Annotated Bibliography of Recent Research Related to Academic Advising

Gardner, S. K. (2010). Contrasting the socialization experiences of doctoral students in high- and low-completing departments: A qualitative analysis of disciplinary contexts at one institution. *Journal of Higher Education, 81*(1), 61–82.

Doctoral student attrition rates may be as high as 57% (Gravois, 2007) but tend to vary by discipline, reaching as high as 68% in some academic areas (Nettles & Millet, 2006). One factor among many and the focus of Gardner's study that influences doctoral students' decision to persist is the socialization experience of students pursing doctoral degrees. Gardner defines socialization as "the process through which an individual learns to adopt the values, skills, attitudes, norms, and knowledge needed for membership in a given society, group or organization" (p. 63). For doctoral students the process involves simultaneous socialization into the graduate school environment and into one's professional role (Golde, 1998). Using a three-phase framework of development and socialization through which doctoral students pass, Gardner examined the socialization experiences of 60 doctoral students enrolled in six disciplines at a single research-extensive institution.

According to Gardner (2007, 2008), the first developmental phase through which doctoral students pass leads up to admission through the beginning of course work experiences. During this phase, often called "anticipatory socialization" (p. 65) in the literature, students gather information about different graduate programs, make applications, relocate sometimes, attend orientation and the first few months of classes, meet peers and faculty members, and begin settling into their role as doctoral student. The second phase occurs between the first few weeks of class until the beginning of candidacy status. It includes course work, social integration with peers and faculty members, selection of an advisor and dissertation committee, preparation for comprehensive exams, and for many, an assistantship experience. The final phase occurs after a student has completed the comprehensive exams. During this time, students concentrate on their dissertation research and begin preparing for the job search or postdoctoral research. This phase culminates with graduation. During this period, relationships with faculty members and peers may change as the doctoral candidate transitions from a student orientation to that of a more "profession-ally-minded self" (p. 65).

The primary research question Gardner asked was "How does disciplinary context and culture influence the socialization of doctoral students?" (p. 65). Interviews with 60 doctoral students from six areas, chosen for their disciplinary variability and historical patterns of completion rates at the institution under study, yielded the data. The disciplines and mean completion rates over 20 years from which 10 doctoral students were interviewed included: English (56.4% mean completion rate), communication (75.6%), psychology (70.2%), mathematics (37.6%), oceanography (72.7%), and electrical and computer engineering (17.6%). Gardner consulted with departmental chairs to select a representative sample in terms of race, gender, international- or domestic-student status, and phase in the program (as described above). Annually, the institution enrolls approximately 30,000 students, 4,000 of whom include graduate and professional students. Similar to the national average, the overall completion rate for doctoral students at the institution under investigation was 52.3%.

Four themes were raised by participants in all six disciplines, although experiences associated with these themes varied according to discipline and participants' developmental and socialization stages at the time the interviews were conducted. Gardner first addresses support. When individuals become part of a larger organization or group of people, they must learn how to interact with others and forge relationships to be successful in the organization, a situation which is inherently stressful for newcomers (Van Maanen, 1984). To cope, many will seek support from others. Graduate students may seek the support of peers and faculty members as well as, in some cases, persons outside of the program.

Students in communication, the discipline with the highest completion rate, reported receiving high levels of support from within, frequently using words like "camaraderie" and "family" to describe their department. In other programs with high completion rates, faculty support was mentioned, but more so by students in the later phases of study. The majority of students mentioned peer support more frequently than faculty support. Students felt a solidarity with their peers because they shared common experiences. One exception occurred in

the disciplines with the lowest completion rates, math and engineering, where students reported receiving more support from the faculty. Gardner observed that these departments had the highest rates of international students, who, prior research has shown, often have issues related to social integration, language skills, and developing relationships with peers (Mallinckrodt & Leong, 1992). While international students in the present study described faculty as "helpful" and "supportive," when asked what or who had been most helpful to them overall, several responded that family, roommates, and people "outside of school" were the most helpful.

Self-direction was a second theme discussed by all of the participants. As graduate students progress through the stages of development, they are expected to become increasingly more independent. Interestingly, students from the departments with the highest and lowest completion rates, communication and engineering respectively, raised the topic most frequently. However, while communication students discussed self-direction from a positive perspective, valuing the freedom they were given to choose their own direction to motivate themselves, engineering graduate students reported feeling alone and needing to teach themselves how to do research. English students often associated self-direction with having a plan or strategy for progressing toward graduation, whereas various students in the psychology program discussed self-direction in terms of lack of guidance from advisors. Self-direction was mentioned less frequently by students in oceanography and mathematics, but when the theme emerged it was often mentioned with respect to "feeling lost" or in limbo until a major advisor was selected. One student in mathematics mentioned explicitly that she felt her department did not do enough to help students who were in limbo.

Ambiguity was a third theme raised by students, often with respect to procedures and regulations. One remarked, "You should get a PhD in graduate school paperwork." With this theme, students' stage of development appeared a more salient variable than students' discipline. Students in the first phase of graduate study reported that expectations of them as graduate students were unclear. Students in the second phase expressed uncertainty about the purpose of comprehensive exams, while students in the third phase related difficulties related to the process of writing the dissertation.

The final theme raised by all participants was that of transition, which occurs at each of the three phases in graduate student development as well as in the final phase when the individual exchanges the role of student for that of a professional. Students in the first phase mentioned transitional issues related to new information and unfamiliarity with people. Others mentioned adjusting to living in a new location or being on their own for the first time. Students in the second phase indicated struggling to develop new skills. For example, several students were caught off guard by the new ways of writing that were expected of them. Students in the third phase commented on the transition from taking classes to doing independent research on their dissertations. Transitional issues were raised most often in mathematics and engineering (the disciplines with the greatest proportion of international students).

After illustrating the themes common to all participants, Gardner presented several implications for the findings. First, students tended to reflect on their current stage of graduate study, thus pointing to the importance of the developmental nature of graduate students' socialization. Students' socialization experiences were affected by disciplinary and departmental contexts. Previous scholars have linked higher completion rates to environments in which clear expectations are set as well as those that provide social and academic integration for students and supportive faculty-student mentoring relationships. While students in all six disciplines raised the aforementioned themes of support, self-direction, ambiguity, and transition, in disciplines with high completion rates, such as communication and psychology, the issues were presented in more positive tones than when expressed by those in programs with lower completion rates, such as mathematics and engineering. The students in the latter group felt that they were in nonsupportive environments, and they often reported negative experiences related to ambiguity and transitional issues.

The four themes Gardner culled from the interviews connect to one another cyclically as students pass through the socialization process. When students transition from one phase to the next in their graduate study, they are likely to experience ambiguity, which prompts a need for self-direction. Support helps ease negative feelings associated with ambiguity and the struggle to find self-direction. Gardner calls for extended developmentally appropriate support beyond the typical orientation programs provided at the beginning of a student's graduate study, including supplementing orientation and induction programs with brown

bag sessions that bring together faculty members and students at various points in their program to talk about topics such as the dissertation writing process and time management. Creating peer mentoring programs and shared offices for those with assistantships may also help students with support aspects of graduate school.

In addition to support and peer mentoring, Gardner suggests that guidelines and policies related to graduate study as well as the websites, catalogs, and handbooks that describe them be reviewed periodically for currency and clarity by both administrators and student representatives. The article concludes with a call for similar studies at different institutions with different populations of students. By having a greater understanding of the socialization processes of graduate students, universities may be able to increase persistence rates and promote graduate students' success in their programs and beyond.

Ng, E.S.W., Schweitzer, L., & Lyons, S.T. (2010). New generation, great expectations: A field study of the millennial generation. *Journal of Business Psychology, 25*, 281–92.

The millennial generation, defined in this study as those born in or after 1980, is reputed to "want it all" and "want it now" with respect to job pay and benefits, career advancement, work-life balance, employment in a job that is interesting and challenging, and the ability to contribute to society. Using survey data gathered by three consulting firms commissioned by a consortium of employers in Canada, Ng, Schweitzer, and Lyons investigated the accuracy of these stereotypes concerning millennial students. After graduate students and students born before 1980 (nonnmillennials) were removed from the original sample of 27,592 postsecondary students from across Canada, responses from 85%, or 23,413 students, were considered by the authors, who limited their analysis to answers from the original career goals and expectations survey.

Because of the large sample size, the cutoff for statistical significance for all analyses was set at *p* <.01. In addition to evaluating trends across the whole sample of respondents, the authors also explored differences by gender, previous work experience, students' year of study, GPA, and participants' status as part of a "visible minority" (defined as someone who is "non-Caucasian in race or nonwhite in color" [p. 284]), a definition from Statistics Canada (2007). A table summarizing the pertinent demographic characteristics of the sample

is provided on page 284.

Two questions on the survey addressed career expectations. First, respondents were asked whether they would be willing to accept a nonideal job that served as a good starting point for their career. Second, they were asked whether they would like to work for an organization in which they could spend their whole career. Overall, a large majority (71%) of the respondents indicated willingness to start with a less-than-ideal job. However, the researchers found demographic variability. Females were 17% more likely to accept nonideal jobs than their male counterparts, and those with work experience were 15% less likely than their peers without work experience to do so. By contrast, they found no significant differences in likelihood of accepting a nonideal job between visible- and non-minority participants. However, GPA and class standing produced variance with the likelihood of accepting a nonideal job decreasing 8.5% per each increased mean grade point and increasing by 9.0% for each year of study.

With respect to longevity, only one half of the participants indicated a desire to spend their whole career at one organization. Women were 9% less likely than their male peers to seek a career within a single organization. Likewise, students with work experience were 9% less likely to seek a job with a single employer. However, visible minorities were 10% more likely than their nonminority counterparts to seek a career-long employer. The likelihood of seeking a single employer decreased by 5% for each year of study and by 4% for each mean grade-point increase.

Millennials reportedly expect frequent and significant promotions and pay raises, often within the first 6 months of employment (Erikson, 2009). This, the authors speculate, is a manifestation of the sense of entitlement that millennials are reputed to feel. Advancement expectations were assessed with a question that asked respondents how soon they expected to be promoted after obtaining a job postgraduation. Pay expectations, in turn, were assessed with a question related to expected initial salary and expected salary 5 years after beginning employment.

A large majority (68.5%) expected to be promoted within the first 18 months of their job. Only two of the independent variables, gender and year of study, were significantly related to promotion expectations. Males were more likely to expect rapid promotions than females, and the expected time to first promotion increased with each year of study. As for starting salary, the average was

$42,964 (Canadian dollars), which the authors find realistic. They speculate that because many respondents were nearing graduation and beginning their career search, they have accessed statistics regarding starting salaries as well as heard anecdotal evidence regarding starting salaries from friends. Supporting this supposition, analysis showed that starting salary expectations decreased significantly with each successful year of study. In addition, participants may have been sensitive to economic realities and therefore not overly optimistic about initial pay rates.

Differences in starting salary expectations were significant for the remaining four independent variables. Females expected lower salaries than males; participants from visible minorities had higher salary expectations than nonminority participants; participants with work experience expected higher salaries; and expected starting salary increased with each GPA value. While expected starting pay was approximately only $43,000 (Canadian), participants expected on average a 63% pay increase over 5 years, with a mean expected salary of $69,663 (Canadian) after 5 years of employment. All of the dependent variables were related to 4-year salary expectations and showed the same direction as for starting salaries across the variables.

Finally, the authors examined participants' ratings of work attributes in terms of importance. Participants ranked 16 items on a 5-point scale with 1 being *not at all important* and 5 being *essential*. Four of the variables received a mean rating of 4.41 or higher: opportunities for advancement (4.49), good people to work with (4.46), good people to report to (4.43), and good training opportunities/developing new skills (4.41). Other variables that had a mean higher than 4.00 included work-life balance (4.33), good health and benefits plan (4.32), good variety of work (4.23), job security (4.18), good initial salary (4.17), and challenging work (4.07). Ranking lower in importance were opportunities to have a personal impact (3.98), commitment to social responsibility (3.84), opportunities to have a social impact (3.82), employing organization as a leader in its field (3.65), strong commitment to employee diversity (3.58), and the least important attribute, opportunity to travel (3.46).

All dependent variables were significantly related to the set of 16 work attributes with a significant interaction effect between gender and visible minority. Minority women gave higher importance to opportunities for advancement than minority men. Yet, among the nonminorities, men placed a higher importance on advancement. While minority women placed a higher importance on work variety than nonminority females, the opposite was true for males, with male nonminorities rating work variety as less important than did their nonminority male peers.

The authors found significant differences between minority and nonminority groups for all the remaining variables except work-life balance, good health and benefits plan, and commitment to social responsibility. Minority participants ranked all of these variables of higher importance than their nonminority counterparts did with the exception of one: challenging work. Similarly, females gave higher importance to all 14 of the remaining work attribute variables than did their male counterparts. In all cases these differences were significant at $p < .001$. Differences in mean importance of work attributes were also found to vary by GPA, year of study, and prior work experience, although direction across all variables was inconsistent as it was for gender and minority status. A complete analysis of the relationship between GPA, year of study, and prior work experience with the 16 work attributes is provided in the article (pp. 287–88).

Overall, results show that millennials seem to fit the stereotypes that have been used to describe them in previous research. They have high career expectations resulting from their job-choice decisions. Their ratings of opportunities for advancement as very important and their expectations of rapid promotions and pay increases suggest that millennials may indeed be ambitious and impatient. Moreover, the lack of correlation between performance (as measured by GPA) and expectation for promotion may indicate that millennials feel a sense of entitlement. They may emphasize the social aspects of work because they rated "good people to work for" and "good people to report to" as highly important. This result, coupled with the expectation that participants did not expect to remain with their first job, may suggest that millennials may be more loyal to their colleagues and supervisors than to the organizations that employ them. Although some stereotypes about millennials were confirmed in the present study, the authors caution against "painting the entire generation with the 'same brush'" (p. 290) because they found significant differences in expectations and priorities across demographic lines.

Oropeza, M.V., Varghese, M. M., & Kanno, Y. (2010). Linguistic minority students in higher education: Using, resisting and negotiating multiple

labels. *Equity & Excellence in Education, 43*(2), 216–31.

Institutional labeling may affect students' access to and use of university resources and services. Employing the notion of "capital" as developed within critical race theory (Yosso, 2005), Oropeza, Varghese, and Kanno investigated how linguistic minority students use, resist, and negotiate labels when accessing university services and resources. In the present study, linguistic minority students are defined as immigrants (as opposed to visiting international students) who speak a primary language other than English at home and who may experience discrimination for being a nonnative speaker of English. The four participants for the present study, two permanent U.S. residents, one refugee, and one immigrant with U.S. citizenship, all female students attending Northern Green University (NGU), were interviewed as part of a larger study on linguistic minority students' perspectives on the transition to college and their experiences as university students. Participants for the original study were newly enrolled first-year or transfer NGU students. In addition to being U.S. residents, participants attended either a U.S. K-12 school or U.S. community college prior to enrolling at NGU. They were recruited from remedial English-as-a-second-language (ESL) classes and freshman composition classes for basic writers. (Detailed demographic information and brief biographies for the four participants in the present study are provided on pages 222–23 of the article.)

Oropeza et al. examined participants' use of six overlapping forms of capital: aspirational, familial, linguistic, navigational, resistant, and social. The first, aspirational capital involves planning beyond one's present circumstances and currently available possibilities, "even in the face of real and perceived barriers" (Yosso, 2005, p. 77). Aspirations emerged as a common theme in participants' interviews and were closely associated with familial capital, defined as knowledge gained through family ties. Participants saw attending college as their responsibility, duty or hope, and often as an expectation placed on them by parents and relatives. According to the participants, attending college in the United States allowed for greater opportunities and social mobility than was generally possible in their home countries. For at least one of the participants, her family had decided to immigrate primarily because of the desire to provide her with better educational opportunities.

As with aspirational and familial capital, social and navigational capital relate to each other. Social capital refers to the network of people, including institutional personnel, from whom minority students seek information and emotional support, while navigational capital involves the skills minority students employ in maneuvering through social institutions.

None of the four participants attended college-focused high schools. Nevertheless, all four participants were able to use different forms of social capital to help them attend college. Two participants learned about the college application process from family or friends, converting social capital into navigational capital. The other two found mentors in their high school. One, Elena (pseudonyms were used throughout), was labeled in high school as a "school kid." Teachers and peers encouraged her to attend college and she was able to procure a scholarship. Mickey, by contrast, had the opposite experience. Although she earned good grades in high school, her linguistic- and racial-minority status contributed to the assumption that she would be unsuccessful in honors classes. However, when she learned about the high school resources and personnel to help her get into college, and only after developing rapport with the high school counselor, Mickey sought help for obtaining a college scholarship.

While labels such as "school kid" and "English language learner" (ELL) influenced participants' access to and use of social and navigational capital in high school, labels at the university were even more abundant and alternately advantageous and disadvantageous. For example, through her designation as a transfer student, Shila gained knowledge of university resources (navigational capital) through a course required of all transfer students. However, no one pointed out special provisions or services available to her or another participant with respect to their designation as commuter students. Three of the participants, labeled as ELLs, due to their noncitizenship status and limited English proficiency, were required to take remedial ESL courses, which focused exclusively on the development of academic literacy and did little to advance their navigational capital. They also resented the $1,000 fees for these courses, thus creating resistant capital, defined as "minority individuals' ability to challenge the status quo by resisting negative stereotypes and labels and claiming counter identities of their own" (p. 220).

Elena resisted not only the label ELL, but also her eligibility for educational opportunity programs (EOPs) because she felt no more disadvantaged than her American peers and she did not take

advantage of the navigational and social capital that may have been available to her through the university's EOP, refusing all such services. Ironically, Mickey, who wanted to use EOP services, was almost denied them because an EOP advisor assumed that Mickey was an ESL Student and, therefore, ineligible for them. Only after Mickey, unfamiliar with the term ESL, challenged the denial of services did the advisor discover that Mickey was a diversity scholar (another label) and, therefore, eligible for EOP.

Multilingualism was simultaneously an asset and a barrier for the participants. On the one hand, linguistic capital, or ability to communicate in one's native language, served to strengthen bonds with family members. That is, linguistic capital connected to familial capital, which in turn, opened access to aspirational and navigational capital. On the other hand, participants did not believe the university valued their multilingualism. Linguistic minority status was treated as a lack of linguistic capital or a deficit to be remedied by mandatory ESL courses.

All but Elena (who had rejected EOP services), discussed the disadvantages of being an ELL. They felt that belonging to a linguistic minority group and the unfamiliarity with U.S. culture lessened their access to information (social and navigational capital) about educational opportunities. One student noted that even with sufficient information, her ELL status limited the types of programs in which she could enroll. In other words, lack of English proficiency reduced her aspirational capital. Elena, the only participant of European descent, by contrast, downplayed the disadvantages of her ELL status. Her Whiteness meant that she was not automatically cast as a foreigner. Furthermore, unlike her non-European peers, Elena did not experience dismissal as a less capable student due to her accent.

The authors concluded that labels given to students and the categories into which students are placed affect not only how these students are perceived, but which services are made available to them and the capital that they access as they navigate their way into and through college. In some cases, as in the commuter student classification, labels did not carry any capital. In other cases, labels conflicted with students' self-perception, as in the case of Elena who denied being disadvantaged and who exhibited strong resistant capital. Finally, multiple labels may be treated as mutually exclusive, causing confusion about services students may access, as in the case of Mickey and her EOP experience.

Oropeza et al. proposed that to fully understand how linguistic minority students experience college, practitioners must understand the complexity of linguistic minority students' identities and the ways they employ different forms of capital to navigate university policies and practices. They further call for "additive university practices and policies that reflect the richness of linguistic minority student identities" so that these students can be "truly valued" and so that their experiences in higher education can be improved (p. 229).

Schaefer, J. L. (2010). Voices of older baby boomer students: Supporting their transitions back into college. *Educational Gerontology, 36*, 67–90.

The enrollment of adult learners at degree-granting institutions increased 286% from 1970 to 2005 and is expected to continue growing (National Center for Educational Statistics, 2008). While universities have begun to pay more attention to them, adult learners continue to be underserved in many institutions of higher education, which are geared toward traditional-aged students. To gather information about appropriate actions and strategies for supporting adult students, Schaefer conducted a phenomenological study of older baby boomers (OBB), defined as university students aged 50 to 62 years. Schaefer's study, which focuses on degree-seeking older students, fills a void in the literature that traditionally has been concerned with adult students seeking noncredit and informal education as opposed to for-credit, formal education. Schaefer investigated the past experiences, family influences, and future aspirations that prompted the OBB students to seek a degree in higher education as well as the types of support they received and needed to make the transition to college.

Data from semi-structured interviews with OBB students, selected through purposeful sampling to allow for rich data, currently enrolled or who had recently graduated from a bachelor of general studies (BGS) program at a midwestern university, informed the study. Two 90-minute, face-to-face and one 30-minute (a total of three) interviews were conducted with each of the participants. Interviews were audio taped and transcribed verbatim. Participants also completed a reflection questionnaire. Further data were gathered through an archival review of the BGS program requirements. Schaefer also employed document analysis and interpreted findings using Schlossberg's transitional model (Schlossberg, Waters, & Goodman, 2006).

The participants initially consisted of five males

and five females, but one withdrew from the study due to the death of her husband. Demographic profiles for each participant (pseudonyms were used) are provided in a table, including their birth year, their current employment status and position title, family members in their immediate family, school in which each concentrated within the BGS program, and whether participants aspired to a graduate degree. Further demographic information included the educational history of the participants' parents, siblings, and spouses.

The OBB participants in this study were mainly first-generation college students. One student's father had completed two bachelor's degrees. One participant's mother had completed a bachelor's degree and a third student's mother had completed some college. The remaining participants' parents had not attended college. Two participants were children of parents who had not completed high school, and in one case, one parent of a participant had not completed high school.

Although participants reported that K-12 education had been emphasized in their households as they were growing up, only two stated that their parents had encouraged a college education, and in one case, the message was mixed, with the father emphasizing college education and the mother not doing so. Most participants' parents perceived college to be a fairly unaffordable luxury, with a number of participants' parents pushing working in a trade over attending college. Participants' high school counselors likewise did not encourage college attendance. In addition, eight of the nine participants reported having had a negative K-12 educational experience due to social isolation, poor academic performance, or underachievement.

All of the participants were attempting a return to college. That is, they were "moving in" again, a term Schaefer borrowed from the Schlossberg et al. (2006) framework, which states that surrounding situations impact transitions. Each participant in the study identified key events that led them to return to school. Two of the female participants enrolled for personal fulfillment after their offspring had grown up and left home; five had returned due to job loss or lack of success in being promoted; two had decided to go back to college after retirement. A number of the participants felt the "timing was right for enrolling as an older adult student," but as Schaefer noted, most returned, in part, due for career advancement (four participants) or change (three participants).

Although all of the participants had attended college in the past, a lack of knowledge of or mis-

information about higher educational processes persisted. Difficulties included troubles with logistics, such as how to register and access resources such as the library and parking. Program requirements likewise frequently confused students. Some had not expected requirements to have changed since their last period of attendance. One did not understand that designations such as *junior* and *freshmen* reflected course labeling conventions and thought they meant that enrollment was restricted according to one's class rank (freshman, sophomore, junior, senior). Still others did not understand the degree they were earning, confusing their BGS concentration with other bachelor's degrees in their concentration area. One student was confused by the term "residency requirement" believing that she had to meet this requirement by taking a certain number of courses on site rather than via distance learning.

According to Schlossberg et al. (2006, p. 82), "an individual's ability to cope with transitions depends on the changing interaction and balance of his or her assets and liabilities." Schaefer found experiencing a supportive environment (an asset, with the lack of support being a liability) was key for the participants because the transition back to college was accompanied by stressors such as having to delay until children and spouses completed college, needing to limit time spent with family so that attention could be given to studies and assignments, and financial concerns related to paying for college or needing to return to work to earn money.

Participants' family members provided needed affective support and affirmation, very often serving as educational mentors. For some respondents, their own children who had attended college performed this role. By contrast, two participants experienced lack of spousal support, and another regretted not having a spouse or close friend with whom to share her college experiences. Schaefer was surprised that many participants reported receiving affective support from their traditional-aged college student peers and feeling a sense of solidarity with them. Participants found affirmative support from faculty members in many instances, not only due to faculty members' willingness to help them, but also through moral support and friendship that they extended. Some noted that faculty seemed to appreciate having older students in their classes.

Participants recognized advisors frequently for their ability to provide information and assistance. They especially appreciated being able to contact advisors by phone or e-mail. However, one partici-

pant reported switching advisors because he felt his first one did not know how to address the needs of adult students. Other forms of aid that participants reported needing included time for school work, flexible school (and work) schedules, financial assistance, work credits, and online offerings.

Based on the observations from the data, Schaefer makes several recommendations for creating an "adult-friendly higher education environment" (p. 86). First, she calls for a "structured experience," similar to first-year experience programs for traditionally aged students, that would familiarize adult students with educational processes. Suggested topics from participants themselves included orientation to web-based courses and electronic course registration; how-to sessions on academic writing, including library research; referrals to various academic support units; tailored course sequencing and degree planning; and a peer-support phone system in which participants could ask questions of experienced peers. A second set of recommendations relates to assistance with career planning and development needs, such as assessment and exploration resources, internships and shadowing, information about continued credentialing, and workshops related to different aspects of the job search including preparing a résumé and interviewing. A third way to provide an adult-friendly environment proposed by Schaefer involves the provision of avenues for informal mentoring through different interest groups in which OBB students could serve both as mentors and mentees.

Vuong, M., Brown-Welty, S., & Tracz, S. (2010). The effects of self-efficacy on academic success of first-generation college sophomore students. *Journal of College Student Development, 51*(1), 50–64.

"Sophomore slump" (Feldman & Newcomb, 1969) designates sophomore students' dissatisfied with the college experience as a result of their struggles to achieve competence, become autonomous, establish their identity, and develop purpose (Flanagan, 1991; Lemons & Richmond, 1987). Many university administrators may operate under the assumption that freshmen who successfully complete the first year are no longer in need of extensive support services. Yet, attrition rates among college sophomores are considerable. First-generation sophomores, in particular, may be less likely to persist; prior research shows higher drop-out rates among first-generation college students in general (e.g., Hoffman, 2003; Ting, 2003). First-generation students are those whose parents did not complete a bachelor's degree (neither par-

ent) or who resided with and were supported by a single parent who did not earn a bachelor's degree (Higher Education Act of 1965, Sec. 402B[6] g1[a]). To better understand the phenomenon of the sophomore slump, Vuong, Brown-Welty, and Tracz investigated the relationship between self-efficacy and academic success of sophomores enrolled at five institutions in the California State University (CSU) system.

The study population consisted of 6,316 second-year students enrolled at one of five CSU universities, all of which provide on-campus housing. Participating institutions included one small rural campus (total enrollment = 8,374), one small urban campus (total enrollment = 7,800), one medium-sized suburban campus (total enrollment = 12,535), one medium-sized urban campus (total enrollment = 20,371), and one large urban campus (total enrollment = 33,243). All second-year students registered for at least 12 units per term at one of these CSU universities were invited by e-mail to complete the *College Self-Efficacy Inventory* (CSEI) (Solberg, O'Brien, Villareal, Kennel, & Davis, 1993), which was available online 24 hours per day for 2 weeks. Reminders were sent every 2 days and a final notice was sent on the last day the survey remained available. The overall response rate ($n = 1,291$) was slightly more than 20%.

Self-efficacy is defined as an individual's perceived capability in performing necessary tasks to achieve goals (Bandura, 1997) and college self-efficacy (Solberg et al., 1993) is the degree of confidence students have in their ability to perform college-related tasks to produce a desired outcome such as passing a test. Various studies show links between self-efficacy and academic success. In the present study, Vuong et al. sought to determine whether first-generation sophomores' academic success, as measured by four variables—self-reported prior term GPA, self-reported overall GPA, reported likelihood of completing the current term, and reported likelihood of returning the next term—is a function of self-efficacy. Furthermore, they ascertained possible differences in academic success and persistence rates between first-generation sophomores and those with a family history of college experience (henceforth called *second-generation*). Third, they examined possible differences in self-efficacy between gender and ethnic groups and looked at levels of self-efficacy per campus size.

The *College Self-Efficacy Inventory* consists of two parts; the first collects demographic data, including the variables under study: gender, eth-

nicity, prior term GPA, overall GPA, and intent to persist in the current term (P current) and in the following term (P following). The second part of the instrument measures academic self-efficacy using a 10-point Likert rating. It includes three self-efficacy subscales: self-efficacy in academic course work (SE course); self-efficacy in interactions with faculty members, counselors, and peers (SE social); and self-efficacy in relationships with roommates (SE roommate).

With respect to self-efficacy and the four dependent measures of academic success—prior GPA, overall GPA, P current, and P following, results showed that SE course could be used to predict the four dependent variables, while SE social could not and the predictive power of SE roommate only applied for previous term GPA and P following. Hotelling's T^2 showed no significant differences in overall self-efficacy between first- and second-generation students, while independent t tests showed no significant differences between the two groups on any of the three subscales.

As far as differences in academic success levels of first- and second-generation students, second-generation sophomores reported higher mean GPAs for the previous term and higher overall GPAs. These differences were significant at $p < .001$. Second-generation sophomores reported a higher likelihood ($p = .051$) of persisting in the current term although differences in likelihood of returning in the following term between the two groups were not significant.

For the third research question, self-efficacy was the dependent or outcome variable, and gender and ethnicity were the independent variables. No significant effects were found for gender on self-efficacy, but students' ethnicity demonstrated significant effects on self-efficacy overall and on each of the three subscales (SE course, SE social, and SE roommate). Interaction effects of gender and ethnicity were not significant.

In regard to the final research, the authors found no significant differences in overall self-efficacy by institution size. Univariate one-way analyses of variance showed significant differences for only one subscale variable, SE roommate, with the medium-sized universities having the highest mean ($M = 8.29$ out of 10), the large university having the lowest ($M = 7.78$), and the small campuses falling in between ($M = 8.06$).

Vuong et al. concluded that higher education stakeholders should understand predictors of persistence, particularly those that pertain to first-generation college sophomores. They recommend high quality curricula that present doable challenges and provisions for social support from peers and faculty members. They also suggest that resources be allocated to programs specifically designed for sophomore students to enhance their self-efficacy perception, which in turn, may have positive effects on their academic success.

Walmsley, A., Wilson, T., & Morgan, C. (2010). Influences on a college student's major: A developmental perspective. *Journal for the Liberal Arts and Sciences, 14*(2), 25–46.

Selecting a major can be a stressful experience for college students as they may lack both information about possible majors and self-awareness of their interests, skills, and abilities. However, the literature shows repeatedly that two services designed to help students with this choice—academic advising and career services—often fall among the factors that least influence students' choice of major. Using Super's (1957) theory of vocational development and Zucker's (2002) applied concepts of career counseling as frameworks for guiding the research, Walmsley, Wilson, and Morgan conducted a qualitative study, through focus groups, of college students' major-selection process to gather practical information for academic advisors and students.

Students who entered the university as undecided freshmen and those who had changed majors from the one declared in spring 2009 met criteria for inclusion in the focus groups. Fifty-three of the 812 students who were invited participated in the study. In all, trained facilitators, with graduate student assistants as observers, conducted five focus group sessions. Meetings, which lasted around 1 hour and 15 minutes, were audio recorded and transcribed verbatim. Data were then analyzed for common themes related to the development of self-concept (Super, 1983), which, in turn the authors maintain, influences choices about academic major.

Data revealed that relationships with family members and peers as well as faculty members and participation in extracurricular experiences played essential roles in students' development of self-concept and choice of major. Family members, especially parents, supported their children's decisions, in most cases encouraging them to follow their interests. Some students reported feeling pushed toward or away from certain majors by their parents, and one student reported that his parents would only pay for college if he majored in pre-med. However, regardless of the outcome,

most of the participants welcomed their parents' advice. While parental influence was salient, peers and siblings most often contributed to participants' decision-making by acting as "information brokers" (p. 32); that is, they shared their knowledge of and experiences in academic programs.

In the same way that students sought the support of their family and peers, they also looked for support from the faculty. One participant explained that he made the decision to major in chemistry over biology after comparing his experiences in two departmental open houses. He opted for chemistry because all six of the professors with whom he spoke at the open house in the chemistry department discussed their research with him and asked about his interests and plans. Another participant related her difficulties in changing majors after having bonded with all the faculty in one department and then moving to a new one where she felt she would not get to know all of the professors. Faculty enthusiasm for their subjects also mattered to participants as well as their ability to explain the nature of the real world for graduates in their major.

In addition to relational resources, experiences—especially internships, study abroad, and research—also played a key role in helping students develop their self-concept and make decisions about academic majors. Most internships were positive experiences during which students explored and validated interests while at the same time gaining valuable "professionalism skills" (p. 39). However, some students changed majors after discovering that they did not like the type of work required in the internship. One participant, after a negative first internship experience, changed his major and then participated in a succession of positive internship experiences in his new major. Study abroad experiences, in turn, were often "life changing" (p. 40). One student discovered her calling through a semester abroad in El Salvador and another changed his major to Spanish when he realized during a study abroad experience in Spain that he was passionate about the language. Undergraduate research experiences also turned out to be influential in major selection or crystallization, as happened with a student in chemistry who solidified his choice of major while he was participating in a collaborative research study between the department of chemistry and his institution's medical school. Another decided to major in investigative medical science after working on a research project with her professor in Haiti.

Walmsley et al. conclude that students consult family, friends, peers, and faculty members but generally do not ask academic advisors for help with major selection, duplicating findings of previous studies. In their view academic advisors are an "under-utilized and under-considered resource" (p. 44).

They suggest that students become familiar with Super's (1957) theory to determine their own stage of development. If students discover that their self-concept is not fully developed, they should participate in experiential and reflective activities to build their self-concept, such as taking advantage of introductory courses and extracurricular activities to gather information and by journaling. Students with stronger self-concept might seek out professionals and faculty members in fields that interest them to learn more about the suitability of potential fields related to the major.

They also suggested that students seek out their academic advisors. At least one participant cited that lack of relationship with an advisor as the reason for not discussing her change of major with one. She opted, instead, to talk to her parents because she felt she would get better results consulting with people who knew her: "Obviously an advisor has my best interest but they don't know you" (p. 30). The authors recommend that students establish relationships with advisors, that they come to appointments prepared to talk about vocational goals (or lack thereof), that they be willing to accept suggestions regarding self-exploration and resource exploration, and that they be open to creating a "partnership with the advisor that will be growth-oriented and productive" (p. 43).

As for advisors, Walmsley et al. propose an approach similar to Zunker's (2002) application of Super's (1957) theory of vocational development. Advisors should determine the student's developmental stage and whether the stress level at that stage is impeding the decision-making process. After that, advisors should identify the student's resources for making vocational decisions. With gathered information on a student's current stage of development and knowledge, advisors can help the student identify a major that is most congruent with the student's self-concept.

To foster strong relationships, advisors need to communicate their care and willingness to offer support to students. Once a bond has been established, advisors can continue to reinforce the student's self-concept while guiding them to think about experiences that will help them settle on an appropriate choice. Because data in the present study revealed that students often make use

of their learning experiences such as internships, study abroad, and research to aid in the selection of a major, advisors can suggest experiences compatible with students' self-concept. The authors expect that these relationships with students will prompt advisors to enhance their existing resources and increase their willingness to experiment with new ways to challenge and support students with whom they have developed rapport. The authors conclude by reminding readers that the goal is not to eliminate the struggle that students undergo when selecting a major, but rather to help the student grow from the experience through knowledge, support, and affirmation.

The bibliography is compiled by Jessie Carduner.