

Under-represented minority graduate students at the University of California, Riverside: Prospective faculty?

A report to the



&

The California Community College Collaborative

August 5, 2010

**Audrey J. Jaeger, Ph.D.
Associate Professor, North Carolina State University
Co-Executive Director, National Initiative for Leaderships &
Institutional Effectiveness (NILIE)**

**Karen J. Haley, Ed.D.
Assistant Professor, Northern Illinois University**

This project was sponsored by the California Community College Collaborative (C4)

Questions and comments may be sent to:
California Community College Collaborative (C4)
University of California, Riverside
900 University Avenue
1361 Sproul Hall
Riverside, CA 92521
C4@ucr.edu
www.c4.ucr.edu

Executive Summary

The profile of the professoriate in U.S. universities and colleges reveals a dearth of underrepresented minorities (URM). This suggests that our universities and colleges are not ethnically or racially diverse environments and that university and college students are educated by a predominantly majority white, American-European class. While considerable attention is given in both scholarly literature and in the public media to diversity of the student body, little attention is given to the makeup of the professoriate. Although the road to the professoriate may begin as early as middle school or high school, the clarity of career choice is more evident in college and particularly in graduate school where that choice is finalized.

Claims that graduate education will drive America's future prosperity (Stewart, 2010) are both prevalent and important. Graduate students are often lacking exposure and understanding to the career options available to them (Austin, 2002). While there is variation in the career pathways and how students choose their path, the transformation from student to faculty is frequently left to chance (Reybold, 2003). Furthermore, a faculty career is infrequently seen as an option for underrepresented minorities (Taylor & Antony, 2004).

Underrepresented minorities make up approximately 33% of the U.S. population and the number is projected to move to 40% by the year 2020 (U.S. Census, 2004). This increasing minority population is reflected in college enrollments with minority students representing 31% of total student enrollment in the fall of 2006. However, in 2005 only 17% of the nation's full-time professors belonged to an underrepresented minority

“I want to study Nigerians. I want to study women, and that's not always respected—to study who you are...instead let me try this applied route.”

group, an increase of only 12.5% since 1995, in spite of the push by institutions to increase their numbers of minority faculty (Gose, 2008). URM students do not have the same experiences or levels of satisfaction in graduate school as white students (Johnson-Bailey, Valentine, Cervero, & Bowles, 2009). And as noted, the demographic characteristics of faculty, especially at research universities where most doctoral students are trained, reflect a small proportion of faculty of color, and their experiences are not portrayed as satisfactory ones (Johnsrud, 1993). As a result, URM students may not see the world of academe as either **their** world or as a path worth pursuing. One student in our investigation shared her thoughts about the faculty role, “You need to publish or perish. [I want to be] respected in the field for what I want to study, because you know I'm Nigerian American. I want to study African Americans. I want to study Nigerians. I want to study women, and that's not always respected—to study who you are...instead, let me try this applied route.”

This report is based upon an investigation during the 2008-2010 academic years at the University of California, Riverside where graduate students, faculty, and administrators

were asked to participate in interview and focus group efforts aimed at understanding the career goals of underrepresented minority graduate students so as to understand and explain who does and does not intend to pursue careers as faculty in colleges and universities, including community colleges. While interviews were semi-structured and led to the collection of similar data from all students on the one hand and similar data from all faculty and administrators on the other hand, the strategy was to seek out narratives of explanation from students that provide a personalized account of the graduate school experience of students and accounts of student socialization and career development from faculty who work with these students.

This research shows that graduate students' attraction to academic work is related to (a) the ways in which students interact with others (i.e., peers, faculty, and mentors) as part of their graduate education; (b) students' present and past work experiences (i.e., assistantships and external job opportunities); (c) students' self-assessment of their performance of academic tasks; (d) students' cultural values (i.e., social commitment); and (e) students' perception of the profession. These ideas are represented in the cumulative findings, which are based on data from individual interviews and focus groups:

- 1. The “grass is always greener” — positions outside of the research university appeared to offer graduate students a better work-personal life balance, which was shown to be more important than the perceived benefits of a faculty career.**
- 2. For those students committed to a faculty career, they expressed unwillingness to recreate the status quo.**
- 3. Race is real, an authentic influence, in students' choosing a faculty career for URM domestic graduate students.**
- 4. International graduate students seek career flexibility as well as social purpose.**
- 5. Faculty and academic administrators' perspectives shape and limit the potential possibilities of career choices for graduate students.**

Table of Contents

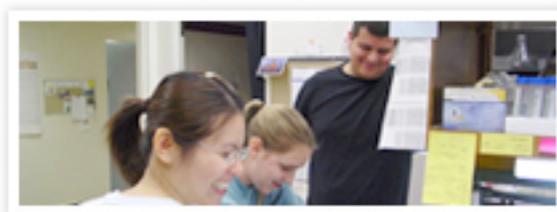
Background	5
Methodology	5
Findings	8
1. The “grass is always greener”	8
2. Unwillingness to recreate the status quo	9
3. Race is real	10
4. Career flexibility.....	11
5. Perspectives shape and limit	12
Recommendations.....	14
Final Comment	16
Acknowledgments	16
References	17

Background

The University of California–Riverside (UCR), a public, comprehensive, high research activity university, was chosen because of its highly diverse undergraduate population of 15,000 (80% URM) and graduate population of 2,000 (23.8% URM, 34.8% international students) (2008 demographic snapshot). Approximately 242 graduate students identify as Latino, African American, or Native American, 227 students identify as Asian, and 772 as Caucasian. Graduate degrees are offered in engineering, humanities (arts and social sciences), natural and agricultural sciences, management, and education.

Researchers from North Carolina State University and Northern Illinois University collaborated with the California Community College Collaborative (C4) at UCR. C4 is a policy and research center established by the University of California's Office of the President and the Chancellor's Office of the California Community Colleges. Focusing on the needs of California's community colleges, C4 supports and conducts empirically-based research on community colleges and offers professional development for educational leaders throughout California.

This research set out to identify and explain the career goals of URM graduate students in order to determine those who intend to pursue careers as faculty in colleges and universities, including community colleges. The low percentage of URM populations in faculty positions in colleges and universities motivated this research (Gose, 2008). The study's participants included university administrators, faculty, and graduate students. The investigation focused on determinants of students' career choices, especially careers as faculty.



Methodology

The research team employed a qualitative field study research design (Marshall & Rossman, 1999; Maxwell, 2005), involving researcher interaction with site participants over an extended period of time (Burgess, 1982) to identify and explain the career goals of underrepresented minority graduate students. The results of a qualitative study are rich descriptions that can provide increased understanding of the population and insights to assist future policy development (Merriam, 1998).

The research team included two tenured faculty, one tenure-track faculty, one program director, and three graduate student researchers. Four of the researchers were not affiliated with UCR, and two members of the research team identified with a minority race. Preliminary site investigation began in August 2008 with four onsite visits by the research team between January and April 2009.

Participant Selection

Selection of the UCR graduate students began with an email communication sent from the C4 Assistant Director to all graduate students explaining the project and asking them to participate. If they were interested in participating, they followed a link in the email to a short demographic survey and provided an email contact. While self-selection by the participants may have influenced the overall results, participants were committed to the study—giving of their time and conveying their experiences—and as a result provided information-rich narratives (Patton, 2002). The students were scheduled for individual interview times during the second and third site visits. A second email message was sent to all UCR graduate students after the second site visit asking for additional participants. In addition, the graduate faculty advisors for each department were provided text to embed in an email message to send to students of color in their respective departments as a way to expand the network of participants (Merriam, 2009). Interview participants were also asked for names of other graduate students who might be interested in participating in the project—a form of snowball sampling (Bogdan & Biklen, 1992). A total of 45 graduate students were interviewed (22 URM, 15 White, 8 International).

The C4 Director provided an initial list of university administrators and faculty who might have a direct connection to graduate students and their experiences. Upon completion of each of these interviews, additional contacts were sought. A total of 16 academic administrators and faculty were interviewed. The sample in our investigation included 5 women and 11 men; of these three were African American and three Asian American. Because one focus of the investigation was related to graduate students of color, the representation of administrators and faculty of color was an important rationale for our sample of administrators.

Data Collection

Interviews were the primary method of data collection for this project, which is an appropriate qualitative method as it allows the exploration of the experiences of graduate students based on their perspectives (Fontana & Frey, 2000). While interviews were semi-structured and led to the collection of similar data from all students, the strategy was to seek out narratives of explanation that provided personalized accounts of the graduate school experience. We asked specific questions of participants, but then explored participant responses (Seidman, 1998). An understanding of social contexts as different from or similar to the participants was important (Seidman) as researchers addressed the socio-cultural context of graduate school education that influences faculty career choices and thus the research team was attentive to signals from participants based upon an unobtrusive exploration of issues of ethnic identities.

Faculty and administrator interviews were approximately one hour and were intended to provide a context for the student data. Researchers asked about their perceptions of student experiences and opportunities at their institution, particularly for students of color.

Focus group sessions with students during the fourth site visit allowed researchers to explore specific issues, such as race relations, identified during the individual interviews. The focus groups were designed to offer the most comfortable environment for students to interact with each other and potentially build on each other's responses (Marshall & Rossman, 1999; Merriam, 2009). Each focus group lasted one hour and was led by a research team member, while a second team member took notes and observed in order to gain accurate and substantial data (Marshall & Rossman, 1999). Follow-up emails were sent throughout the data collection phase to clarify responses as well as seek additional information.

Finally, and subsequent to the above, in order to gain more insight of the larger university perspective as well as the more general conditions in graduate programs university-wide, a group of four deans were interviewed. These interviews enabled researchers to see some differences between faculty views of graduate student experiences and deans' views.

Data Analysis

Data from both the individual and focus group interviews were recorded, transcribed, and loaded into NVIVO, a qualitative software program, for coding. Each participant was assigned a pseudonym to maintain anonymity. Furthermore when describing students, who serve as the foundation of this work, only one identifier is used to describe them to protect their anonymity. For example, if an interview was conducted with a Black female in physics, the report will only list that the student is Black, or the student is in physics, or the student is a female. Interview data were analyzed using socialization, social identity, critical race theory, and institutional provisional coding (Miles & Huberman, 1994; Saldana, 2009). Initial or open-coding (Charmaz, 2005; Saldana, 2009) was used as a supplement to the known themes in the literature and resulted in codes based on, for example, a specific student experience such as departmental activity, community connection, and perceptions of difference. The research team individually and collectively compared and sorted the individual codes while devising thematic categories to create a tree-node organization in NVIVO (Bazeley, 2007). This allowed researchers to see overlapping codes and connections between codes (Bazeley, 2007).

Research Credibility

The use of a team of researchers both for data collection and data analysis—and a team comprised of researchers with no affiliation with the site and other researchers who work at the site—permitted considerable opportunity for both breadth and depth in the investigation. Before, during, and after site visits members of the research team met to discuss the project, compare perceptions, check data acquired, refine data collection techniques, and propose explanations of behaviors. As well, during data

analysis, not only were data subjected to analysis through a software program but also data were reviewed by careful reading of transcripts by several members of the research team. Such an approach to data collection and data analysis ensured credibility of the research process and its findings (Marshall & Rossman, 1999; Miles & Huberman, 1994).

Findings

1. The “grass is always greener” – positions outside of the research university appeared to offer graduate students a better work-personal life balance, which was shown to be more important than the perceived benefits of a faculty career.

Domestic graduate students followed two logical paths. The first path appeared to be a reaction to observing faculty in their daily work. As emphasized in multiple studies about the academic profession, participants note that the academic profession is characterized by intense work as represented by excessive workloads and the enactment of multiple roles (Boice, 1992; Gappa, Austin, & Trice, 2007; Honan & Teferra, 2001; Massey, 1997; Rhoades & Slaughter, 1997). Domestic graduate students were opposed to the long hours, departmental politics, and funding demands and challenges, and instead of finding a way around these obstacles, they assumed that anything would be better than being a faculty member at a research university. A few of these students considered faculty positions at community colleges or with the California State University system while the rest targeted industry or government positions.

I'd like to teach at a community college or possibly a Cal State, just because I want to do more teaching and be more involved with the students...[B]ecause initially I don't want to be put into that whole research competition that goes on in research institutions.

Those domestic graduate students looking for faculty positions at other institutional types had some idea of why an institution other than a research university would be more attractive—decreased demand for obtaining grants, decreased expectations for publications, and increased opportunities to teach and engage with students. Those graduate students seeking positions in industry rarely knew what the job would entail. When students were asked how they knew jobs in industry or government would be “better” than faculty positions, one student's comment summarized the general perception, “It can't be any worse, right?” Students perceived the industry environment would offer a better work-personal life balance as well as have fewer competing demands.

I see day in and day out what my professors have to deal with: pressures of bringing in funding, grants, always having to write grants, apply for them. It is very difficult right now to acquire money and also you are always taking your

work home and you never really go home and leave your work. So I would like a job where I can have my life at home and my life at work. I don't have to be thinking about my work all the time.

Domestic graduate students seeking faculty positions at non research universities or in industry or government often portray the grass as greener in industry or government positions.

2. For those students committed to a faculty career, they expressed unwillingness to recreate the status quo.

Students on the second path, those intending to seek an academic career, saw the benefits of a faculty career, such as autonomy, flexibility, and creativity as overriding their concerns about the faculty pressures of maintaining funding and politics. The opportunity to engage in research was an attractive option for graduate students.

I don't like being told what to research. Since I first decided to go into a faculty role I've had some ideas about some projects I wanted to pursue that were not the type of thing I could do in another position. So I guess the reason I ended up going to grad school and wanting to be a professor is that I have raised some questions that I'd like to answer that I don't think I can answer in any other career.

Graduate students saw their future as similar to their current faculty but also somewhat different. One student presented his perspective in contrast to his current faculty.

I want to be a good instructor. I want to be an inspiration to some students who maybe don't have anyone else that they can relate to. I don't want to be consumed by research and publications and politics.

“I had cousins that died that died from it [diabetes], so it's a big deal. There was always a sense that you should help the community.”

Domestic graduate students who were planning on careers in research universities were well aware of the potential difficulties and either saw themselves up for the challenge or felt that they could do things differently. This meant that they wanted to be more connected to teaching than their current faculty role models and more connected to their families and community. Similar to their peers looking for careers elsewhere, graduate students expressed a strong desire to undertake research “that mattered.”

What I am interested in is how researchers produce information about how Native Americans as being kind of pathologically ill, and how that affects health care treatment of native people. [I want to]...build an education intervention for doctors to better serve native people. That's the intent of my dissertation. And I

think that was all influenced because I had family, aunts and others; all of my aunts had diabetes. I had cousins that died from it, so it's a big deal. There is always a sense that you should help the community.

3. Race is real in choosing a faculty career for URM domestic graduate students.

Graduate students identified with their race in some if not many aspects of the career decision making process. URM students discussed family expectations and their intent to become role models or service providers for their cultural communities. Immediate and extended families were viewed as important contributors to the decisions for URM students. For these students it was more than just considering the perspectives of their family and community; they made their decisions based on the needs of their family and community.

To serve as a role model for their cultural community was an important motivator for students to continue their education and seek a position that would allow them to give back. An engineering student noted that too few Latinos had the opportunity to pursue and obtain a PhD; therefore, this student wanted to be an example for others. Leticia wanted to inspire others, especially girls: "having grown up in a very poor neighborhood and just seeing the lack of role models in the classroom at every level for Latinos and Latinas, I just thought that ...my experience and my story...if I can inspire one girl, that's fantastic!" The decision to enter academe was related to students' cultural identity.

As a graduate student, one of the things that bothered me was all through my undergraduate education I never saw any Hispanic professor. When I came here, I saw a Hispanic professor teaching Spanish, but I never saw one in sciences. I think at times it discouraged me, but once I put forward that effort for graduate school, and I was in graduate school, it made me want to be a faculty member to make that change.

Once URM students had decided to pursue a faculty career, the idea of being a role model was not unique; rather, it was consistent across gender and discipline. One student stated that she wanted to help "color" the professoriate.

In engineering I think we have one Black faculty. I think the number is low because if you don't have role models then you don't go that path. People are comfortable when they are around people like them. Having heard the ridiculously low number of Black students, male and female, which is like one percent, I was like, you know I should try and change that.

"Having heard the ridiculously low number of Black students, male and female,...I should try and change that!"

Although some URM students chose to be faculty because of their cultural identity, others chose not to pursue academe because of their cultural identity. Students wanted to incorporate their cultural identity into their lives as faculty. If students were not able to integrate their cultural identity with their faculty role, they indicated they were less likely to pursue a career in academe.

[I want] to be a sociologist because of Martin Luther King and Du Bois, and I am working with these faculty, and they don't care about people. They just care about their articles and they're just mean and angry people. That's not all faculty you know...and I'm just like, "whatever is going on in your life, I don't want to be a part of it." You need to publish or perish. [I want to be] respected in the field for what I wanted to study, because you know I'm Nigerian American, I want to study African Americans. I want to study Nigerians. I want to study women, and you know, that's not always respected, to study who you are.



Students noted that even in a diverse environment such as UCR, race was nonetheless a poignant issue. This was evident in the classroom or lab where students indicated they were the only one of their ethnicity in that group and they thought that their options may have been limited. One student in biomedicine stated:

It always seems like the people of color end up with the jobs in ethnic studies....They're not getting the TA ships with other departments. When you're TAing a class, or teaching a class, you are talking to kids who want to be there. So usually you're talking to people that are like you...[Y]ou're not talking to white kids, which is good. You know they [students of color] need to see role models, but I think there needs to be more diverse opportunities.

Decisions to choose a faculty career are related to a complex set of variables, and race is a critical factor for URM graduate students. For example, the community in which they live and their family are influential in career decisions. Overall, student voices illuminated concerns and frustrations of URM graduate students throughout the institution.

4. International graduate students seek career flexibility as well as social purpose.

We find that international students, similar to domestic students, valued the interactions they established with their peers and mentors as part of their graduate education experience. Communication with others enabled international students to make sense of their department's climate and receive social and instrumental support, as well as guidance, for their career choices.

The ways in which international graduate students talked about their graduate studies and decision making processes indicated that career pathways and occupational aspirations are both dynamic and fluid. Similar to domestic students, contextual factors, personal characteristics and resources, and forms of interaction with others have an important influence upon the way in which individuals engage in a profession. Similar to our URM students, international graduate students were connected to their cultural values. International graduate students were interested in helping other people by providing social service with the knowledge they acquired through their doctoral degree. One student noted:

I am supposed to go back to my country. I'm not very interested in staying here, because I really want to do something for my country. That was the purpose of the scholarship I am receiving. I'm aware that in Mexico there is a great necessity of people with a better understanding about education and all those kinds of processes, so I think that there are very good opportunities in my country to do something to improve the educational system.

Unique to international graduate students were the ways in which they talked about their career choices and occupational aspirations—employment plans among international students have to be flexible. International students often have to choose between staying in the host country or to return to their country of origin (Goldbart, Marshall, & Evans, 2005).

I am going to finish and maybe I will work here for 2 or 3 years, then I will be back to China, I want to gain work experience. In China employers are always looking for experience; it is very important at the university. I will do better in China if I work here for several years first.

“I'm aware that in Mexico there is a great necessity of people with a better understanding about education and all those kinds of processes, so I think that there are very good opportunities in my country to do something to improve the educational system.”

5. Faculty and academic administrators' perspectives shape and limit the potential possibilities of career choices for graduate students.

Faculty and academic administrators, that is, those with academic appointments, construct the university largely from the perspective of (a) their faculty discipline and (b) their own personal experiences, as graduate students, as tenure-track professors, and as supervisors of graduate students. This construction is framed and indeed rationalized but not as a function of UCR only but by the University of California, which is viewed as one and the same as UCR.

Because they function from a UC perspective, and this includes the perspective of a research university, faculty and academic administrators view their institution, its faculty, and its students as identified with a research university and all of its cultural and social components and values. What is rewarded, what is valued, and what is taken for granted or highly institutionalized (Colyvas & Powell, 2006) are deterministic of actions. Such a position ignores individual agency. This is reflected in several administrators' notions that graduate students do not have choice in selection of careers, or administrators do not have much or any influence over faculty behaviors. It furthers the idea that faculty and academic administrators in this institution act according to scripts, with their behaviors determined.

Institutionalization itself cements practice to the extent that actors are unaware of their practices, taking them for granted and not questioning their sources or their rules or norms (Colyvas & Powell, 2006). Thus, we can see that within the institution itself legitimacy is assured for behaviors from the hiring of faculty to the recruitment and job placement of graduate students, without questioning the actual outcomes because the actors conform to institutional culture and because the actors inhabit the same institutional type.

Clearly the relatively small sample of academic administrators we interviewed was not cognizant of the considerable challenges for underrepresented minority graduate students. Furthermore, they saw all graduate students as similar, locked into a career path that would take them either to a research university or a research position in government or industry. None saw these graduate students as potential candidates for faculty jobs at state colleges or community colleges, largely because they were products of a UC and the trajectory of a doctoral degree at a UC was not in the direction of non-research institutions.

Recommendations

The following recommendations are based on the findings of the survey and focus group efforts.

1. Offer graduate students opportunities to gain knowledge of and experience with various career paths.

In order to attract more graduate students to academic careers—whether at research universities, comprehensive state universities, or community colleges—universities must consider the differing needs and identities of their students and determine how best to align their approaches to guidance and advising for these students so that an academic career can be considered. Although faculty often assume graduate students are seeking a career in the academy, many students are seeking other options. A universal approach to advising graduate students assuming they have similar goals and aspirations is inadequate. Students should be offered opportunities to “test out” what various career options may exist. Some of the students in this study did not realize how much they enjoyed teaching until they had the opportunity to teach. Other students were seeking industry careers to avoid the faculty route having little knowledge of what an industry career entailed. At the same time, graduate students have limited knowledge of how faculty careers differ at different types of institutions.

The nature of the work experiences graduate students engage in before and during their graduate studies influences the kind of career decisions they make (Austin, 2002; Johnson & Birkeland, 2003). Work experiences enable individuals to assess their own competence at a given job; self-assessment of task competence influences the occupational aspirations and choices that individuals select (Correll, 2001; Johnson & Birkeland, 2003). Offering students intentionally planned opportunities to gain experience and knowledge of industry and government positions will help students make more informed career decisions. Furthermore, developing opportunities for students to connect with faculty at various types of institutions will help students better understand the unique features of the faculty role at different institutions. Students in this study often suggested that their faculty did not encourage them to seek faculty positions at institutions other than research universities. Previous research (Haley, 2008), as well as findings from this study, suggests that many students find teaching as the motivating pathway to a faculty career. The obstacle and challenges of the faculty role presented by students in this study were associated with the faculty role at a research university rather than faculty roles at other institutional types. Since graduate students throughout the US are more often educated and trained at research universities, their likelihood of gaining information about faculty roles at other institutions

is limited. Through teaching and research experiences, graduate students not only integrate knowledge and professional practice but also understand the content and dimensions of the academic role.

This recommendation benefits both domestic students as they explore career options and international students as they prepare for an uncertain future.

2. Create a culture that begins to see family and community as part of a faculty career rather than a distraction from it.

Graduate programs need to recognize that even students who are interested in academic careers are influenced negatively by current faculty role models. Whether graduate students are unrealistic to think they could balance their lives better than their faculty or they are just idealistic, they may not seek positions within the academy if the academy does not meet their own personal expectations. There are two ways to address this issue. First, current faculty could help students see the realities of an academic life which may as a consequence turn graduate students away from the faculty path. Or, universities can aim for a more integrated life for faculty, one in which their community, which includes their family, is recognized as legitimate. As noted in previous research on the University of California system (Mason & Goulden, 2006) this generation of graduate students is looking for a more balanced life style. This not only means the design of policy that acknowledges a life outside the academy but also behavior change of faculty so that greater diversity of faculty work and life are normative.

3. Offer support and recognition to graduate students who seek to integrate the needs of their career and community.

The third stream of action applies to the creation of more inclusive professional workplaces and graduate education environments so that URM students do not live on the periphery but rather become mainstream participants with norms and practices of graduate programs as applicable to them as they are to white students. The norms of isolation encountered by underrepresented minority students, particularly in science and engineering programs, affect the lives and future career aspirations of these students. Supporting URM students in their decisions to identify research problems that affect their culture and community will influence students' career decisions. URM students expect that institutions will support faculty whose family life, which is more than a responsibility to children but a responsibility to their community as well, is presented as an integral part of their career. URM students need faculty role models who value their role and contributions to community and family and other institutional support structures that confirm their choices to integrate the needs of community with their academic research.

4. Develop intentional connections and conversations between academic administrators and diverse groups of graduate students.

If academic administrators' roles are understood as decision-making and policy interpreting, then it can be suggested that their actions as directed at graduate students are grounded in the experiences, conditions, and aspirations of these students. Instead, this research found that academic administrators as well as faculty used their own experiences and aspirations as guides for their behavior. This may explain why there are numerous claims that graduate students are not socialized adequately to the various roles of a faculty member or are socialized to the singular perspective of one faculty member. As well, the frameworks that academic administrators use to understand—conveyed through the ways in which they explain the behaviors of graduate students—are not consistent with scholarship on graduate students of color.

Administrators responsible for faculty who supervise graduate students should be aware of both group differences (the special case of URMs) and the career decisions and potential opportunities for graduate students. This understanding should be one that acknowledges that teaching careers, at different types of institutions in higher education, are admirable ends. Academic administrators responsible for graduate students need to gain the knowledge of the needs of graduate students, in particular graduate students of color. To gain this knowledge academic administrators would benefit from connections to and conversations with various groups of diverse graduate students.

Final Comment

To address the dearth of underrepresented minorities in the professoriate this study suggests faculty and academic administrators need to be more aware of the needs and desires of students and provide sufficient support systems to address those needs. At present, URM students lack mentors and advocates to help them reach their goals.

Acknowledgements

The authors express our gratitude to Dr. Elizabeth Cox and Noemy Medina of the California Community College Collaborative (C4). Elizabeth and Noemy were essential to the development of the project as well as the day-to-day management. We also appreciate the C4 student researchers, Zachary Haberler, Virginia Montero-Hernandez, and Jason Chou, who assisted with interviewing, transcribing, and analysis. Two student researchers from NC State University, Dr. Frim Ampaw and Jennifer Becker, also provided essential support for the set-up of the project as well as for transcribing, data gathering, and analysis. Finally, we express our thanks to Dr. John Levin, C4 Director and Bank of America Professor of Education Leadership, University of California, Riverside for his vision and support for the entire project.

References

- Austin, A. E. (2002). Preparing the next generation of faculty: Graduate school as socialization to the academic career. *Journal of Higher Education*, 73(1), 94-122.
- Bazeley, P. (2007). *Qualitative data analysis with NVivo*. Thousand Oaks, CA: Sage.
- Bogdan, R., & Biklen, S. K. (1992). *Qualitative research in education* (2nd ed.). Boston: Allyn and Bacon.
- Boice, R. (1992). *The new faculty member*. San Francisco: Jossey-Bass.
- Burgess, R. G. (Ed.). (1982). *Field research: A sourcebook and field manual*. New York: Routledge.
- Charmaz, K. (2005). Grounded theory in the 21st century: Applications for advancing social justice study. In N. K. Denzin & Y. S. Lincoln (Eds.), *The handbook of qualitative research* (2nd ed.) (pp. 507-535). Thousand Oaks, CA: Sage.
- Colyvas, J. A., & Powell, W.W. (2006). Roads to institutionalization: The remaking of boundaries between public and private science. *Research in Organizational Behavior*, 27, 315-363.
- Correll, S.J. (2004). Constraints into preferences: Gender, status, and emerging career aspirations. *American Sociological Review*, 69, 93-113
- Fontana, A., & Frey, J. H. (2000). The interview: From structured questions to negotiated text. In N. K. Denzin & Y. S. Lincoln (Eds.), *The handbook of qualitative research* (2nd ed.) (pp. 645-672). Thousand Oaks, CA: Sage.
- Gappa, J. M., Austin, A. E., & Trice, A. G. (2007). Rethinking faculty work: Higher education's strategic imperative. San Francisco: Jossey Bass.
- Goldbart J., Marshall J., & Evans I. (2005). International students of speech and language therapy in the UK: Choices about where to study and whether to return. *Higher Education*, 50,(1), 89-109.
- Gose, B. (2008, September 26). Whatever happened to all those plans to hire more minority professors? Results often fall short of ambitions, but nobody's giving up. *Chronicle of Higher Education*, p. B1.
- Haley, K. J. (2006). *Graduate education experience and career paths of women faculty in higher education administration*. Unpublished manuscript, Raleigh, NC: North Carolina State University.
- Honan, J. & Teferra, D. (2001). The US academic profession: Key policy challenges. *Higher Education: The International Journal of Higher Education and Educational Planning*, 41(1-2), 183-203.
- Johnson, S. M., & Birkeland, S. E. (2003). Pursuing a 'sense of success': New teachers explain their career decisions. *American Educational Research Journal*, 40(3), 581-617.
- Johnson-Bailey, J., Valentine, T., Cervero, R. M., & Bowles, T. A. (2009). Rooted in the soil: The social experiences of Black graduate students at a southern research university. *Journal of Higher Education*, 80(2), 178-203.
- Johnsrud, L. K. (1993). Women and minority faculty experiences: Defining and responding to diverse realities. *New Directions for Teaching and Learning*, 53, 3-16.
- Marshall, C., & Rossman, G. (1999). *Designing qualitative research* (3rd ed.). Thousand Oaks, CA: Sage.

- Mason, M. A., & Goulden, M. (2006). *UC Doctoral Student Career Life Survey*. Berkeley, CA: University of California.
- Maxwell, J. A. (2005). *Qualitative research design: An interactive approach*. Thousand Oaks, CA: Sage.
- Merriam, S. B. (1998). *Qualitative research and case study applications in education*. San Francisco: Jossey-Bass Publishers.
- Merriam, S. B. (2009). *Qualitative research: A guide to design and implementation*. San Francisco, CA: Jossey-Bass.
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook*. Thousand Oaks, CA: Sage.
- Patton, M. Q. (2002). *Qualitative research and evaluation methods* (3rd ed.). Thousand Oaks, CA: Sage.
- Reybold, L. E. (2003). Pathways to the professorate: The development of faculty identity in education. *Innovative Higher Education*, 27(4), 235-252.
- Rhoades, G. & Slaughter, S. (1997). Academic capitalism, managed professionals and supply-side higher education. *Social Text*, 51(15,2), 9-38.
- Saldana, J. (2009). *The coding manual for qualitative researchers*. Thousand Oaks, CA: Sage.
- Seidman, I. (1998). *Interviewing as qualitative research: A guide for researchers in education and the social sciences* (2nd ed.). New York, NY: Teachers College Press.
- Stewart, D. W. (2010, January/February). "Important, if true": Graduate education will drive America's future prosperity. *Change*, 42(1), 36-44.
- Taylor, E., & Antony, J. S. (2000). Stereotype threat reduction and wise schooling: Towards the successful socialization of African American doctoral students in education. *The Journal of Negro Education*, 69(3), 184-198.
- U.S. Census Bureau, 2004, *Population Projections of the United States, Current Population Reports*. Washington, DC