ASSESSING STUDENT LEARNING AND DEVELOPMENT IN FRATERNITY AND SORORITY AFFAIRS

Terrell L. Strayhorn, Ph.D. and Amy J. Colvin

Assessment in higher education has increased over the past several decades. Pressure from constituencies for colleges to demonstrate their effectiveness in measurable terms and loss of public trust in higher education drive the movement toward assessment. Presently, assessment is part of the accreditation process. Student affairs practitioners, including those working with fraternities and sororities, are not immune to these pressures. Yet, many student affairs professionals report feeling inadequately skilled in conducting assessment projects and need guidance in this area of their work. The purpose of this manuscript is to discuss the importance of assessment and how it relates to fraternity/sorority advising. In addition, the article highlights the ways in which assessment can be used to demonstrate student learning and development resulting from fraternity and sorority involvement.

Assessment as practice for fraternity and sorority professionals is often perceived as an amorphous and daunting task; but it does not have to be such. Not only can assessment be easy but also one can assess the impact of fraternity and sorority involvement on student learning and development in college. The purpose of this article is to discuss the importance of assessment and how it relates to fraternity/sorority advising work. In addition, the article highlights the ways in which assessment can be used to demonstrate student learning and development resulting from fraternity and sorority involvement. Interviews with constituents of a large fraternity and sorority community provide insight into the experiences of members. How one can use practical methods and assessment tools that are available are discussed through an examination of sample case studies.

Problem Statement
Today's educators operate in an assessment driven environment. Diminishing resources from state and federal governments and calls for greater accountability are driving the assessment movement in higher education. In addition, state legislatures and local community members champion the call for assessment to justify state allocations to colleges and universities and to demonstrate institutional efforts in terms of outreach and economic development. Furthermore, parents and students, albeit unknowingly, support the need for assessment as a way of giving reason for the costs of college and recent dramatic increases in tuition (Angelo, 1997).

The erosion of public trust and confidence in higher education are two of many factors driving a "culture of evidence" (Giegerich, 2006) in higher education. Far too many examples exist of recent college graduates who can barely demonstrate the basic requirements for literacy and math (Bloom, 1987; Hersh & Merrow, 2005; Read, 2004). This results in citizens and employers feeling as if higher education fails to do what it purports - to educate individuals who are prepared for work and participation in a democratic society. In addition, as mentioned above,

parents and students often point to the rising costs of college and falling rates of returns (e.g., enrollment, graduation, employment, etc.) as a source of their dissatisfaction with higher education.

Finally, assessment is an integral part of institutional accreditation. For many national and regional accrediting organizations, outcomes assessment is an integral part of the accreditation process (Upcraft & Schuh, 1996). For example, the Southern Association of Colleges and Schools requires all institutions applying for accreditation to develop a quality enhancement plan (QEP). Then, the Commission on Colleges sends a team on campus to assess the quality of educational programs at the institution. Thus, assessment is part of accreditation processes.

In light of these factors, not only is the need for assessment made clear but it seems even clearer that assessment is here to stay. The demand for assessment is recognized by many internal constituencies of a college or university including faculty members, upper level management, and campus administrators. For example, academic administrators are called upon to evaluate faculty performance in teaching, research, and service (Centra, 1979; Kasten, 1984). Still, another group is influenced by the media for a culture of evidence, namely student affairs administrators (Upcraft & Schuh, 1996). However, many student affairs professionals report feeling inadequately skilled in conducting learning outcomes assessments and need more guidance in this area of their work (Bauer & Hanson, 2001). This is particularly true for those who work in functional areas that seem tangentially related to the academic mission of the university such as fraternity and sorority advisors.

Review of Literature

In recent years, assessment has been used in various campus settings. For example, Angelo and Cross (1993) described classroom assessment techniques that can be used by college teachers to measure the impact of various teaching strategies. The authors suggested that assessment should be learning-centered and thus our practices should encourage students' development of skills, abilities, and knowledge across a range of domains.

Assessment can also be used in student affairs as a way of measuring program effectiveness and college impact. In the past, student affairs professionals made evaluations of their performance, student satisfaction, and even institutional effectiveness based on incomplete data, hunches, and intuitive feelings. Given the variety of techniques and methods available today, making such judgments based on "gut feelings" is no longer necessary or sufficient (Erwin, 1991).

In response, Upcraft and Schuh (1996, 2000) called for the use of assessment in student affairs as a way of measuring the impact of college on students and quality of student services. In their terms, assessment is "any effort to gather, analyze, and interpret evidence which describes institutional, departmental, divisional, and agency effectiveness" (1996, p.18). Assessment has also been used as a way of promoting strategic planning and facilitating institutional research. In fact, Erwin (1996) points out that assessment is the "systematic basis for making inferences about the learning and development of students."

Even as an important and essential component of student affairs, many practitioners report feeling inadequate or incapable of conducting high quality professional assessment studies (Bauer & Hanson, 2001; Erwin, 1991; Strayhorn, 2006; Upcraft & Schuh, 2000). Many indicate feeling intimidated by the demand for scientific rigor and inferential statistical techniques. In fact, the need for high-quality assessment was presented at several national meetings by the lead author on this article, and findings were the same (Strayhorn, Creamer, & Miller, 2005). Academic and student affairs administrators, stressing concerns about using t-tests, stratified sampling methods, and randomized experiments, seemed to cover most ears and block out the take home message - assessment can be easy.

Before one can understand how to assess educational programs, it is necessary to distinguish assessment from research and evaluation. Research refers to empirical scientific studies designed to uncover new information and new knowledge about a particular topic. Research emphasizes the ability to test hypotheses (Neuman, 1994). Evaluation, on the other hand, is a way of measuring the success of a program or activity. It implies a "looking-back" orientation that takes place after a program or activity has ended. Assessment, however, refers to a "check in time" or a way of measuring the status of a program and/or the current outcome of education. Assessment is often used for program improvement and quality assurance (Bogdan & Biklen, 1992; Strayhorn, 2006; Upcraft & Schuh, 1996).

Assessment can be used in other ways, including the assessment of student learning and development (Erwin, 1991). Assessment is a process and requires a significant investment of time, energy, and resources. Assessment yields a wealth of information for educators who are concerned about the impact of college on students, improve processes in terms of efficiency, and evaluate programs in terms of effectiveness.

Assessment projects require detailed plans. Assessment plans refer to the formative aspects of an assessment project. Objectives are formed and outcomes are identified during the planning process. This step is often referred to as the strategic planning cycle and is often the most time-consuming step of the assessment process (Erwin, 1991; Strayhorn, 2006).

Part of this process includes identifying a sample, selecting an appropriate method for collecting data, and choosing an analytical technique (Creswell, 2003; Neumann, 1994). There are many ways to collect data once an appropriate sample has been identified. First, professionals are encouraged to determine an appropriate methodology (e.g., quantitative, qualitative, or mixed method). Rather than viewing these methods as separate worlds, they should be considered as different paradigms or ways of knowing (Strayhorn, 2006; Upcraft & Schuh, 1996). In a quantitative sense, one might consider using instruments available in the public domain or locally developed surveys to gather information. In a qualitative approach, one might use interviews, focus groups, or historical methods to obtain data. Regardless, the approach should be warranted by the research or assessment questions. Good sampling techniques lead to good methods, and both allow for good analysis.

Analytical techniques that might be considered for use in assessment range from simple descriptive statistics to multivariate statistical tests and multi-level modeling. Again, the technique is warranted by the assessment question and influenced by the sampling and data

collection methods. Choosing an appropriate technique for data analysis can be a complex process and may require the advice of trained social scientists or institutional researchers (Bauer & Hanson, 2001; Upcraft & Schuh, 1996).

Educators are strongly encouraged to use collaborative approaches to measuring the impact of various programs on students' learning. For example, those who work in fraternity and sorority affairs might collaborate with graduate students and/or faculty members in college student personnel programs to investigate the nature of fraternity and sorority involvement and its influence on learning in college. Practitioners might also collaborate with individuals who are in fields other than education including, but not limited to, faculty members in sociology, anthropology, women, and gender studies. Each lens brings much needed information and insight on fraternity and sorority affiliation. In addition, graduate students and faculty members may bring a much-needed level of expertise to the project.

In sum, all educators should be concerned with measuring the effects of educational programs, activities, and other experiences on students' learning and development in college. Those who work in academic affairs tend to pay attention to the influence of teaching techniques and student evaluations (e.g., tests, exams) on how much students learn and change over the college years. Likewise, persons in student affairs tend to be involved in measuring the effect of student services on what a student gains from college (Miller, 2003; Strayhorn, 2006). Considering their shared focus on student learning and development, collaborations between academic and student affairs are possible.

To accomplish their mission, offices of fraternity and sorority affairs adopt a variety of goals and objectives. Goals and objectives are often closely related to educational outputs and tend to identify specific student learning outcomes including promoting the intellectual, social, recreational, moral, and career development of students, providing training in leadership and other personal and social skills, promoting student involvement in co-curricular activities recognize the sponsorship of and participation in community service projects, creating positive educational outcomes, fostering an appreciation for different lifestyles and cultural heritages while recognizing their common values and creating powerful relationships to forge community on campus (AFA, 2002).

The statements and goals above suggest that student affairs administrators who work with fraternities and sororities strive to foster environments and sponsor programs and services to, among other things, develop leaders, maintain strong relations, and promote appreciation for diversity. Yet, much of the literature on fraternity and sorority life has focused on the negative effects of fraternity and sorority involvement. For example, one line of inquiry highlights the relationship between alcohol abuse (Shonrock, 1998; Tampke, 1990; Wechsler, Kuh, & Davenport, 1996), hazing (Hennessy, 1998; Kuh, Pascarella, & Wechsler, 1996), poor academic achievement (Pascarella, Flowers, & Whitt, 2001), and being involved in a fraternity or sorority. Another line of inquiry investigates the rate of occurrence of gambling among fraternity and sorority affiliated students (LaBrie, Shaffer, LaPlante, & Wechsler, 2003; Rockey, Beason, Howington, Rockey, & Gilbert, 2005). From this body of literature, several conclusions have been drawn. For example, fraternity and sorority students were more likely to be involved in gambling activities than their counterparts. Rockey, Beason, Howington, Rockey, and Gilbert

(2005) suggest that there exists a significant relationship between "pathological gambling" and being involved in a fraternity (p. 80).

Conversely, there is research that supports the positive effects that fraternity and sorority involvement can have on students. Fraternity and sorority affiliation has been associated with increased levels of satisfaction with college (Pennington, Zvonkovic, & Wilson, 1989; Pike & Askew, 1990) and intellectual development (Pascarella, Flowers, & Whitt, 2001). Astin (1975) found support for the relationship between persistence in college and higher degree attainment for fraternity and sorority affiliated students. Still others demonstrate that fraternity and sorority involvement is related to outcomes such as teamwork and group functioning (Pike & Askew, 1990).

Despite the handful of studies mentioned above, there is still a paucity of research on the positive outcomes of fraternity and sorority involvement on other college-related outcomes. More research needs to be conducted to provide evidence of the effect of fraternity and sorority involvement on college students in terms of interpersonal skills, leadership abilities, and effective communication. These same studies could be used to defend the existence of fraternities and sororities. This is important and timely given recent trends that result in the removal of entire fraternity and sorority communities or individual chapters from campus (Denizet-Lewis, 2005; Hoover, 2005).

In fact, it is increasingly necessary for student affairs professionals who work with fraternities and sororities to demonstrate the worth of their work and the impact of their services on students' learning and development in college. A review of the literature reveals that there is scarce research on the effect of fraternity and sorority involvement on students' learning and intellectual development in college. A handful of studies discuss positive outcomes of involvement in fraternities and sororities. However, other studies underscore the relationship between involvement in fraternities and sororities organizations and alcohol abuse, hazing, academic dishonesty, and gambling. Most extant research is of the second order.

Little research has been conducted on the use of assessment in specific functional areas of student affairs, such as fraternity and sorority life. This is troubling given the fact that student affairs professionals who work with fraternities and sororities are expected to promote learning and development in the students with which they work. Many offices of fraternity and sorority affairs emphatically state that they enhance the learning and development of students with little data to support such a claim. Thus, student affairs professionals who work with fraternities and sororities need additional guidance about how to conduct learning assessment within their specific domain and how to report their findings in a logical and useful way.

Methodology

To collect information about educators' perceptions of the assessment process as it relates to fraternity and sorority affairs, we interviewed six individuals connected with the fraternity and sorority community at a large research institution in the southeast. We used purposeful sampling to ensure that our participants were affiliated with or worked with fraternities and sororities. As

Patton (1990) remarked, we wanted "information rich" participants who had experience and knowledge that would inform our research (p.169).

As with many qualitative research investigations, this study had a limited number of interview questions. First, participants were asked: What, if anything, do students gain from their involvement in fraternities and sororities? As a follow up, participants were asked to describe how such gains could be measured or ascertained. Additional probes were used when necessary to clarify meanings and experiences.

Next, we examined fraternity and sorority mission statements from 25 randomly selected universities in the northeast and southeast regions of the United States. Using a form of document analysis (Whitt, 1992), we scanned mission statements for language about skills or educational outcomes that students should gain from their involvement in fraternities and sororities. For sake of reporting, we have labeled institutions as Institution A through Institution Y using a unique letter between A-Y for each of the 25 institutions.

Finally, we selected an instrument to use in our assessment examples. Numerous instruments exist for assessing student learning and development. In an effort to provide specific examples for this case study, we reviewed numerous instruments and found the Sentence Completion Test (SCT) (Loevinger, 1996) was the best to use due to its applicability to learning outcomes assessment and the fact that it is available to researchers in the public domain.

The SCT consists of 36 items designed to measure one's frame of reference and can be used to assess student learning and development, measuring ego development and social responsibility, operationally defined for this study as moral development, interpersonal relations, and conceptual complexity (Loevinger, 1998). The SCT correlates answers to open-ended responses such as "My conscience bothers me if…" and "Being with other people…" with seven stages of ego development. Data were analyzed using multiple analysis of variance (MANOVA) tests on each subscale of interest, such as "self-awareness" and "conscientiousness," to test for significant differences between the control and study groups.

Examining Assessment in the Fraternity and Sorority Communities

Consider the following mission statements of two fraternity and sorority affairs offices:

> The mission of the Fraternity/Sorority Community at [Institution A] is to foster a richer undergraduate experience while developing leaders in the arenas of academics, service, social interaction, and athletics. Furthermore, the Fraternity/Sorority Community will maintain strong inter-fraternal and campus relations within the diverse [Institution A] community while promoting the ideals of Brotherhood and Sisterhood. [University in the Northeast]

> The mission of the Office of Fraternity/Sorority Life at [Institution B] is to enhance student development through involvement in fraternal organizations. We strive to foster positive relations with the administration, faculty, and between the various organizations to encourage a unified campus community. Students are encouraged to place equal emphasis on the philanthropic, educational, personal development, and social aspects of membership in a fraternal organization. The overall Fraternity/Sorority Life mission is to complement the mission of [the university]. [Private 4-year institution]

Many believe that fraternity and sorority involvement is associated with positive outcomes in college as well. While less empirical evidence is available to support this hypothesis, anecdotal evidence implies such a relationship. For example, we interviewed several individuals who work with or are members of fraternities and sororities who talked about such positive effects. A director of fraternity and sorority affairs at a research institution said, "I know that being involved in Greek Life results in positive enhancements in terms of students' skills and abilities. I am less clear on how to document that effect." A student who is a member of a sorority said, "Involvement in a Greek lettered organization in fact does have a positive effect on college students. Students involved in fraternities and sororities develop leadership and strong interpersonal skills." These statements also demonstrate that there is little or no wisdom about how to measure the effect of involvement in fraternities and sororities.

Still, additional anecdotal accounts abound. A graduate assistant for student learning noted that, "Involvement in Greek organizations [sic] exposes students to various social and leadership skills like community service, planning, assertiveness, and ability to complete a task. Such involvement fosters a strong sense of volunteerism." All of these are clear examples of desired educational outcomes, but guidance about how to measure the influence of fraternity and sorority involvement on students is in short supply. In fact, a faculty member said this: Unfortunately, while I intuitively 'know' that Greek affairs makes a difference in student outcomes, I am not aware of specific research that details that difference by focusing on just the contribution of Greek involvement separately from other influences on student outcomes. It seems that lots of information exists on the negative aspects of Greek involvement, but I am lost when it comes to collecting evidence of the positive aspects.

Fraternity and sorority advising is a functional area with many programs and services. For example, typical fraternity and sorority life offices sponsor a large number of activities to achieve the goals outlined in their mission statements (AFA, 2002). These activities range from leadership retreats, service projects, leadership classes, and new member retreats. A more specific example is "Greek Week," which is a week of many activities that are designed to promote unity between and within fraternal organizations and to support the four pillars of leadership, service, scholarship, and brother- or sisterhood (Whipple, 1998). Fraternity and sorority councils, under the supervision of their advisors, bring speakers to campus to address current topics that relate to student life and host philanthropic events to raise funds for community needs, to name a few.

Each program is associated with specific learning outcomes. While this may not be obvious to all readers, the goals and objectives of fraternity and sorority life programs are directly related to measurable skills and abilities, defined as outcomes. For example, awareness of community needs and commitment to outreach are goals of activities such as hosting philanthropic events and completing service for the community. Additionally, the ability to work on teams and developing interpersonal relationships are associated with attendance at retreats, service on a council, and participation in a fraternity and sorority leadership class.

Student outcomes are an integral part of the assessment of learning and development. In fact, when planning assessment projects, one should first think about the outcomes associated with a particular activity. Then, consider the ways in which data can be collected to determine if the

outcomes were met. To this end, one might develop a survey or create an interview protocol. On the other hand, consideration might be given to using an instrument available in the public domain such as the College Student Experiences Questionnaire (Pace, 1984) or the Student Leadership Practices Inventory (Kouzes & Posner, 1998).

When determining a method of collecting data, in general there are two approaches to conducting research - quantitative and qualitative methods. Quantitative studies employ numbers and symbols to represent the relationship between independent and dependent factors. In short, quantitative or empirical studies place a premium on objectivity, generalizability, and validity (Neumann, 1994; Pedhazur, 1990). Consider the following example:

Dr. Alpha Life is Director of Fraternity and Sorority Affairs at Town University (TU). TU is a large, public state institution with a total enrollment of over 20,000 students. Dr. Life is responsible for all fraternities and sororities on campus and supervises a staff of four.

Dr. Life's supervisor, the Vice Chancellor for Student Affairs, recently initiated a division-wide assessment to explore the contribution of student affairs programs and services to the central mission of TU. The Vice Chancellor asked all directors to conduct self-assessments and to provide him with summary reports of their findings. To satisfy this request, Dr. Life reads the university mission and notes the goal of "social responsibility." With this goal in mind, he conducts a study to measure the influence of fraternity and sorority involvement on students' level of social responsibility.

To do this, the assistant administered the SCT (Loevinger & Wessler, 1970; Loevinger, 1996) to fraternity and sorority students (n=50) during their weekly council meeting. In addition, the assistant sent electronic communication to a random sample of non-affiliated students (n=50) with similar characteristics (age, year in school, etc.). After collecting the data, the assistant worked with a graduate assistant to input all scores in SPSS (version 11.0) using the scoring manual (Loevinger & Wessler, 1970) for the SCT and coding all fraternity and sorority students as "1" and all non-affiliated students as "0" on the involvement variable "status." They ran multiple analysis of variance (MANOVA) tests on each of the outcome variables of interest using "status" as the category of the independents.

Final results were summarized in an executive summary for the Vice President for Student Affairs. Significant differences were found between affiliated and non-affiliated students in terms of self-awareness and conscientiousness of others. Mean score comparisons revealed that affiliated students reported significantly higher levels of social responsibility than their non-affiliated peers.

This example outlines a quantitative approach to student learning outcomes assessment. Qualitative research is another approach to scientific inquiry. Qualitative research, also referred to as the naturalistic method, admits subjectivity and gives significant attention to the situation of the "studied" and the researcher (Lincoln & Denzin, 2000). Focus groups, one-on-one interviews, and case study (Yin, 1994) are a few examples of qualitative methods. Fraternity and sorority affairs administrators might use these techniques to gather information from their

students to measure the effect of fraternity and sorority involvement on specific outcomes. Consider the following example:

Sharon Taggether is Coordinator for Fraternity and Sorority Affairs at Wrigley College, a small liberal arts college that has a strong commitment to service learning and community outreach. She is responsible for the university fraternity and sorority system and several programs including outreach mentoring and retreats. She has a staff of two assistants and a graduate intern.

After reading an article by Zlotkowski (1996) in Change magazine, Sharon became interested in the relationship between fraternity and sorority involvement and service/community learning. She decided to use her own program to investigate this issue. To assess the impact of fraternity and sorority involvement on students' commitment to service and understanding of community needs, she conducted an assessment project to investigate this relationship. The following variables were selected: connection between self and others (self-awareness), awareness of the needs of others (conscientiousness), and working with others.

Sharon asked each fraternity and sorority to select a representative to attend a meeting held in the student center. The electronic invitation outlined that she and her staff members would be collecting information about the influence of student involvement on learning. At the meeting, Sharon and her research team conducted a focus group interview with 10 student representatives. Specifically, they asked the following questions: (a) what service activities do you participate in? (b) Are these activities sponsored by your fraternity/sorority or another campus organization? (c) In your own words, what have you gained from participating in such experiences? (d) What motivates you to participate in such experiences? (e) How does your involvement in such activities relate to your awareness of others' needs? (f) How does your involvement in a fraternity or sorority influence your understanding of service and community needs? Additional probes were outlined on the semi-structured interview protocol and were used as necessary.

All interviews were audiotape recorded and transcribed verbatim. Following recommendations by Denzin and Lincoln (2000), the team sought to collect rich, thick data to understand the meaning of community service from the perspective of the actual participant. For this reason, the team also gathered information (e.g., brochures, websites, and handbooks) about each fraternity and sorority organization. Data were analyzed using the constant comparative method described by Strauss and Corbin (1994). Initially, open coding was used to identify general themes and broad constructs. Next, these themes were clarified as necessary and eliminated in instances were they did not prove significant across cases. Finally, axial coding was used to identify relationships between categories and to form general conclusions. Member checking, triangulation, and peer debriefing (Bogdan & Biklen, 1992) were used to ensure accuracy of data and results.

In the end, the team used the themes to describe the positive effects of fraternity and sorority involvement on students' learning and development in terms of service learning and community outreach. Selected excerpts or quotes were used to tell a "story" about the relationship between fraternity and sorority affiliation and awareness of others' needs. Likewise, vignettes and reflections were used as sound bytes to answer the research questions posed at the start of the assessment project.

Regardless of whether quantitative, qualitative, or a mixture of the methods (Tashakkori & Teddlie, 2002) are used, it is important to select an approach that will yield the kind of data needed. When implementing a quantitative approach, one should consider using institutional information previously collected and currently available. In this way, time-consuming collection of new data is not required if relevant data are already available. When using a qualitative method, open-ended discussions and self-reports can be useful in yielding valuable data. There are many ways to analyze qualitative data; open coding, document analysis, and storytelling used in the hypothetical example are only a few approaches and require a great deal of time and attention. While tools are available, much qualitative data tends to go unanalyzed due to assessors being overwhelmed by the sheer volume of text involved (Strayhorn, 2006).

Conclusion

In summary, much of the literature on fraternity and sorority students focuses on the negative effects of fraternity and sorority involvement in college, such as poor academic achievement and higher instances of alcohol consumption. Yet, many believe that participation in fraternities and sororities is associated with positive outcomes including intellectual growth and development and the attainment of leadership skills. This highlights the need for additional evidence to support these claims.

Assessment is one way to generate valuable data or information about what students gain from college experiences. However, the use of assessment in fraternity and sorority affairs is sparsely documented. Anecdotal evidence suggests that practitioners tend to steer away from assessment due to feelings of inadequacy, fear of statistics and research, and to avoid the sheer burden of such an undertaking. While the work of assessing student learning outcomes requires a significant amount of planning and time, this is no reason for retreat.

The influence of fraternity and sorority involvement on student learning and development in college can be measured. While the examples described above provide an initial, exploratory foray into this relationship, additional techniques can be used to isolate the unique effect of fraternity and sorority involvement on change during the college years. These techniques include imposing statistical or behavioral controls on confounding variables, designing quasi-experimental projects, and conducting longitudinal studies. These techniques go beyond the scope of this article but are discussed elsewhere (Stage & Associates, 1992; Stage & Manning, 2003).

In closing, a bit of caution should be exercised when reading this article. It is the authors' intention to render the complex simple; realizing that a degree of accuracy is lost in the process. It must be remembered that these examples are meant to be descriptive rather than prescriptive about the various facets of assessment, representing only one way to assess learning and development and definitely are not the only way. More examples from a broader cross-section of institutions are needed to assess learning and development in fraternity and sorority affairs specifically.

References

Association of Fraternity Advisors (AFA) (2002). *Advising fraternities and sororities.* Association of Fraternity Advisors; Carmel, IN.

Angelo, T. A. (1997). The campus as learning community: Seven promising shifts and seven powerful levers. *AAHE Bulletin, 49*(9), 3-6.

Angelo, T. A., & Cross, K. P. (1993). *Classroom assessment techniques: A handbook for college teachers* (2nd Ed.). San Francisco: Jossey-Bass.

Bauer, K.W. & Hanson, G.R. (2001, December 12). Assessment tips for student affairs professionals. *NASPA NetResults*. National Association of Student Personnel Administrators; Washington, D.C.

Bloom, A. (1987). *The closing of the American mind.* New York: Simon & Schuster.

Bogdan, R. C., & Biklen, S. K. (1992). *Qualitative research for education: An introduction to theory and methods.* Boston: Allyn & Bacon.

Centra, J. A. (1979). *Determining faculty effectiveness: Assessing teaching, research, and service for personnel decisions and improvement.* San Francisco: Jossey-Bass.

Creswell, J. W. (2003). *Research design: Qualitative, quantitative, and mixed methods approaches* (2nd Ed.). Thousand Oaks, CA: Sage.

Denizet-Lewis, B. (2005, January 9). Ban of brothers. *New York Times*, pp. 1-12.

Erwin, T. D. (1991). *Assessing student learning and development*. San Francisco, CA: Jossey-Bass.

Giegerich, S. (2006, Winter). Barrier busters: Two-year institutions help students achieve their dreams. *Focus,* Retrieved June 15, 2006, from http://www.luminafoundation.org/publications/focus_archive/winter_2006/twoyearinstitutions.html

Hennessy, N. J., & Huson, L. M. (1998). Legal issues and Greek letter organizations. *New Directions for Student Services, 81,* 61-77.

Hersh, R. H., & Merrow, J. (Eds.). (2005). *Declining by degrees: Higher education at risk.* New York: Palgrave McMillan.

Hoover, E. (2005). Berkeley closes fraternity after hazing incident. *The Chronicle of Higher Education, 51*(45), A39.

Kasten, K. L. (1984). Tenure and merit pay as rewards for research, teaching, and service at a research university. *Journal of Higher Education, 55*(4), 500-514.

Kuh, G. D., Pascarella, E. T., & Wechsler, H. (1996). The questionable value of fraternities. *Chronicle of Higher Education, 43*(4), A68.

LaBrie, R. A., Shaffer, H. J., LaPlante, D. A., & Wechsler, H. (2003). Correlates of college student gambling in the United States. *Journal of American College Health. 52*(2), 53-62.

Loevinger, J. (1996). Meaning and measurement of ego development. *American Psychologist, 21,* 195-206.

Miller, T. K. (2003). *The book of professional standards in higher education.* Washington, DC: Council for the Advancement of Standards in Higher Education.

Neuman, W. L. (1994). *Social research methods: Qualitative and quantitative approaches. Needham Heights,* MA: Allyn and Bacon.

Pascarella, E. T., Flowers, L., & Whitt, E. J. (2001). Cognitive effects of Greek affiliation in college: Additional evidence. *NASPA Journal, 38*(3), 280-301.

Patton, M. Q. (1990). *Qualitative evaluation and research methods* (2nd Ed.). Newbury Park, CA: Sage.

Pike, G. R. (2000). The influence of fraternity or sorority membership on students' college experiences and cognitive development. *Research in Higher Education, 41*(1), 117-139.

Pike, G. R., & Askew, J. W. (1990). The impact of fraternity or sorority membership on academic involvement or learning outcomes. *NASPA Journal, 28,* 13-19.

Read, M. (2004, September 19). Employers say one-third of workers writing skills fall below job standards. *Asheville Citizen Times*, p. B7.

Rockey, D. L., Beason, K. R., Howington, E. B., Rockey, C. M., & Gilbert, J. D. (2005). Gambling by Greek-affiliated college students: An association between affiliation and gambling. *Journal of College Student Development, 46*(1), 75-87.

Shonrock, M. D. (1998). Standards and expectations for Greek letter organizations. In E. G. Whipple (Ed.), *New challenges for Greek letter organizations: Transforming fraternities and sororities into learning communities* (pp.79-85). San Francisco: Jossey-Bass.

Stage, F. K., & Associates. (1992). *Diverse methods for research and assessment of college students.* Washington, DC: American College Personnel Association.

Stage, F. K., & Manning, K. (2003). *Research in the college context: Approaches and methods.* New York: Brunner-Routledge.

Strayhorn, T. L. (2006). *Frameworks for assessing learning and development outcomes.* Washington, DC: Council for the Advancement of Standards in Higher Education (CAS).

Strayhorn, T. L., Creamer, D. G., & Miller, T. K. (April 5, 2005). *The CAS Approach to student learning and development outcomes assessment.* Presented at the American College Personnel Association (ACPA) Annual Convention, Nashville, TN.

Tashakkori, A., & Teddlie, C. (2002). *Handbook of mixed methods in social and behavioral research.* Thousand Oaks, CA: Sage Publications.

Upcraft, M. L, & Schuh, J. H. (1996). *Assessment in student affairs: A guide for practitioners.* San Francisco: Jossey-Bass.

Upcraft, M. L., & Schuh, J. H. (2000). *Assessment practice in student affairs: An applications manual.* San Francisco: Jossey-Bass.

Wechsler, H., Kuh, G. D., & Davenport, A. (1996). Fraternities, sororities, and binge drinking: Results from a national study of American colleges. *NASPA Journal, 33*(4), 260-279.

Whipple, E. G., & Sullivan, E. G. (1998). Greeks as communities of learners. *New Directions for Student Services, 81,* 87-94.

Whitt, E. J. (1992). Document analysis. In F. K. Stage (Ed.), *Diverse methods for research and assessment of college students* (pp. 79-90). Washington, DC: American College Personnel Association.

Yin, R. (1994). *Case study research: Design and methods* (2nd Ed.). Beverly Hills, CA: Sage Publishing.

Zlotkowski, E. (1996). Linking service-learning and the academy. *Change, 28*, 21-27.

Terrell L. Strayhorn, Ph.D.—is Assistant Professor of Higher Education at the University of Tennessee, Knoxville. He teaches in both the master's and doctoral higher education degree programs. He is principal author of a book titled, Frameworks for Assessing Learning and Development Outcomes (2006). The assessment examples presented in this article are adapted from his text.

Amy J. Colvin—is a M.S. candidate in the College Student Personnel program at the University of Tennessee, Knoxville. She is a graduate assistant in the Panhellenic Affairs Office. Her research interests include the effects of fraternity and sorority involvement on college students' development and today's millennial student.

Questions about this article should be directed to Dr. Terrell L. Strayhorn, 1122 Volunteer Boulevard, A316 Claxton Complex, Knoxville, TN 37996 or strayhorn@utk.edu.