

Accessibility to the PhD and Professoriate for First-Generation College Graduates: Review and Implications for Students, Faculty, and Campus Policies

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Introduction

Diversity on campus has become commonly accepted as a public good—and goal—partly because it measures an institution’s accessibility to a diverse public. Moving from principle to policy, however, there tends to be significantly less agreement about the specific means to open postsecondary education across society. Primarily, “campus diversity” discussions and actions have focused on the gender, ethnicity, and national origin of undergraduate students and, to a lesser extent, faculty and staff. Conflicts concerning how diversity should be achieved according to these measures have been disputed in recent years in courts, newspapers, and campus planning committees.

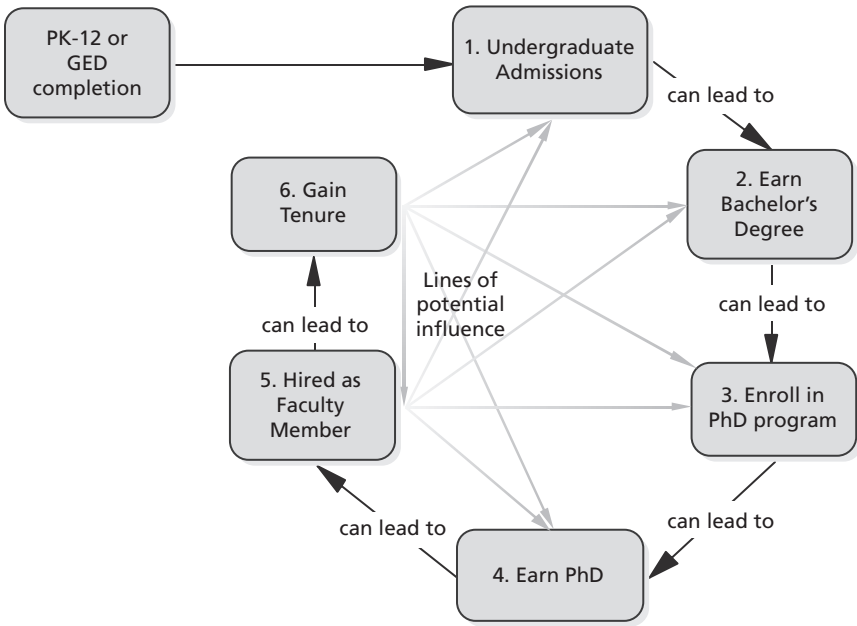
Increasingly, albeit with less attention and controversy, there are policymakers, university administrators, and researchers who are recognizing “first-generation college students”¹ as an important group that has been under-served by higher education. Readers who are unfamiliar with the experiences of first-generation college students are likely to be struck by similarities with accounts of other minority groups. For example, compared to undergraduates with parents who earned baccalaureate degrees, first-generation college students tend to be relatively disadvantaged across myriad variables. Among specific measures, they tend to lack family support for the college search and application process,² are less likely to attend selective colleges,³ feel that they need to work harder than their peers,⁴ have difficulty choosing majors,⁵ feel like they do not “belong” on campus,⁶ are more likely to have breaks in their pursuit of college degrees,⁷ and are less likely to graduate⁸ independent of their ethnic background, gender, and family income.⁹

For those first-generation college students who do earn bachelor's degrees, disproportionately few attend and complete professional or graduate degree programs. As Choy reports on the basis of national surveys conducted in the 1990s, while 34.2 percent of college graduates with one or two parents who graduated from college enrolled in graduate programs, only 24.6 percent of graduates whose parents' formal education ended with one or two high school diplomas did likewise.¹⁰ In light of this statistic about graduate enrollment, it is not surprising that the most recent national *Survey of Earned Doctorates* to consider this subject reports that "first-generation college graduates are under-represented" minorities among doctoral recipients.¹¹

There are several reasons why it is important to better understand the experiences of first-generation college students and graduates. First, there is evidence that suggests, at least, that opportunity or access to the PhD depends upon the formal education of one's parents and is not equal. Second, if we agree that diverse student bodies are best served by diverse faculties, it is important for the benefit of students to better understand why equal opportunity to the PhD is lacking. And third, a better understanding of how a diverse faculty and academic staff promotes equality of educational opportunity has value for building popular support for postsecondary education and broader accessibility.

In this article, I will review illustrative samplings of qualitative and quantitative research concerning the experiences of first-generation college students¹² from the stage of undergraduate admissions through doctoral completion and achievement of tenure. My review will discuss each of the stages identified in Figure 1 before reviewing policies that have been proposed to facilitate better representation of first-generation students and graduates in myriad campus roles (e.g., faculty). Since this subject has broad importance for the health of college and university communities and is not about the linear development of individual careers, Figure 1 is cyclical rather than a linear "pipeline." As indicated by the dashed lines that originate with faculty members, the success of first-generation college students who enter the professoriate can contribute to the success of accessibility initiatives for successive generations of students.

FIGURE 1: Accessibility Cycle for Various Steps in College and University Hierarchies



1. Undergraduate Admissions

Attempts to complete an undergraduate program anywhere in the United States entail a basic set of challenges requiring adjustments. First-generation college students, however, appear to experience a distinct set of additional challenges and barriers that stem from the fact that their families are less equipped to prepare them for working and living as college students. These claims are substantiated by original research drawing on quantitative¹³ and qualitative¹⁴ data. While it is outside the scope of this article to catalog the nature of their common experiences before entering college, there is strong evidence that students whose parents did not earn college degrees step onto an uneven playing field if and when they start thinking about going to college. As a group, first-generation college students tend to be less familiar with, prepared for, and assured about life on campus.

To start with the most basic question of enrollment as a college student, individuals whose parents did not earn college degrees are significantly less likely

themselves to attend college. According to a national survey of 1992 high school seniors, while 28 percent did not have a parent with a college degree, only 22 percent became first-generation college students within eight years of being twelfth graders.¹⁵ If one projects these percentages onto the approximately 3 million students who graduate from high school each year in the United States,¹⁶ then approximately 180,000 more students each year would be applying to college if high school graduates attended college independently of whether their parents earned bachelor's degrees.

For those individuals who do apply to become first-generation college students, Pascarella et al. draw on a national longitudinal survey and report findings that “suggest that the level of parental postsecondary education has a significant unique influence on the academic selectivity of the institution a student attends...”¹⁷ Moreover, Pascarella et al. find that the lower likelihood of attending selective campuses persists for first-generation college students independently of high school grades and parental income. They emphasize, “if one had a large group of high-school graduates who were identical ... in their race/ethnicity and parents' economic circumstances; their reading, critical thinking, and math skills; and their academic motivation—despite all these similarities, the students in that group whose parents had never been to college would be more likely to attend less selective institutions than their peers whose parents both held a bachelor's degree or higher.”¹⁸ Pascarella et al. speculate that this disparity cascades into other outcomes where first-generation college students appear disadvantaged.

2. Earn Bachelor's Degree

Once they get onto campus, first-generation college students are more likely to attend school part-time and intermittently, tend to have lower grade point averages, require more time to select a major field of study, and most need one or more remedial education course(s).¹⁹ First-generation college students also appear significantly less prepared than other students to self-regulate their work, a finding that bodes poorly for the prospect of online learning that champions hail as more openly and evenly accessible.²⁰ More generally, evidence from across the United States indicates clearly that “first-generation students were less likely than students with college-educated parents to earn a bachelor's degree even after taking into account many related factors, including students' demographic backgrounds, academic preparation, enrollment characteristics, credit production, and performance.”²¹

While policy-oriented research has tended to rely upon aggregate, descriptive statistics, researchers from the social sciences and humanities have presented qualitative data that humanize the subjects and offer broader analysis. Indicative of the disconnect that usually exists between the quantitative and qualitative studies, the latter group typically does not feature or use the category “first-generation college student”; instead, qualitative researchers often contextualize their discussions in terms of class and its attendant sociocultural differences. In *Limbo: Blue-collar Roots, White-collar Dreams*, Lubrano relies on the label of “straddler” to describe first-generation college students and graduates. More commonly, researchers from the social sciences and humanities have written about the experience of “crossing over” from the “working class” to the “professional” or “middle” class. While this terminology is inconsistently applied and warrants more precision,²² the general finding is that there do exist important sociocultural differences between families with and without college degrees.

Beyond citing easily observable metrics such as working while in school, underperforming on tests, and not graduating at as high a rate, this second group of researchers describes dynamics that emerge from cultural conflict. For example, they write that students who are first-generation college students tend to carry different values, vocabulary, and knowledge than others. These differences lead to daily dilemmas where first-generation students regularly report feeling that they are “imposters” when they are on campus and strangers when they are at home, where they may sense confusion and resentment from family members and neighborhood friends.

In his journalistic review that draws on interviews with 100 “straddlers,” Lubrano paints pictures of people negotiating their “blue-collar” heritage in environments dominated by subjects and agents of the “middle class.” While Lubrano’s review is anecdotal, he does illustrate patterns found in more systematic research. Contrasted with middle-class students who tend to feel entitled to be on campus and do well in college, Lubrano finds that straddlers tend to be focused on making a living to support a family, are fearful of debt, lack calm tactfulness when presented with conflict, and tend to work during summers, vacations, and school years instead of attending camp and flying to spring break. More positively, Lubrano reports that straddlers tend to know the value of a hardy work ethic, have a relatively strong sense of family and place, and derive greater importance from the achievement of graduating from college.

The ambivalence of first-generation college students is shared—and partly created—by many of their parents. London, for example, describes a first-generation undergraduate whose father actively and regularly supported her applications to colleges across the country. When the student gained admission to a selective, faraway college, however, the father switched gears and told her, “You can’t go!” Against her father’s initial orders, the student eventually went to college and the father “presented her with a credit card to be used for emergency purposes, but especially if she wished to fly home.”²³ While the father and mother were proud of their daughter’s achievements, there continued to be pressure throughout the student’s collegiate career to return home.

Counseling psychologist Geraldine Piorkowski introduced the notion that first-generation college students tend to experience a survivor guilt when they make it to—and through—college.²⁴ Recounting cases where students consider their loved ones who did not attend college and ask themselves “Why should I succeed when they failed?”, she observes that “unless one is very comfortable with narcissistic strivings ‘to be special,’ survivor status tends to create conflict.”²⁵ For example, she notes that first-generation college students who work to improve their grammar are ridiculed and taunted by noncollegiate familiars with sayings like: “so you think you’re too good for us.”

Psychologist Barbara Jensen counsels and teaches first-generation college students to deal with the dissonance between their familiar roots and collegiate experiences. Rather than focusing on the individual at the expense of broader social analysis, Jensen concludes that “cultural difference and prejudice against working class culture combine to frustrate the ‘upwardly’ mobile student.”²⁶ With regard to home environments, she describes parents who view college as a wasteful indulgence partly out of fear that they might feel subordinate to their college-educated children. Contending that college education too often requires repudiation of one’s family ways when a first-generation student is on or near the campus, Jensen laments that “to succeed in higher education... you must ‘leave behind’ your ‘low class’ ways, your ‘bad’ English, your values of humility and inclusion ...[and] the people you love!”²⁷

While Jensen is firmly committed to the democratization of access to college and not interested in romanticizing “working-class” lives, she also is clear to resist the way in which some researchers frame the subject. Rather than simply

“seeing working class family life as something to ‘survive,’ or seeing working with one’s hands as inherently inferior;”²⁸ she reminds readers that some people might prefer environments where one’s value is not tied so closely to his or her achievements at work and instead “opt for a culture that emphasizes cooperation over competition.”²⁹ As part of her response to the tears, anger, and social isolation that Jensen encounters in first-generation students, she first recommends that people recognize the “dilemma as a clash of cultures rather than a battle of good and bad, better and worse, normal and abnormal.”³⁰ As a second, more difficult goal, Jensen advises “reconciliation” of an individual’s varied social environments.

Benmayer makes similar arguments when he observes that much of the rhetoric of upward mobility is “fundamentally assimilationist, assuming a linear trajectory ... [in which] students will experience a ‘molting process’ and painfully shed their old cultural skins as they gradually achieve social and economic mobility.”³¹ Benmayer draws on the experiences of the first-generation college students in his classrooms and reports that “they do not break off from their families and in many ways resist the ‘American dream’ of individual upward mobility...”³² While Benmayer’s findings demonstrate variation in the ways in which first-generation students respond to college, it is likely relevant to his report that his campus is exceptional in being “envisioned specifically to serve the historically underrepresented in higher education—low-income, working-class students from ethnic, racial, and im/migrant backgrounds.”³³ In this environment where their experiences are shared by a majority of the students, there is evidence that first-generation undergraduates are less likely to feel isolated or marginalized.

As reported by Orbe, in a study of students from across multiple and varied campuses, students vary in the degree to which their status as a first-generation college student is important or salient to them. Orbe finds that first-generation status is most salient in the lives of students on more selective campuses. He adds that “students who described their [first-generation college student] status as nonsalient were attending, or had attended, less prestigious campuses (e.g., a local two-year business college).” Independent of variation across campus environments, Orbe finds that “students of color, students from lower socioeconomic status, and nontraditional female students most often described a high saliency regarding their [first-generation college] status.”³⁴

While variation and complicating factors exist in each set of circumstances, it is clear from quantitative and qualitative data that first-generation college students face and feel a unique set of challenges. Life on campus is played on an uneven field, and life at home can become uncomfortably or intolerably uneven because of life on campus. Research into these processes is intended to give voice to multicultural dynamics that are often invisible.

3. Enroll in PhD program

Some researchers have argued that family educational background ceases to have significance when undergraduate students become college graduates.³⁵ One line of evidence that supports this position is the fact that first-generation and continuing-generation college graduates do appear to earn comparable salaries as reported approximately one year after completion of their degrees.³⁶ While it is a democratic ideal of education to level social inequalities and equalize opportunity, there exist myriad lines of evidence indicating that family educational background remains important beyond completion of the baccalaureate.

The experiences of first-generation college graduates in pursuit of the PhD offer an array of measures that demonstrate the importance of family background. For starters, disproportionately few first-generation college graduates enroll in doctoral programs. More specifically, while first-generation graduates are as likely as others to pursue MBAs, they are significantly less likely to enroll in doctoral programs.³⁷ As Choy reports, 4 percent of students whose parent(s) earned one or more bachelor's degrees enrolled in doctoral programs while 1 percent of students whose parents did not attend college gained admission and decided to pursue the PhD.³⁸

To complement a review of available numbers that describe accessibility to the PhD and to provide more insight concerning individual experiences, the primary sources for qualitative data are “self-report” or autobiographical accounts from contemporary faculty who were first-generation college graduates enrolled in doctoral programs. There are enough such articles to qualify them as a genre; indeed, several authors have compared “coming out” as a native of the “working class” among faculty to “coming out” as gay or lesbian. Edited volumes of essays include (1) *Reflections from the Wrong Side of the Tracks: Class, Identity, and the Working Class Experience in Academe*, (2) *Strangers in Paradise: Academics from the Working Class*, (3) *This Fine Place So Far From Home: Voices of Academics*

from the Working Class, (4) *Those Winter Sundays: Female Academics and their Working-Class Parents*, and (5) *Working-Class Women in the Academy: Laborers in the Knowledge Factory*.³⁹ Edited volumes of similar essays that focus more on the experience of teaching college students about “working class” lives include (1) *New Working-Class Studies*, (2) *Teaching Working Class*, (3) *What’s Class Got to Do With It: American Society in the Twenty-First Century*, and (4) *What We Hold in Common: An Introduction to Working-Class Studies*.⁴⁰

The patterns of experience reported in essays from first-generation graduates who have earned doctoral degrees are similar to those described in the previous section. Cultural conflicts do not disappear, and in some ways can heighten. Although these writers tend to focus on how their pasts influence their roles as teachers and advisors, they do share a record of their graduate school experiences.

Representative illustrations from *Working-Class Women in the Academy* help to demonstrate that it is often subtle and unspoken happenings that mark the cultural dissonance they encountered. Common themes from these reports focus on different kinds of cultural knowledge and values, a relative lack of time to participate more fully in graduate school, and awkwardness of informal social interactions. Annas, for example, writes that “because I had worked almost full time as a undergraduate, I had little social/intellectual life outside the classroom. As a graduate student, once I stopped working and started hanging out in the library cafeteria like everyone else, I found that I often didn’t know how to talk to people who had had Shakespeare or T. S. Eliot read to them when they were children, who spent their winter vacation in New York seeing the latest plays (I hadn’t even seen a play until I was twenty-two), and whose parents were paying for their education.”⁴¹ hooks, in her review, writes: “later in graduate school I found that classmates believed ‘lower-class’ people had no beliefs and values. I was silent in such discussions, disgusted by their ignorance.”⁴² And Smith recounts how when she has attended “college mixers, graduate school sherry hours, faculty receptions, [and] museum trustees’ dinners in honor of scholarly books to which [she has] contributed...,” she carefully checks the room “trying to spot my kind: *who’s here who wasn’t born knowing how to do this?*”⁴³

In a more recent article, sociologist Mary Kosut describes her account of her “blue-collar doctoral student” experiences as “autoethnographic” since she aims to write about her environments as more traditional ethnographers usually

write about others. Kosut focuses on cultural clashes that she primarily encountered in graduate school partly because she had not had any seminar courses as an undergraduate at public colleges. From her experiences in and around those graduate seminars, Kosut reinforces patterns described above when she concludes: “I did not communicate my thoughts in legitimate academic speak.... I had to alter not only what I said but just as important, how I said it.”⁴⁴

Kosut contends further that, “Much like the glass ceiling limits women from rising to upper-level positions in the labor force, a class ceiling exists within the upper levels of the academy impeding less privileged colleagues from achieving the same levels of success as their more privileged colleagues. The class ceiling is supported by everyday practices....”⁴⁵ While Kosut reviews subtle “everyday practices” such as snubs she received for mispronouncing the names of famous French authors, she also talks about differences in “temporal capital” that determine the extent to which graduate students can immerse themselves in their studies and related campus activities. Noting the possible consequences of the need to work while pursuing a degree, Kosut observes that “those that have significant amounts of temporal capital can ensure more face-to-face interaction with professors as they have the time and flexibility to wait outside professors’ offices during office hours. Temporal capital also allows students to attend scholarly presentations or seminars recommended by professors.”⁴⁶ As these kinds of activities “show you are a serious and committed student,” she concludes that “it is extremely difficult for blue-collar students to compete with students who do not have to work outside of the university.”⁴⁷

In addition to time and specific sets of cultural knowledge, individual attire is another domain of “everyday practices” where first-generation college graduates can be marginalized. For example, Kehoe recalls communication with a graduate student who reported “how she persisted in wearing the polyester slacks, teased hair, and jewelry favored by all her female relatives and old friends. She said that over and over, professors explained to her that she must dress middle class if she expected to be taken seriously as a graduate student.”⁴⁸ Kehoe concludes that “dress as sign and signal of social identity” should be an important part of diversity discussions and that prevailing norms on campus—for undergraduates and beyond—ask “working-class students” “to disrespect the tastes of their people.”

4. Earn PhD

Across disciplines, the most recent *Survey of Earned Doctorates* to consider the experiences of first-generation college graduates reports that 34.5 percent of U.S. citizens who earned doctorates in 2002 had parents who did not earn college degrees.⁴⁹ Hoffer et al. compare this figure to two measures of the population from which doctoral students originate. First, they acknowledge that 66 percent of the first-year student population at postsecondary institutions in 1990 were first-generation students—almost twice the percentage that earned doctorates. Second, 51 percent of those who earned undergraduate degrees in 1994 were first-generation students, which still indicates that disproportionately few first-generation graduates earn the PhD. From these comparisons, Hoffer et al. conclude: “first-generation college graduates are underrepresented in the most recent population of new doctorates relative to their representation in the college graduate population.”⁵⁰ It bears observation that the under-representation of first-generation students is compounded at multiple levels. It begins with disproportionately low college enrollment by high school seniors whose parents did not earn a college degree, is compounded by the disproportionately low number of first-generation college students who earn a baccalaureate degree, and compounded again by the disproportionately low number of first-generation college graduates who earn a doctoral degree.

In addition to being underrepresented among doctoral recipients, first-generation college graduates who earn the PhD are more likely to have debt of \$30,000 or more, less likely to have been funded through research grants or fellowships, and more likely to require longer tenures as doctoral students. Hoffer et al. report that first-generation graduates tend to take 8 years to earn a doctoral degree, compared with 7.3 years for graduates whose parents each had bachelor’s degrees.⁵¹

With respect to undergraduate alma maters, first-generation graduates with PhDs are approximately three times more likely to have attended community college than graduates whose parents each earned bachelor’s degrees (i.e., 14.9 percent vs. 5 percent, respectively). First-generation graduates who earn the PhD are also much more likely to have earned their undergraduate degrees at a comprehensive or regional institution than graduates whose parents each earned bachelor’s degrees (31.7 percent vs. 12.9 percent, respectively), and they are much less likely to have attended a liberal arts college (7.6 percent vs. 17.5 percent, respectively).⁵²

The large difference in the percentages of first-generation doctoral recipients from comprehensive institutions and liberal arts colleges warrants closer comparison. As reported in popular publications for college-bound students, liberal arts colleges have a general reputation for graduating disproportionately high rates of graduate students.⁵³ While this general reputation is largely justified,⁵⁴ Mullen et al. analyzed the national *Baccalaureate and Beyond Study* and found that “liberal arts graduates, once other factors [e.g., parental education] are controlled for, are not more likely to enter graduate programs than are their peers in comprehensive campuses.”⁵⁵ This finding suggests that the reputation of liberal arts colleges for producing disproportionate numbers of graduate students relies strongly on pre-existing inequalities between their students and those at comprehensive campuses.

Across time, the percentage of first-generation college graduates who earn the PhD has decreased significantly. Going back to 1977, 60 percent of doctorates were awarded to first-generation graduates and that percentage has steadily fallen through at least 2002. While “the decline is at least in part due to the general increase in college graduation in the parent population,”⁵⁶ there has not been systematic consideration of the trend’s causes and consequences. It is plausible, for example, that the decline has made doctoral training more difficult for first-generation graduates as their minority status increases.

In a separate survey of more than 9,000 doctoral students from 21 research universities, Nettles and Millett do not report the number of first-generation college students; however, they do find that significant percentages of doctoral students have at least one parent with a doctoral or professional degree (e.g., MD, PhD, JD).⁵⁷ Reporting their results across disciplines, they find that 34 percent of doctoral students in the humanities have at least one parent with an advanced degree while the percentages for students in science, engineering, and social science programs are, respectively, 27 percent, 24 percent, and 26 percent. In education programs, only 16 percent of students have at least one parent with an advanced degree. If one accepts master’s degrees as “advanced,” there is evidence suggesting that each of these reported percentages would increase by approximately 10 percent.⁵⁸ While these disciplinary differences are not the focus of Nettles and Millett’s article, they certainly raise questions for future research (e.g., will the humanities lose relatively more importance and popular relevance with less socioeconomic diversity among its doctoral students?).

5. Hired as Faculty Member

The question of what first-generation doctoral recipients do after completing graduate school inevitably requires acknowledgement that the academic labor market has changed significantly in recent decades, with increasing employment of part-time or adjunct staff.⁵⁹ To the extent that there are full-time, tenure-track positions that continue to open each year, it is relevant to consider whether first-generation college graduates have unique experiences applying for faculty positions.

Among the relatively few studies that have considered this question, Lipset and Ladd describe changes among the professoriate between the end of World War II and 1975, a three-decade period when government support for postsecondary education significantly increased access.⁶⁰ Despite the increase in student diversity during this period, however, Lipset and Ladd draw on a national survey and find that faculty hired during this period were increasingly from wealthier family backgrounds. Lipset and Ladd speculate that increases in the occupational prestige accorded to faculty positions over this period help explain this trend.

Examining faculty demographics in more detail, Lipset and Ladd report that family socioeconomic background (i.e., a set of variables that features parental education levels) correlates with the type of institution that employs faculty members and also with their research, publication, and teaching responsibilities. In particular, they report that “faculty offspring... are most likely to be found in the top schools.... [and] academics from working-class and farm backgrounds turn up most heavily in the lower-status colleges.”⁶¹ Lipset and Ladd also find that faculty from families with relatively less socioeconomic status have higher teaching loads and are less likely to receive research grants and publish original articles.⁶²

The extent to which Lipset and Ladd’s findings persist in today’s academic labor market is relatively understudied. For example, in the four National Studies of Postsecondary Faculty (NSoPF) commissioned by the U.S. Department of Education between 1987 and 2004, information about the parental education levels of faculty has been reported only twice (in 1993 and 1999) and the data have not been closely analyzed.

While it is outside the scope of this article to present an in-depth analysis of the NSoPF, a simple cross-tabulation, using the Department of Education’s Data

Analysis System that compares the parental education of faculty members with the type of institution where they work, replicates effects that are similar to those reported by Lipset and Ladd.⁶³ For example, the most glaring pattern illustrated in Table 1 shows that Research I and II institutions tend to disproportionately hire faculty with parents whose formal education includes advanced degrees. To lesser extents, Table 1 also indicates that Comprehensive I and II institutions tend to employ relatively high proportions of first-generation college graduates while Doctoral I and II and Liberal Arts I and II campuses tend to hire faculty with parents whose formal education includes advanced degrees.

Table 1: 1999 National Study of Postsecondary Faculty, Parental Education Levels and Institution Type (According to Carnegie 1994 Classification)

	Research I and II	Doctoral I and II	Comprehensive I and II	Liberal Arts I and II	Two-year	Other
Estimates	(percent)	(percent)	(percent)	(percent)	(percent)	(percent)
Total	24.58	9.01	19.97	9.64	29.17	7.63
Highest education level of father						
Less Than Associate's	21.54	8.62	20.69	9.69	32.76	6.69
Associate's or Bachelor's Degree	26.41	9.08	19.95	9.76	26.42	8.37
MA/MS PhD First-Prof	31.78	10.37	18.22	9.25	20.97	9.41
Highest education level of mother						
Less Than Associate's	22.91	8.44	20.74	9.25	31.53	7.13
Associate's or Bachelor's Degree	27.54	10.03	18.53	9.81	25.8	8.29
MA/MS PhD First-Prof	30.13	10.86	18.64	11.55	19.45	9.36

SOURCE: National Survey of Postsecondary Faculty, 1999. <http://nces.ed.gov/dasol/tables/index.asp>

While there are certainly first-generation college graduates teaching as faculty members at comprehensive and two-year campuses because that is their first preference, there are reasons to expect that the disproportionate pattern found in Table 1 is not completely an artifact of revealed preference. Instead, to identify two examples: comprehensive-campus professor Shott indicates a basic preference when he writes that he “would be happier at a research institution.”⁶⁴ Shott draws an analogy between (a) minor league baseball teams and non-research universities and (b) major league baseball teams and research universities to highlight his preference to play in “the big leagues” and his contention that competition among ballplayers is significantly more fair than contests among

researchers. Drawing on his study of American archaeologists, Shott finds that personal background traits (e.g., parental education levels) seem more reliable than scholarly quality in predicting where an academic will find work.⁶⁵ More personally, Peckham is clear to communicate dissatisfaction when he asserts that “some of us struggle through graduate school to become professors in third-rate universities... but [not many working-class graduates are hired in elite colleges or universities] for these positions are reserved by the elite for their children.”⁶⁶ Whether the popular explosion of college ranking guides in recent years has increased thoughts and feelings such as these is a good question for future analysis.

Independent of the individual preferences of faculty members to teach at various types of institutions, it is a common assumption of diversity initiatives that students benefit from role models with whom they have important traits in common. Writing about his own experiences as a first-generation college student, Martin specifies that he was stressed because he “did not have a role model for educated, working class manhood.”⁶⁷ Martin’s experiences suggest the importance of ensuring that future generations of students will be taught by a diverse faculty that is more representative of the general public. Accomplishing this goal, however, will require more investigation of the causes of disproportionate patterns in faculty employment and the possible solutions to the problem.

In a study conducted during the 1990s at a large, research-focused, public university (University of Illinois at Urbana-Champaign), Oldfield and Conant asked faculty members to identify their socioeconomic background and found results consistent with earlier studies. Among their results, they find that “over one-third of faculty parents had more than an undergraduate degree, while only about 10 percent of Americans had this much schooling.”⁶⁸ They also report that 51.6 percent of faculty had at least one parent with a bachelor’s degree, meaning that 48.4 percent of their cross-campus sample were first-generation college students. Because the percentage of first-generation college students that earn the PhD has swung from 60 percent in 1966 to 34.5 percent in 2002, however, this statistic means little without controlling for years since earning the PhD.

Beyond tracking institution-specific measures of whether faculty are first-generation college graduates, researchers should consider adapting methods that have long been employed in research on gender and ethnic diversity in

faculty hiring. These methods suggest useful strategies for testing the extent to which there is (or is not) equal access to the professoriate for first-generation college graduates that earn the PhD. For example, in their test of gender (in)equity in faculty hiring, Handelsman et al.⁶⁹ compare (1) the percentage of women in doctoral programs and (2) the percentage of women holding professorships at each rank in the natural and physical sciences at each field's "top 50" research departments. Handelsman et al. find significant and variably large "hiring gaps" between the percentage of women earning PhDs and the percentage serving as professors at each faculty rank. For future research, it would be reasonable to consider these same questions as they relate to first-generation college graduates who earn the PhD.

6. Gain Tenure

One significant step past hiring as a faculty member is the achievement of tenure. Tenure decisions are important to individuals because they can be high-stakes events that "make or break" academic careers. Independent of its relative assurance of indefinite employment, tenure provides valuable protections and privileges. Given that the subject of tenure achievement for all faculty has been relatively understudied,⁷⁰ it is not surprising that there is no systematic research on tenure rates for first-generation college graduates who earn the PhD. Studies considering tenure rates for male and female faculty members, however, have found significant differences,⁷¹ which suggest that other non-performance-related factors can regularly impact the tenure process. Moreover, the anecdotal evidence that does exist concerning first-generation students' tenure experiences is similar to the accounts of awkwardness and cultural "fitness" described in previous sections.

In one of his interviews with straddlers, for example, Lubrano describes how an assistant professor's anxiety based on his socioeconomic background emerged during his probationary period as a faculty member at a large Midwestern research university.⁷² First, at a campus reception early in his days on campus, the straddler's preference for beer—in a can—did not fit with the preference of most faculty who sipped their wine in tall glasses. Second, during an otherwise casual interaction where faculty at a table started recounting the professions of their grandparents, the first-generation college graduate matched others' tales of stockbrokers and diplomats with reports of his grandfathers who (a) worked as a brakeman for the railroad and (b) maintained vending machines after a farm

injury severed one hand—promptly causing the conversation to stop. In each of these interactions, cultural mis-fitting prompted the assistant professor to conclude that his chances for achieving tenure were nil.

Fortunately, the socioeconomic differences encountered by Lubrano’s interviewee did not cause a negative tenure vote.⁷³ The assistant professor’s experiences are instructive, however, because the anxiety that he felt was specific to his family’s socioeconomic background. It is also possible that this type of experience is common for first-generation students who become faculty members and that such experiences do carry adverse impact for others. These are among the questions that could be answered if institutions collected data on the parental education levels of faculty members.

Policies and Proposals for Equal Opportunity to the PhD and Professoriate
Problems of accessibility such as those described above in each section have prompted programs to pursue redress as well as questions for further debate. One program that spans the domains of undergraduate and graduate education is the federal government’s Ronald McNair Postbaccalaureate Achievement Program, which is intended “to increase the number of doctoral degrees earned by students from underrepresented populations.”⁷⁴ The McNair program, which started funding projects in 1989, provides eligible undergraduates at participating colleges and universities with services that include specialized mentoring, paid research internships, and an array of activities to facilitate participants’ enrollment in doctoral programs (e.g., waiving of fees for the GRE and admission applications). Eligibility requirements for the McNair program stipulate that “at least two-thirds of the participants served by each project must be low-income and first-generation. The remaining one-third may belong to certain groups that are underrepresented in graduate education, presently defined as African American, Hispanic or Latino, and American Indian/Alaska Native.”⁷⁵

The program has itself made important gains for its participants and helped to make graduate education more accessible. For example, “the percentage of [the program’s college] graduates entering graduate school increased each year from 13 percent in 1998-90 to 39 percent in 2000-01.”⁷⁶ The McNair program’s achievements help explain why it has expanded from 14 colleges and universities in 1989-90 to 156 institutions in 2001-02 and 178 campuses in 2005-06.⁷⁷

Beyond improving the prospects of admission to graduate programs for participants, one area in which the McNair program has struggled to make gains is persistence towards the PhD. A review of the program reports that “the 43 percent persistence rate after four years (compared with a 50 percent completion rate on average for all doctoral students) for McNair participants needs to be interpreted with the fact that McNair participants are likely to have less financial and social support throughout graduate school than are others who are not low-income and first-generation or underrepresented.”⁷⁸ This finding also needs to be interpreted in light of the meaning of “accessibility.”

Researchers considering access to bachelor’s degrees among first-generation college students observe that “‘Access to higher education’ must be understood to mean not only admission to some postsecondary institution, but also ‘access’ to the full range of college experiences and to the personal, social, and economic benefits to which those experiences and degree completion lead.”⁷⁹ The same position should reasonably apply to graduate education and post-doctoral or professorial opportunities.

Returning to the cycle illustrated in Figure 1, recommendations made for improving access to undergraduate programs apply equally well to other levels. Those recommendations include the facilitation of communication (e.g., by admissions offices) through direct conversations and written publications involving current first-generation students, prospective first-generation applicants, and alums who were first-generation students.⁸⁰ Tokarczyk recommends that the “transition-to-college” courses that many campuses offer as prerequisites include a component on class alongside their discussion of ethnic, gender, and religious differences.⁸¹ Each of these recommendations can be generalized to entail (a) the recognition of first-generation college students and graduates as an underrepresented community on campus and (b) a broadening of awareness about the conflicts faced by first-generation college students and graduates.

While the McNair program bridges undergraduate and graduate levels, advocates for broader accessibility to campus have tended to focus their attention on changes to undergraduate admissions and financial aid, including proposals for “class-based affirmative action.” In their review of the admissions processes at a sample of highly selective colleges and universities, Bowen et al. report that “the ‘adjusted admissions advantage’—the average boost in the odds of admission

provided to an applicant with certain characteristics relative to an otherwise identical application—is about 30 percentage points for a recruited athlete, 28 points for a member of an underrepresented [ethnic] minority group, and 20 points for a legacy” applicant who has either one or two parents who attended the institution.⁸² Bowen et al. are clear that they intend no adverse impact to existing affirmative action programs; rather they seek to better match the rhetoric of diversity with reality on campus. Namely, while a group of institutions including Princeton, Yale, Duke, and the University of Chicago have publicly stated that their “admissions officials give special attention to... those who would be the first in their families to attend any college,”⁸³ Bowen et al.’s analysis finds no evidence of such treatment. They consequently call for actions to facilitate the avowed special attention.

More controversially, some have advocated that first-generation college graduates be subject to one or more forms of affirmative action as doctoral-level researchers. The National Cancer Institute and other parts of the National Institutes of Health, for example, have added first-generation college graduates to the groups of individuals eligible for “minority” grant and fellowship programs.⁸⁴

Similarly, Oldfield and Conant argue that there should be “socioeconomic status affirmative action” in faculty hiring to address the disproportionate absence of first-generation college graduates among college and university faculty, particularly at research institutions.⁸⁵ Advocates of this position argue that the same benefits gained from gender and ethnic diversity would be gained from diversity according to some measure(s) of socioeconomic background (e.g., parental education). Advocates contend that these benefits include (a) service as role model and mentor for first-generation college undergraduates, (b) research and writing about experiences that are best known to people from “lower” socioeconomic backgrounds,⁸⁶ and (c) presence among other faculty and staff as a “reality check” for campuses that are often “sheltered from the [poor] side of our lopsided economy.”⁸⁷ Returning to the steps and dashed lines in Figure 1, it is also true that faculty have unique abilities to influence future provisions for undergraduate admission and mentoring of graduate students in ways that broaden access.

While proposals that directly affect hiring priorities are controversial, a larger community of authors appears to support tracking the socioeconomic backgrounds of faculty members alongside measures of ethnicity and gender. Casey,

for example, writes that the under-attendance to family backgrounds means that “faculty members who broke the class barrier are unlikely to see themselves as usefully ‘diverse,’ unless they also belong to other recognized minority groups. When such faculty are not identified as ‘different’ by themselves or by their institutions, they cannot possibly serve as a resource for students. On the contrary, they tend to blend into the overall academic culture, reinforcing for working-class students the notion that people like them are not supposed to be on campus, that they do not and cannot belong.”⁸⁸ Harrison echoes this sentiment when he reviews his experience on law school hiring committees and observes that “unfortunately, spotting people who are socially and economically disadvantaged is not always easy, especially if they have caught on to the fact that they should adopt the affectations of their privileged competitors.”⁸⁹

For any proposal to address accessibility for first-generation college students and graduates to college and university communities at any level, it is necessary to ask who can initiate or support change. When authors identified above lament the differential accessibility of postsecondary education for individuals on the basis of family educational backgrounds, several have identified the need for organized consciousness-raising.⁹⁰ Towards this end, campus unionists would seem most able to join efforts to broaden access.

Conclusions

The questions identified in this article focus on the ways that first-generation college applicants negotiate an array of roles from undergraduate to graduate student to faculty or academic professional. In order to address this broad mix of questions, research findings from multiple disciplines are integrated and synthesized just as quantitative and qualitative results are juxtaposed.

To review the sets of quantitative studies described above, the following patterns are clear. Disproportionately few high school seniors who do not have a parent with a college degree enroll as undergraduates. Disproportionately few college students who become first-generation college graduates enroll in doctoral programs. And disproportionately few first-generation college graduates who earn the PhD are employed as faculty members at national research universities. This cascade of disproportions would not exist if the formal education level of parents were unimportant; so, the patterns represent a set of problems requiring attention for those committed to the democratizing ideals of college and university education.

Lest anyone interpret the quantitative findings reviewed in this paper to indicate “revealed preferences” whereby first-generation college students either choose to take longer periods to complete their degree or choose more often than other students not to graduate, qualitative data indicate that such an interpretation would be inaccurate. While the ability to afford the direct costs of college and university education is certainly important, qualitative studies indicate a range of additional “class ceilings” that mark the experiences of first-generation students at numerous levels in the campus hierarchy. At least some of these ceilings (e.g., “slights”) can appear unimportant or overdrawn to some; however, they constitute conflicts that are avoidable and, often, sufficient disincentive to prompt people to redirect their energies off-campus.

Three sets of summaries that apply to the experiences of first-generation college students as undergraduates, doctoral students, and faculty members follow:

(1) Because “first-generation college students have been the focus of a growing body of research,”⁹¹ a great deal more is known about the unique nature of their experiences on campus as applicants and undergraduates. In sum, researchers have found that students whose parents did not earn at least one bachelor’s degree tend to be disadvantaged in the admissions process, underprepared once on campus, and less likely to graduate. On the basis of these findings, researchers and policy advisors have recommended the adoption of new policies intended to help make postsecondary education more accessible for first-generation college students.

(2) Beyond the undergraduate level, there has not been as much systematic research; however, it is clearly the case that first-generation college graduates are relatively more likely to not enroll in doctoral programs and are significantly underrepresented among those earning doctoral degrees. It is also clearly the case for many doctoral students, at least, that the sociocultural conflicts faced by first-generation college students do not disappear in graduate school. These problems form part of the reason why the federal government’s McNair program is finding a growing audience across the country. As the McNair program establishes a longer track record, it will be important to refine and strengthen it—as well as any similar programs that emerge.

(3) About those first-generation college graduates who earn the PhD, relatively little is known about their postdoctoral career paths. On the basis of several surveys and case studies, however, there is evidence suggesting that first-generation college graduates who earn the PhD have relatively less success in the academic labor market. If college and university committees and administrators were persuaded that it is important for faculty and academic professionals to have diverse socioeconomic backgrounds, there would appear to be relatively little cost to include measures of parental education levels within existing surveys of campus diversity. Given the research reviewed above, these statistics would allow more debate and discussion about the myriad impacts of individual socioeconomic backgrounds on campus.

While the scope of this article is limited to a cycle that starts with the college application process, it bears observation that the problems described herein stem from inequalities that begin at birth and influence students' educational opportunities in elementary and secondary schools.⁹² To the extent that colleges and universities can work to provide equal and fair opportunities to applicants whose parents did not earn bachelor's degrees, it is important that more be done. Support for equal opportunity, however, needs to extend both before and beyond undergraduate admissions. Benefits for the public good to be gained from this approach include the broader engagement of parts of society that are increasingly cynical about "the American Dream."

ENDNOTES

¹"First-generation college student" is most commonly defined to be an individual who does not have a parent with a bachelor's degree. While it is assumed for simplification's sake throughout this paper that a random individual has two parents, the definition accommodates multiple family models.

²Gibbons and Shoffner, "Prospective First-Generation College Students: Meeting their Needs through Social Cognitive Career Theory" (2004).

³Hoffer et al., *Doctorate Recipients from United States Universities: Summary Report 2002*, 37 (2003).

⁴Bui, "First-Generation College Students at a Four-Year University: Background Characteristics, Reasons for Pursuing Higher Education, and First-year Experiences" (2002).

⁵NCES, *First-Generation Students in Postsecondary Education: A look at their Transcripts* (2005).

⁶ Rodriguez, *Giants Among Us: First-Generation College Graduates who Lead Activist Lives* (2001).

⁷ Goldrick-Rab, "Following their Every Move: An Investigation of Social-class Differences in College Pathways" (2006).

⁸ Pike and Kuh, "First- and Second-Generation College Students: A Comparison of their Engagement and Intellectual Development" (2005).

⁹ NCES, *First-Generation Students in Postsecondary Education: A Look at their Transcripts* (2005).

¹⁰ Choy, *Debt Burden Four Years After College* (2000).

¹¹ Hoffer et al., *Doctorate Recipients from United States Universities: Summary Report 2002*, 36 (2003).

¹² E.g., Orbe, "Negotiating Multiple Identities Within Multiple Frames: An Analysis of First-generation College Students" (2004); Pascarella et al., "First-generation College Students: Additional Evidence on College Experiences and Outcomes" (2004).

¹³ E.g., NCES, *Bridging the Gap: Academic Preparation and Postsecondary Success of First-generation Students* (2001); NCES, *First-Generation Students in Postsecondary Education: A Look at their Transcripts* (2005).

¹⁴ Lubrano, *Limbo: Blue-collar Roots, White-collar Dreams* (2003); Rodriguez, *Giants Among Us: First-Generation College Graduates who Lead Activist Lives* (2001).

¹⁵ NCES, *First-Generation Students in Postsecondary Education: A Look at their Transcripts*, iii (2005).

¹⁶ NCES, *Digest of Educational Statistics Tables and Figures (2005)*, <http://nces.ed.gov/programs/digest/d05/tables/dt05_101.asp>.

¹⁷ Pascarella et al., "First-generation College Students: Additional Evidence on College Experiences and Outcomes" (2004).

¹⁸ *Ibid.*, 276.

¹⁹ NCES, *First-Generation Students in Postsecondary Education: A Look at their Transcripts* (2005).

²⁰ This effect is found independently of individual comfort with using computers, Williams and Hellman, "Differences in Self-Regulation For Online Learning Between First- and Second-Generation College Students," 76 (2004).

²¹ NCES, *First-Generation Students in Postsecondary Education: A Look at their Transcripts*, ix.

²² For discussions of varied definitions of "class" see Durrenberger and Erem, *Class Acts: An Anthropology of Service workers and their Union* (2005); Zweig, "Introduction: The Challenge of Working Class Studies" (2004).

- ²³ London, "Breaking Away: A Study of First-generation College Students and their Families," 151-152.
- ²⁴ Piorkowski, "Survivor Guilt in the University Setting" (1983).
- ²⁵ Ibid., 620.
- ²⁶ Jensen, "Across the Great Divide: Crossing Classes and Clashing Cultures," 177.
- ²⁷ Ibid., 178.
- ²⁸ Ibid., 176.
- ²⁹ Ibid., 181.
- ³⁰ Ibid., 182.
- ³¹ Benmayor, "Narrating Cultural Citizenship: Oral Histories of First-generation College Students of Mexican Origin," 109.
- ³² Ibid., 116.
- ³³ Ibid., 97.
- ³⁴ Orbe, "Negotiating Multiple Identities Within Multiple Frames: An Analysis of First-generation College Students," 140.
- ³⁵ Discussion of this subject is reviewed by Mullen et al., "Who Goes to Graduate School?" (2003).
- ³⁶ NCES, *First-Generation Students: Undergraduates Whose Parents Never Enrolled in Postsecondary Education* (1998).
- ³⁷ Christopher, "New Working Class Studies in Higher Education" (2005).
- ³⁸ Choy, *Students Whose Parents Did Not Go To College* (2001).
- ³⁹ Muzzatti and Samarco, eds., *Reflections from the Wrong Side of the Tracks: Class, Identity, and the Working Class Experience in Academe* (2006); Ryan and Sackrey, eds., *Strangers in Paradise: Academics from the Working Class* (1996); Dews and Law, eds., *This Fine Place So Far From Home: Voices of Academics from the Working Class* (1995); Welsch, ed., *Those Winter Sundays: Female Academics and their Working-Class Parents* (2005); Tokarczyk and Fay, eds., *Working-Class Women in the Academy: Laborers in the Knowledge Factory* (1993).
- ⁴⁰ Russo and Linkon, eds., *New Working-Class Studies* (2005); Linkon, ed., *Teaching Working Class* (1999); Zweig, ed., *What's Class Got to Do With It?: American Society in the Twenty-first Century* (2004); Zandy, ed., *What We Hold in Common: An Introduction to Working-Class Studies* (2001).
- ⁴¹ Annas, "Pass the Cake: The politics of Gender, Class, and Text in the Academic Workplace," 168.

- ⁴² hooks, "Keeping Close to Home: Class and Education," 102.
- ⁴³ Smith, "Grandma Went to Smith, All Right, But She Went From Nine To Five," 132, author's italics.
- ⁴⁴ Kosut, "Professorial Capital: Blue-collar Reflections on Class, Culture, and the Academy," 250-251.
- ⁴⁵ Ibid., 247.
- ⁴⁶ Ibid., 255.
- ⁴⁷ Ibid., 256.
- ⁴⁸ Kehoe, "Dressing for Class" (2005).
- ⁴⁹ Hoffer et al., *Doctorate Recipients from United States Universities: Summary Report 2002*, 69.
- ⁵⁰ Ibid., 36.
- ⁵¹ Ibid., 39.
- ⁵² Ibid., 71.
- ⁵³ Wilson, "A Hothouse for Female Scientists," *The Chronicle of Higher Education* (2006).
- ⁵⁴ Hoffer et al., *Doctorate Recipients from United States Universities: Summary Report 2003* (2004).
- ⁵⁵ Mullen et al., "Who Goes to Graduate School?," 159.
- ⁵⁶ Ibid., 40.
- ⁵⁷ Nettles and Millett, *Three Magic Letters: Getting to Ph.D.* (2006).
- ⁵⁸ Smith and Tang, "Trends in Science and Engineering Doctorate Production, 1975-1990" (1994).
- ⁵⁹ For a discussion of important changes in the academic labor market, please see Gold, *The Casualization of the United States Higher Education Instructional Workforce* (2004); Lee and Clery, "Key Trends in Higher Education" (2004); Ehrenberg and Zhang, "Do Tenured and Tenure-Track Faculty Matter" (2005).
- ⁶⁰ Lipset and Ladd, "The Changing Social Origins of American Academics" (1979).
- ⁶¹ Ibid., 323.
- ⁶² Ibid., 324.
- ⁶³ An online Data Analysis System (DAS) for the NSoPF is found at <http://nces.ed.gov/surveys/npsas/das.asp>

- ⁶⁴ Shott, "Guilt by Affiliation: Merit and Standing in Academic Archaeology," 36 (2004); Shott, "An Unwashed's Knowledge of Archaeology: Class and Merit in Academic Placement" (2006).
- ⁶⁵ Shott (2004, 2006).
- ⁶⁶ Peckham, "Complicity in Class Codes: The Exclusionary Function of Education," 274.
- ⁶⁷ Martin, "In The Shadow of My Old Kentucky Home," 83.
- ⁶⁸ Oldfield and Conant, "Exploring the Use of Socioeconomic Status as Part of an Affirmative Action Plan to Recruit and Hire University Professors: A Pilot Study" (2001).
- ⁶⁹ Handelsman et al., "More Women in Science" (2005).
- ⁷⁰ Dooris and Guidos, "Tenure Achievement Rates at Research Universities" (2006).
- ⁷¹ Ginther and Hayes, "Gender Differences in Salary and Promotion for Faculty in the Humanities 1977-95" (2003).
- ⁷² Lubrano, 84-85.
- ⁷³ Personal communication, Tom Fricke (2006).
- ⁷⁴ Seburn, Chan, and Kirshtein, *A Profile of the Ronald E. McNair Postbaccalaureate Achievement Program 1997-1998 through 2001-2002* (2005).
- ⁷⁵ *Ibid.*, 8.
- ⁷⁶ *Ibid.*, xii.
- ⁷⁷ *Ibid.*, A listing of institutions enrolled in the McNair Program during the 2005-06 academic year is online at <<http://www.ed.gov/programs/triomcnair/mcnairgrantees2005.pdf>>.
- ⁷⁸ *Ibid.*, 28.
- ⁷⁹ Pascarella et al., "First-generation College Students: Additional Evidence on College Experiences and Outcomes," 281.
- ⁸⁰ Lohfink and Paulsen, "Comparing the Determinants of Persistence for First-Generation and Continuing-Generation Students" (2005); Pike and Kuh, "First- and Second-Generation College Students: A Comparison of their Engagement and Intellectual Development" (2005).
- ⁸¹ Tokarczyk, "Promises to Keep: Working-class Students and Higher Education" (2004).
- ⁸² Bowen et al., *Equity and Excellence in American Higher Education*, 166.
- ⁸³ *Ibid.*, 175.
- ⁸⁴ Schmidt, "Not Just For Minority Students Anymore" (2004).

⁸⁵ Oldfield and Conant, 2001.

⁸⁶ Oldfield et al., "Social Class, Sexual Orientation, and Toward Proactive Social Equity Scholarship" (2006).

⁸⁷ Harrison, "Confess'n the Blues: Some Thoughts on Class Bias in Law School Hiring" (1992).

⁸⁸ Casey, "Diversity, Discourse, and the Working-class Student" (2005).

⁸⁹ Harrison (1992).

⁹⁰ Karabel, *The Chosen: The Hidden History of Admission and Exclusion at Harvard, Yale, and Princeton*, 554; Harrison (1992); Lubrano (2003).

⁹¹ Pascarella, "First-generation College Students: Additional Evidence on College Experiences and Outcomes," 249.

⁹² Bowles and Gintis, *Schooling in Capitalist America: Educational Reform and the Contradictions of Economic Life* (1976).

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