreeprofessional	0.01 0.12	0.03 0.17
Student financial resources	V-15	
Tuition, fees, and non-tuition expenses	\$14,305.48	\$25,630.65
. , ,	\$8,765.93	\$12,521.87
EFC	\$5,216.96	\$10,674.87
	\$11,545.16	\$15,787.87
Independent	0.55	0.35
<b>T</b>	0.53	0.46
Total grants	\$2,694.41 \$2,252.57	\$6,599.69 \$8,734.47
	\$3,253.57 \$1,242.22	\$8,721.17 \$4,772.80
Parental help	\$1,342.22 \$4,225.01	\$4,772.80 \$7,567.07
Student employment	ψ¬,∠∠∪.∪ Ι	ψι, ιυυ, ιψ
Part time	0.38	0.45
· art arro	0.52	0.48
Full time	0.22	0.18
<del></del>	0.44	0.37

#### Results

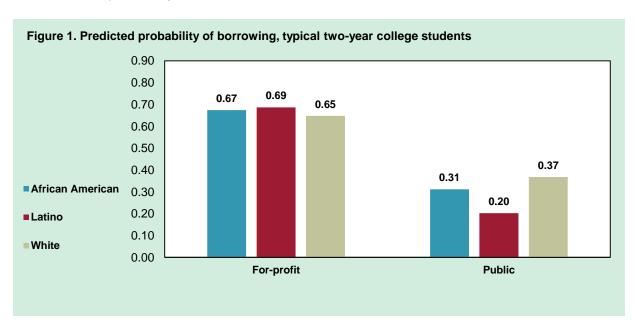
The results of the analysis can be summarized into four key findings:

First, students at two-year for-profit colleges are more likely to borrow to finance their educations than students at public schools for all groups. At four-year for-profit colleges, white and Latino students were more likely to borrow than similar students at either public or nonprofit four-year colleges. African American students attending four-year schools were equally likely to borrow regardless of whether the school was for-profit, public, or nonprofit.

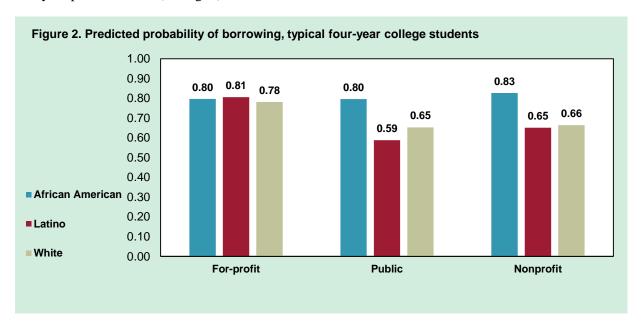
Second, students at for-profit two-year colleges who took out debt borrowed significantly more than students at public two-year colleges. There was no statistically significant difference in the amount borrowed between students who borrowed at for-profit four-year schools and students who borrowed at public or nonprofit four-year schools.

Third, students' financial resources consistently had a significant impact on the likelihood of borrowing and the amount borrowed. The student's tuition, fees, and non-tuition expenses have a significant positive impact on likelihood of borrowing and amount borrowed across all populations, as did working part time at four-year schools. Independent status was associated with higher likelihood of borrowing and higher debt loads at two-year schools, while it was associated with lower likelihood of borrowing and higher debt loads at four-year schools. Grant aid increased the likelihood of borrowing at two-year schools and reduced debt loads at four-year schools. Parental help reduced the likelihood of borrowing and total loans on average at four-year colleges.

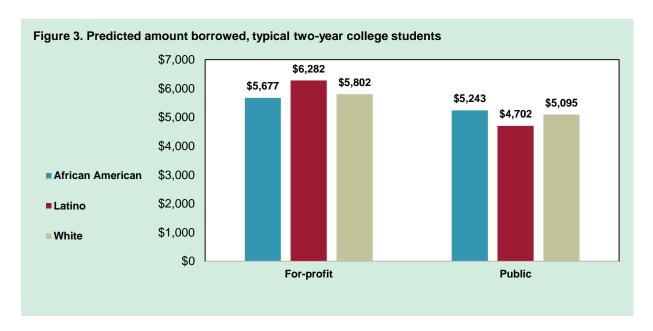
Fourth, student characteristics other than race or ethnicity had a bigger impact on the likelihood of borrowing than on the amount borrowed. Students were less likely to borrow if they had parents who have an associate's degree or higher (at four-year schools) or bachelor's degree or higher (four-year schools). Married students were less likely to borrow than single students. Older students borrowed more than younger students at two- and four-year colleges and were more likely to borrow than younger students at four-year colleges.



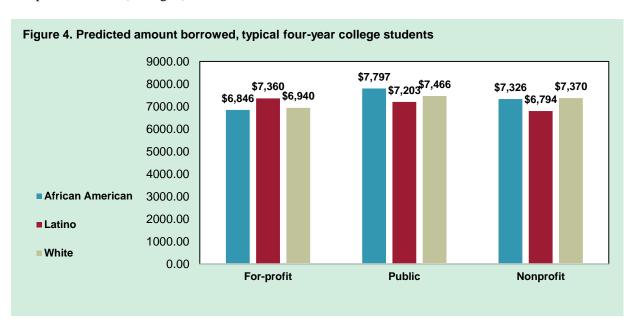
Students were nearly 50 percent more likely to borrow at two-year for-profit colleges than public colleges, all other factors being equal. The results of the regression analysis, holding student and financial characteristics constant, show that students at two-year for-profit schools were 46.8 percentage points more likely to borrow to finance their education than students at two-year public schools. Latino two-year college students were more than three times as likely to borrow at for-profit colleges (69 percent) than at public colleges (20 percent), while African-American two-year college students were more than twice as likely to borrow at for-profit colleges (67 percent) than at public colleges (31 percent). White two-year college students were 28 percentage points more likely to borrow at for-profit schools (65 percent) than at public schools (37 percent). There were no statistically significant differences in the likelihood of borrowing among the three racial groups at two-year for-profit schools, while white students were the most likely to borrow and Latino students were least likely to borrow at two-year public schools (see fig. 1).



Latino and white students were significantly more likely to borrow at four-year for-profit colleges than at public or nonprofit schools. Overall, there was no statistically significant difference in the likelihood of borrowing between students at four-year for-profit and public schools, all else being equal. However, differences did appear when examining the likelihood of borrowing among different racial groups. Holding all other variables constant, Latino four-year college students were 37 percent more likely to borrow at for-profit schools (81 percent) than public schools (59 percent), and 25 percent more likely to borrow at for-profit schools than at nonprofit schools (65 percent). White four-year college students at for-profit schools were 20 percent more likely to borrow at for-profit colleges (78 percent) than at public colleges (59 percent), and 18 percent more likely to borrow at for-profit colleges than at nonprofit colleges (66 percent). There was no statistically significant difference in the likelihood of borrowing for African-American students at for-profit, public, or nonprofit schools. At public and nonprofit four-year schools, African American students were mostly likely to borrow and Latino students were least likely to borrow (see fig. 2).



Students who took out debt borrowed over \$1,300 more on average during the 2011-2012 school year at two-year for-profit colleges. Holding student and financial characteristics constant, students at two-year for-profit colleges who took out debt borrowed an average of \$1,306 more than students at two-year public colleges. Latino and white two-year college students who took out debt borrowed significantly more at for-profit colleges than at public colleges. Latino students borrowed 34 percent, or \$1,580, more on average at for-profit colleges (\$6,282) than at public colleges (\$4,702). White students borrowed 14 percent, or \$707, more on average at for-profit colleges (\$5,802) than at public colleges (\$5,095). There was no statistically significant difference in the amount borrowed for African American students at for-profit and public colleges, nor among the three racial groups at for-profit schools and public schools (see fig. 3).



There were few significant differences in predicted amount borrowed among students who borrow at four-year colleges. Overall, the regression model produced no significant differences in the predicted amount borrowed between for-profit and public four-year colleges. African American four-year college students who took on debt borrowed 12 percent, or \$951, less at for-profit colleges (\$6,846) than at public colleges (\$7,797), and there was no statistically significant difference between the amount borrowed at for-profit and nonprofit schools. White four-year college students who took on debt borrowed 7 percent, or \$526, less at for-profit schools (\$6,940) than at public schools (\$7,466), and 6 percent, or \$430, less at for-profit schools than at nonprofit schools (\$7,370). There were no statistically significant differences in the predicted amount borrowed for Latino four-year college students at for-profit, public, or nonprofit schools, nor among the three racial groups at for-profit or nonprofit schools. African American four-year college students borrowed the most (\$7,797) and Latinos borrowed the least (\$7,203) at public schools (fig. 4).

Results of regression model: summary of student characteristics impacts							
	Two-year colleges		Four-year colleges				
Student characteristics	Impact on likelihood of borrowing	Impact on amount borrowed	Impact on likelihood of borrowing	Impact on amount borrowed			
Years of age	0	+	+	+			
Student marital status							
Married	-	0	-	0			
Separated	0	0	0	0			
Parental education							
Do not know	0	-	-	0			
Did not complete HS	-	0	0	-			
Vocational/tech training	0	0	0	0			
Associate's degree	0	+	-	0			
Some college	0	0	-	0			
Bachelor's degree	-	0	-	0			
Master's degree	-	0	-	0			
Doctoral degree research	-	0	-	0			
Doctoral degree professional	-	0	-	0			
Student financial resources							
Tuition, fees, and non-tuition expenses	+	+	+	+			
EFC	-	+	-	0			
Independent	+	+	-	+			
Total grants	+	0	0	-			
Parental help	0	0	-	-			
Student employment							
Part time	0	0	+	+			
Full time	0	0	0	0			

Note: + indicates an increase in likelihood of borrowing and amount borrowed, - indicates a decrease in likelihood of borrowing and amount borrowed, and 0 indicates no statistically significant impact

#### Effects of other variables: Financial resources

Students' financial resources had a significant impact on the likelihood of borrowing and the amount borrowed. The student's total budget—that is, tuition, fees, and non-tuition expenses—should be expected to play a large role in determining whether or how much a student borrows. Indeed, total student budget had a positive and significant association with the decision to borrow at both two-and four-year colleges. At the mean student budget of \$14,305 for two-year schools and \$25,631 at four-year schools, the total budget is associated with an increase in the likelihood of borrowing of 15 percentage points at two-year schools and 20 percentage points at four-year schools, holding other variables constant. For students who borrow, a dollar increase in the total budget is associated with an increase in total debt of 15 cents at two-year colleges and 19 cents at four-year colleges, all other factors being equal.

The expected family contribution (EFC), which is calculated when students apply for federal aid, had a significant effect on the decision to borrow for all students and on the amount borrowed for students at two-year colleges. At the mean EFC of \$5,217 at two-year colleges and \$10,675 at four-year colleges, the EFC is associated with a decrease in the likelihood of borrowing of three percentage points for students at two-year schools and 12 percentage points for students at four-year schools, all else being equal. For two-year students who borrow, every dollar increase in the EFC is associated with an increase of total debt of two cents, holding other variables constant. The ambiguous effects of the EFC on the likelihood of borrowing and amount borrowed could be due to the fact that it represents both the family's resources and the amount of need-based aid offered to the student. Because the EFC is an indicator of the amount of resources a family could dedicate toward college expenses, a higher EFC would imply more resources and, therefore, a smaller need to borrow. However, the EFC is also used to determine eligibility for financial aid, and students whose families are expected to contribute more generally receive less aid. If families do not contribute their full EFC, students may need to borrow to make up the gap between aid and expenses.

Being independent of one's parents had a statistically significant impact on the decision to borrow and amount borrowed at both two- and four-year colleges. Being independent is associated with an increase in the likelihood of borrowing of 4 percentage points for students at two-year colleges and a decrease in the likelihood of borrowing of 7 percentage points for students at four-year colleges. Independent students who took on debt borrowed \$897 more on average at two-year colleges and \$1,416 more on average at four-year colleges. This ambiguous impact of being independent could reflect the different financial circumstances of independent students at two- and four-year colleges. Independent students at two-year schools may have lower incomes or fewer financial resources to contribute to their education than independent students at four-year schools, which is consistent with the perception that two-year colleges tend to serve a generally lower-income student body than four-year colleges. The lack of resources available to independent two-year college students may force them to borrow more than their four-year counterparts.

Total grants, including Pell, state, and institutional grants, were associated with a statistically significant increase in the likelihood of borrowing for students who borrow at two-year colleges and a decrease in the amount borrowed for four-year students. At the mean level of total grants, the total grant amount results in an increase in the likelihood of borrowing of three percentage points for two-year students who borrow, all else being equal. For four-year college students who borrow, each dollar increase in total grants is associated with a decrease of 14 cents in the amount borrowed. Because the total grant amount contains both need- and merit-based grants, this ambiguous impact on debt indicator variables is not surprising. It may be that two-year college students receive more need-based grants, which indicate that they have fewer resources with which to pay for college costs and, therefore, would have a greater need to borrow

money in order to attend. Conversely, four-year college students may come from backgrounds that would allow them to finance college without borrowing if they receive grants, or they may be more likely to receive non-grant financial aid, such as work-study or assistantships, than students at two-year colleges.

The amount of parental financial help received had a statistically significant negative impact on the likelihood of borrowing and amount borrowed only for students at four-year colleges. At the mean level of parental help (\$4,773 at four-year schools), parental help is associated with a decrease in the likelihood of borrowing of four percentage points. For four-year students who borrow, each dollar increase in parental help is associated with a decrease in the amount borrowed of nine cents. The lack of a statistically significant impact for the parental help variable for students at two-year colleges may be because the variable is provided only for dependent students, and a much higher percentage of students at two-year colleges are independent than students at four-year colleges.

For students at four-year colleges, working part-time was associated with an increase in the likelihood of borrowing of four percentage points and an increase in the amount borrowed of \$365. Working full time did not have a statistically significant impact on the likelihood of borrowing or the amount of debt taken on for any group. While working part-time might be expected to reduce the need to borrow because working students have additional income to pay for college, students who work may need to because they have fewer resources to pay for college without borrowing than students who do not need to work.

#### Effects of other variables: Student characteristics

The age of the student was associated with an increase in the likelihood of borrowing for four-year college students and an increase in the amount borrowed for all students. At the mean student age, an increase in one year of age was associated with an increase in the likelihood of borrowing for four-year college students of seven percentage points, holding other variables constant. Each year increase in age was associated with an increase in amount borrowed of \$28 for two-year students who borrow and \$46 for four-year students who borrow.

The highest level of education reached by parents had a bigger impact on the likelihood of borrowing for four-year college students than for two-year college students. The level of higher education achieved by parents had few impacts on the amount borrowed for either population. For two-year college students, students with parents who received a bachelor's degree or above were three to 15 percentage points less likely to borrow than students whose parents have only a high school diploma. For four-year college students, students whose parents received an associate's degree or above were three to 26 percentage points less likely to borrow than students with parents who only graduated from high school. Having parents who had some post-secondary education might reduce the likelihood of borrowing because those parents could be more familiar with the financial aid process and therefore more adept at finding alternatives to borrowing. In addition, students with parents who had attended college might receive more generous financial aid packages from schools where their parents are alumni. Although having more highly-educated parents is likely to mean higher household income and greater net worth, that effect is likely controlled for by inclusion of the expected family contribution variable in the model.

Being married had a statistically significant impact on total amount of loans for students who borrowed at four-year colleges and for full-time students at two-year colleges, but not for part-time students at two-year colleges. At four-year colleges, being married reduced debt by about \$700 for full-time students and \$800 for half-time students, while the total amount of loans decreased by \$400 for married two-year college students attending half-time.

#### **Discussion and Conclusion**

Even controlling for student-level characteristics and financial variables such as the cost of college that contribute significantly to student debt burdens, most students at for-profit colleges are more likely to borrow and to borrow more than students at public and nonprofit colleges. In particular, Latino students at for-profit colleges were consistently worse off financially than Latino students at other schools. Latino students at either two-year or four-year for-profit schools were more likely to borrow, and they borrowed significantly more at two-year colleges than Latino students at public or nonprofit colleges. Further research will be needed to determine why students at for-profit colleges are taking on higher levels of debt that are not attributable to factors commonly cited to justify the high debt levels of students at for-profit colleges, such as higher tuition or the students' financial stability and resources.

One possible explanation is that the business models of for-profit schools are dependent on students financing their educations with loans. For example, financial aid staff may encourage students to take out federal loans to maintain the school's revenue stream and institutional loans to generate profits for the schools. Some for-profit schools may have financial incentives in place to favor student loans as a method of payment over other types of payment. Some for-profit schools that primarily serve Latino populations could be more likely to encourage students to take out loans than schools serving other populations. Alternatively, perhaps Latino students with limited English proficiency at for-profit schools rely more heavily on the recommendations of financial aid staff when deciding how to pay for their education than other students, and those staff members may promote loans because that is the payment method with which they are most familiar.

Future research could also examine whether the disparities in likelihood of borrowing and amount borrowed, controlling for other factors, persists depending on the types of loans students take out at different types of institutions. Not all student loans pose equal risks to consumers. Federal loans have fixed interest rates, while private student loans have variable interest rates that can get quite high, and private loans may lack the repayment protections available to students using federal loans. The concerns about higher likelihood of borrowing and debt loads for students at for-profit colleges could be compounded if it turns out that those students are disproportionately likely to finance their educations through variable rate private or institutional loans lacking repayment protections.

The higher levels of debt incurred at for-profit colleges are of particular concern given the poor educational outcomes associated with these schools. The relatively high amounts of debt students incur at for-profit colleges run the risk of harming students' financial well-being rather than expanding their earning capacity by building human capital. Students from for-profit colleges are more likely to default on their loans and, even if students do not default, their disposable income and opportunities to build wealth may be severely limited by debt payments.

Based on these findings, we recommend:

The Department of Education should strongly enforce the gainful employment rule to limit federal loans and aid to poorly performing colleges. The Department of Education recently finalized a regulation that limits federal loans and aid to for-profit colleges that fail to adequately prepare their students for gainful employment. The regulation was weakened during the rulemaking process due to a vigorous lobbying campaign from the for-profit college industry. Given the higher amount of debt and poor educational outcomes that students receive at for-profit schools, the Department should vigorously enforce the gainful employment rule and re-examine whether the rule needs to be

strengthened if the goal of limiting the amount of taxpayer subsidy to poorly-performing for-profit colleges is not achieved.

The Department of Education should discharge the federal student debt of for-profit students harmed by deceptive college practices. The Department of Education has the authority to discharge the federal student debt of students who attended colleges whose misdeeds prompted state enforcement action. Students whose colleges broke the law and provided them with subpar educations should not be saddled with debt that does not expand their opportunities or earnings potential. Along with Illinois Attorney General Lisa Madigan,<sup>36</sup> we urge the Department to discharge federal student debt for students of colleges that engaged in illegal behavior. In particular, the Department should discharge the debt of students at Corinthian Colleges (which operated six Everest College campuses in Illinois).

Regulators should continue to investigate and publicly report on the incentives and lending practices of for-profit colleges. This report's conclusion that the high amount of debt incurred by for-profit college students cannot be explained away by student demographics or financial characteristics reinforces the need for the Department of Justice, Consumer Financial Protection Bureau, and state Attorneys General to continue their investigations into the marketing and lending practices of for-profit colleges. These regulators can probe some of the questions raised, but not answered, by the data, such as how the financial incentives and training practices of for-profit colleges could influence how many loans students borrow.

The Consumer Financial Protection Bureau should enact student loan servicing standards that encourage affordable repayment options. The CFPB recently implemented mortgage servicing standards that improve the lines of communication between servicers and borrowers, ensure that borrowers have affordable repayment options, and provide protections for borrowers when servicers do not follow the standards. These standards could inform student loan servicing standards. In particular, relevant provisions should include: requirements for a single point of contact for borrower communications in order to minimize confusion and errors; an appeal and complaint process with timely responses from the servicers; timeliness in decisions made for loss mitigation measures; timely application of loan payments; transparency when the decision is made to deny a loan modification; early notification applications are reviewed; honoring of loan modification requests when the servicing rights on the loan are sold; and, adequate staffing levels to handle the volume of borrower complaints, as well as training requirements for staff.

<sup>36 &</sup>quot;Madigan to U.S. Dept. Of Education: Cancel Loans of Corinthian Students." Office of Illinois Attorney General Lisa Madigan. April 9, 2015.

# Appendix: Regression results

	Two-year colleges			Four-year colleges			
	Probit	Marginal effects	OLS	Probit	Marginal effects	OLS	
	B/SE	dy/dx / SE	B / SE	B/SE	dy/dx / SE	B/SE	
Institution and student characteristics		0.00444	707 00th	0.0444	0.40444	505 00tt	
For-profit	.72***	0.22***	707.28**	.39***	0.13***	-525.96**	
Nonprofit	0.07 0.31	0.02 0.09	216.16 766.74	0.06 0.03	0.02 0.01	172.19 -95.82	
Nonprofit	0.31	0.09	418.43	0.03	0.01	-95.82 192.50	
For-profit x African American	0.25	0.07	-272.75	38***	-0.13***	-424.43	
1 of-profit x Afficant Afficiati	0.13	0.04	280.16	0.08	0.03	262.20	
For-profit x Latino	.60***	0.18***	872.10*	.26*	0.09*	682.45*	
1 of-profit x Latino	0.16	0.05	362.03	0.11	0.04	316.64	
Nonprofit x African American	0.70	0.21	560.38	0.08	0.03	-374.71	
Tronpront X / unoan / unonoan	0.40	0.12	849.06	0.12	0.04	357.46	
Nonprofit x Latino	0.79	0.24	287.30	0.13	0.04	-313.54	
	0.41	0.13	654.87	0.12	0.04	368.02	
African American	15*	-0.05*	147.80	.44***	0.15***	330.61*	
	0.07	0.02	178.82	0.05	0.02	140.94	
Latino	49***	-0.15***	-392.72	17**	-0.06**	-262.93	
	0.07	0.02	227.62	0.06	0.02	152.68	
Years of Age	0.00	0.00	28.43***	.01**	2.87E-03**	45.71***	
	0.00	0.00	8.35	0.00	0.00	7.79	
Student Marital Status (omitted: single)							
Married	23***	-0.07***	74.95	17**	-0.06**	-429.05	
	0.06	0.02	207.95	0.06	0.02	230.79	
Separated	0.14	0.04	-204.48	0.10	0.03	-345.12	
	0.11	0.03	276.08	0.17	0.05	357.62	
Parents' level of education (omitted: high s							
Do not know	-0.12	-0.04	-476.53*	27*	-0.09*	-642.76	
	0.08	0.02	220.60	0.11	0.04	338.00	
Did not complete HS	19**	-0.06**	41.90	-0.15	-0.05	-622.59**	
	0.07	0.02	215.44	0.08	0.03	196.18	
Vocational/tech training	-0.10	-0.03	288.20	-0.08	-0.03	354.74	
A t - t	0.08	0.02	209.65	0.07	0.02	221.89	
Associate's degree	-0.08	-0.02	411.25*	12*	-0.04*	150.67	
Some college	0.08 -0.04	0.02 -0.01	206.95 268.52	0.06 10*	0.02 -0.03*	210.20 189.24	
Some college	0.05	0.02	146.80	0.04	0.03	179.03	
Bachelor's degree	10*	-0.03*	238.35	30***	-0.10***	-51.59	
bachelor's degree	0.05	0.02	202.18	0.04	0.01	143.83	
Master's degree	19*	-0.06*	218.10	39***	-0.13***	65.58	
Master's degree	0.08	0.02	236.75	0.05	0.02	173.95	
Doctoral degreeresearch	37***	-0.11***	389.80	69***	-0.24***	-601.59	
Bootoral augros Toodalon	0.10	0.03	364.49	0.07	0.03	314.36	
Doctoral degreeprofessional	50**	-0.15**	953.38	73***	-0.26***	-429.93	
2 cotoral acgree protectional	0.18	0.05	818.90	0.09	0.03	353.73	
Student financial resources							
Tuition, fees, and non-tuition expenses	3.54E-05***	1.07E-05***	.15***	2.32E-05***	7.76E-06***	.19***	
, ,	0.00	1.02E-06	0.01	1.76E-06	5.80E-07	0.01	
EFC	-5.82e-06**	-1.77E-06**	.02*	-1.08E-05***	-3.63E-06***	0.00	
	0.00	6.76E-07	0.01	8.22E-07	2.70E-07	0.00	
Independent	.13*	0.04*	896.79***	21***	-0.07***	1416.01***	
	0.05	0.02	150.31	0.06	0.02	155.36	
Total grants	4.24E-05***	1.29E-05***	0.06	-2.67E-06	-8.95E-07	14***	
	6.79E-06	1.94E-06	0.03	2.30E-06	7.70E-07	0.01	
Parental help	-6.98E-06	-2.12E-06	0.00	-2.45E-05***	-8.23E-06***	09***	
	4.31E-06	1.31E-06	0.01	1.92E-06	6.31E-07	0.01	
Student employment (omitted: No job)							
Part time	-0.02	-0.01	-176.34	.13***	0.04***	365.14**	
	0.04	0.01	133.50	0.03	0.01	109.77	
Full time	-0.05	-0.02	80.53	0.01	2.69E-03	75.75	
0	0.04	0.01	151.83	0.04	0.01	146.24	
Constant	-1.05***		1253.42***	0.01		2496.09***	
N	0.08		279.19	0.09		230.3305	
N Adj R^2	18,820		11,030 0.246	27,480		20,080	
			(1 //16			0.164	

Note: \*\*\* indicates significance at p < 0.001, \*\* indicates significance at p < 0.01, and \* indicates significance at p < 0.05. Sample sizes are rounded to the nearest ten. Green cells are statistically significant.