

# Data Sources: Graduate Student Loan Debt

More than four out of ten (44%) students at the master's level financed their education at least in part with loans in 2007-08, as did nearly one-third (32%) of doctoral students, but the prevalence of student loans was not equally distributed across demographic groups and fields (NCES, 2009). This article will examine graduate student loan debt by gender, race/ethnicity, and field, using data from the National Postsecondary Student Aid Study (NPSAS), a sample survey conducted every three to four years by the National Center for Education Statistics.

## Graduate Student Loans by Gender and Race/Ethnicity

At both the master's and doctoral levels, women are more likely to have student loans than men. Nearly half of all female master's-level students (47%) had student loans in the 2007-08 academic year, compared with 38% of their male counterparts. At the doctoral level, more than one-third of women (37%) had student loans, compared with about one-quarter (27%) of men.

African Americans are more likely than graduate students of other races/ethnicities to have student loans. At the master's level, 68% of African Americans had student loans in 2007-08, compared with 58% of Hispanics, 41% of Whites, and 35% of Asians (Table 1). At the doctoral level, 62% of African Americans had student loans, compared with 41% of Hispanics,

38% of Whites, and 19% of Asians. Data for Native Americans and Native Hawaiians/Other Pacific Islanders were suppressed at both levels due to small sample sizes.

Women of all racial/ethnic groups were more likely to have student loans in 2007-08 than their male counterparts with one exception: at the master's level, 34% of Asian women had student loans, compared with 36% of Asian men. In contrast, 71% of African American women had student loans at the master's level, compared with 61% of African American men (Table 1).

Overall, master's-level students who had loans in 2007-08 borrowed \$15,644 on average for that academic year, and doctoral students who had loans borrowed \$20,297 on average. By gender, there was very little difference between the amount women borrowed and the amount men borrowed. At the master's level, men with loans borrowed \$15,618 on average, and women with loans borrowed \$15,657 on average. Similarly, at the doctoral level, men with loans borrowed \$20,017 on average, and women with loans borrowed \$20,498 on average.

By race/ethnicity, student loan amounts varied considerably. Asians were less likely than students of other races/ethnicities to have student loans at the master's

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level, but those who did take out loans borrowed more on average. Among Asians with loans at the master's level in 2007-08, the average amount borrowed was \$17,781. In comparison, Hispanics with loans borrowed \$16,742 on average, African Americans with loans borrowed \$16,237 on average, and Whites with loans borrowed \$15,112 on average.

At the doctoral level, Asians once again borrowed more on average than students of other races/ethnicities. Among Asians with student loans at the doctoral level in 2007-08, the average amount borrowed was \$22,337, compared with \$22,281 for African Americans, \$21,954 for Hispanics, and \$19,457 for Whites.

### Graduate Student Loans by Field

The percentage of graduate students with loans varies considerably by field. At the master's level, students in architecture (74%) were most likely to have student loans in 2007-08 (Table 2), followed by students in psychology (69%) and communication and journalism (56%). Students in engineering (14%) were least likely to have loans at the master's level, followed by those in computer and information sciences, foreign languages and literatures, and physical sciences (all 25%). At the doctoral level, nearly two-thirds (63%) of all students in psychology had loans. Doctoral students in health-related professions were also likely to have loans (55%). In contrast, just 8% of doctoral students in both economics and engineering had student loans.

The average amount of money borrowed also varies by field. Unfortunately, the NPSAS dataset suppresses the average loan amount in many fields due to small sample sizes, but data are available for some fields. In 2007-08, master's-level students in architecture and psychology were not only the most likely to borrow, but those who did so also borrowed large amounts on average: \$23,284 in architecture and \$18,138 in psychology. Master's-level students in visual and performing arts (\$20,844) and health professions (\$18,672) who borrowed also had large loans on average. In contrast, master's-level students in education who borrowed had loans of \$13,168 on average for 2007-08, and students in English language and literature who borrowed had loans of \$13,678 on average. At the doctoral level, among students with loans, those in health professions (\$25,369) and psychology (\$22,777) had large loans on

average, while those in engineering (\$10,818) and physical sciences (\$11,159) typically borrowed less money.

By broad field, master's-level students with loans borrowed the most on average in health (\$18,672), followed by social and behavioral sciences (\$17,722), humanities (\$16,862), business (\$15,601), life sciences (\$14,980), physical sciences and engineering (\$14,866), and education (\$13,168). Doctoral students with loans borrowed the most on average in health (\$25,369), followed by social and behavioral sciences (\$21,291), physical sciences and engineering (\$19,952), business (\$19,065), education (\$17,192), humanities (\$16,641), and life sciences (\$15,749).

### Implications

Some of the differences between the racial/ethnic groups in the percentages of students borrowing and the average amount borrowed can be explained by field of study. As seen above, students in the physical sciences and engineering are less likely to have loans than those in education and business. However, underrepresented minorities are less likely to be in the physical sciences and engineering than their White and Asian peers. For example, in fall 2008, African Americans comprised 6% of the U.S. citizens and permanent residents enrolled in engineering at the graduate level, compared with 18% of those in business (Bell, 2009). In contrast, Asians, who are least likely to take out student loans, comprised 15% of the U.S. citizens and permanent residents in engineering versus 10% of those

in business.

Women are also less likely to be enrolled in the physical sciences and engineering than men, and this contributes to the higher prevalence of student loans among women than men. For example, in fall 2008, women accounted for 22% of the graduate students in engineering versus 75% of those in education. The differences in borrowing by gender are further amplified within underrepresented minority groups where women comprise a larger

percentage of the graduate students. Among African American graduate students in fall 2008, 73% were women, while only 61% of White graduate students were women (Bell, 2009).

While some of the differences between demographic groups can be explained by their distribution across fields of study, this does not diminish the debt

**Table 1.** Percentage of Graduate Students with Loans by Level, Gender, and Race Ethnicity, 2007-08

	Level	
	Master's	Doctoral
<b>Asian</b>		
Total	35%	19%
Male	36%	13%
Female	34%	25%
<b>Black/African American</b>		
Total	68%	62%
Male	61%	56%
Female	71%	66%
<b>Hispanic/Latino</b>		
Total	58%	41%
Male	54%	34%
Female	61%	48%
<b>White</b>		
Total	41%	38%
Male	37%	36%
Female	44%	38%

Notes: Includes U.S. citizens and permanent residents only. Data for American Indians/Alaska Natives and Native Hawaiians/Other Pacific Islanders were suppressed due to small sample sizes.

Source: National Center for Education Statistics, 2007-08 National Postsecondary Student Aid Study (NPSAS:08)

**Table 2.** Percentage of Graduate Students with Loans by Level for Selected Fields, 2007-08

	Level	
	Master's	Doctoral
Anthropology	S	31%
Architecture	74%	S
Biological/Biomedical Sci.	34%	14%
Business	45%	43%
Communication/Journalism	56%	S
Computer/Information Sci.	25%	44%
Economics	S	8%
Education	44%	39%
Engineering	14%	8%
English Language/Lit.	51%	34%
Foreign Languages/Lit.	25%	16%
Health Professions	52%	55%
History	28%	25%
Interdisciplinary Studies	31%	14%
Library Science	35%	S
Mathematics/Statistics	29%	17%
Philosophy/Religion	36%	24%
Physical Sciences	25%	12%
Political Science	S	30%
Psychology	69%	63%
Public Admin./Social Svcs.	53%	27%
Sociology	S	33%
Visual/Performing Arts	40%	38%

S = Suppressed due to small sample size.

Source: National Center for Education Statistics, 2007-08 National Postsecondary Student Aid Study (NPSAS:08)

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burden that women and minorities, particularly African Americans, accrue in the course of their education. Among master's-level students in 2007-08 who had taken out graduate student loans at some point, African Americans had the highest average cumulative graduate loan debt (\$30,947), compared with \$28,942 for Hispanics, \$25,798 for Whites, and \$24,651 for Asians. Similarly, at the doctoral level, African Americans in 2007-08 had already accrued \$56,492 in graduate student loan debt on average, compared with \$55,492 for Hispanics, \$47,476 for Whites, and \$43,261 for Asians (NCES, 2009). While student loans provide many students with the financial means to complete graduate school, the debts incurred by these students will substantially impact their personal finances as they leave graduate school and enter the workforce.

*By Nathan E. Bell, Director, Research and Policy Analysis*

### *References:*

Bell, N. 2009. *Graduate Enrollment and Degrees: 1998 to 2008*. Washington, DC: Council of Graduate Schools.

National Center for Education Statistics (NCES). 2009. 2007-08 National Postsecondary Student Aid Study (NPSAS:08). Dataset.



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