

Influence of Diverse Perspectives on Thriving among Students of Color

David Dufault-Hunter

Steve Conn

Neil Best

Eric McIntosh

Abstract

This study examined the extent to which inclusion of diverse perspectives in the classroom contributed to the variation in thriving among first-year students of color at a mid-size university on the West Coast. Student thriving was defined as academic, interpersonal, and psychological engagement and well being. The results indicated that presenting diverse perspectives in class directly and indirectly contributed to the variation in thriving in students of color. Exposure to multiple perspectives has positive effects on all students, but was particularly influential among students of color as it is related to greater frequency and satisfaction with student-faculty interactions and contributed more significantly to students' levels of thriving at the end of the first semester. The final structural model explained 70% of the variation in student thriving.

Over the last two decades, more ethnic and racial minorities students earned post secondary degrees than at any other time in U.S. history. The number of ethnic and racial minorities enrolled in post-secondary education increased by 5.6% between 2010 and 2014 (Snyder, de Bray, and Dillow, 2015). In 2010, ethnic minorities accounted for 27.3% of the total post-secondary enrollment population compared to 30.6% in 2014. The number of college degrees conferred to racial and ethnic minority students increased by 22% since 2000 (U.S. Department of Education, 2014). By 2014, ethnic minorities represented 20% of all bachelor degrees earned by U.S. citizens (U.S. Department of Education, 2014). Unfortunately, retention and graduation rates have failed to increase at the same rate. Between 1987 and 2016, national first-year retention (the percentage of students who enrolled as freshman and re-enrolled 12 months later at the same institution) increased by .02% (ACT, 2016). Persistence to graduation rates remained flat over the same period (ACT, 2016). Despite decades of research focused on

student success, national persistence rates remain virtually unchanged, with the graduation rates of historically underrepresented populations lagging significantly behind those of Asian and White students (Ross, Kena, Rathbun, Kewal Ramani, Zhang, Kristapovich, & Manning, 2012; Snyder, de Bray, and Dillow, 2015).

Given the accelerated growth of ethnic and racial minorities seeking a college degree, the inability to improve student success for all students much less students of color presents both a challenge and an opportunity to explore new strategies (Schreiner, Kramer, Primrose, & Quick, 2011). Long-established definitions of student success focus narrowly on traditional measures such persistence and graduation rates (Schreiner et.al, 2011; Pascarella & Terenzini, 2005). Significant research exists linking specific student behaviors to the outcomes like persistence and graduation (Astin, 1993; Kuh, Kinzie, Shuh, Whitt & Associates, 2005; Kramer, 2007). Although targeting student behaviors related to persistence and graduation rates reflects an important contribution to the extant understanding of student success, exploring the relationship between student success and individual motivational and psychological elements represents a new area of research in higher education. A more holistic definition of student success that includes elements of psychosocial well-being holds considerable promise for addressing this intransigent achievement gap (Kinzie, 2012; Robbins, Allen, Casillas, Peterson, & Le, 2006). In particular, motivation and the psychological components that influence psychosocial well-being are malleable. Institutions can develop strategies and interventions that increase motivation and psychological well-being (Robbins et al., 2006; Schreiner et al., 2011). Student Thriving (Schreiner, 2010) is an example of a student success model that improves on previous research by considering psychological factors..

Grounded in Bean and Eaton's (2000) psychological model of college student retention

and research on *flourishing* in the field of positive psychology (Keyes, 2003; Seligman, 2011), the construct of thriving describes those students who are not only experiencing academic success, but are vitally engaged and making the most of their college experience. Studies of thriving have indicated that although there are numerous pathways to student thriving in college, those pathways differ significantly for historically underrepresented students (Schreiner, 2014). The relationship between student thriving and student success becomes important as demographic projections show that the college enrollment of students of color will comprise an increasingly larger proportion of the college student population (Colby & Ortman, 2015).

Conceptual Framework

A fundamental purpose of college and universities involves the development of talent (Astin, 1993; Astin, 2016). Each student brings a unique set of characteristics, talents and needs to college. Through the admission process, institutions identify the particular qualities and limitations of each student and create educational pathways that facilitate the intellectual and character development of all students within the incoming class. Unfortunately, over the last three decades, the central mission of talent *development* was superseded by talent *identification* as colleges and universities sought to gain market advantage in an increasingly competitive higher education environment (Astin, 2016). By touting the academic profile of incoming classes, institutions of higher education linked institutional academic reputation with the academic qualities of students (Astin, 2016). The emphasis on identifying student characteristics and behaviors that contribute to student success diminishes the importance of creating academic environments that facilitate the development student talent (Astin, 1993; Astin, 2016; Schreiner et al., 2011). In Tinto's theory of student departure, the degree to which

students integrate socially and academically predicts persistence or departure. As such, students are the primary agents in determining whether to stay or leave (Bensimon, 2007; Hurtado & Carter, 1997; Tinto, 1975). Students who do not align with majority culture values and assumptions must minimize cultural differences and assimilate into the dominant population to successfully persist and graduate from college (Hurtado & Carter, 1997). Under represented racial minorities who experience negative racial interactions on campus, struggle to successfully attach to college environment (Hurtado, Carter, & Spuler, 1996). Although student behaviors and characteristics impact student success, institutional environments can promote or inhibit the social and academic integration of students that leads to persistence or departure (Astin, 1993). Developing institutional strategies to create educational contexts that facilitate student success for a broad array of students represents an opportunity to improve overall student success.

Successful student success interventions depend on understanding the relationship between student characteristics and institutional environments. Braxton, Hirschy, & McLendon, (2004) posit that the degree to which institutions achieve alignment between admission messages and the [lived](#) experiences of students on campus determines whether college students integrate socially and academically into the campus community. Astin's (1993) I-E-O model provides the conceptual framework for this study. By grouping variables in a particular temporal order (inputs, then environment, then outcomes), researchers can isolate the influence of particular variables on specified outcomes. In this study, student success represents the outcome variable as was measured using Schreiner's (2010) model of student thriving. The malleable character of the factors that comprise the thriving construct represents an opportunity for colleges and universities to create environments that positively increase thriving of all students and particularly thriving among students of color.

Literature Review

Student Thriving

Thriving represents the intersection between Robbins, Lauver, Le, Davis, Langley, & Carlstrom (2004) work on psychosocial components of academic success, Bean and Eaton's (2000) psychological model of college retention, and Keyes' (2003) work on flourishing. Students who thrive in college exhibit particular psychosocial characteristics that positively enhance their sense of psychological well-being in the face of significant challenges (Schreiner, Pothoven, Nelson, & McIntosh, 2009). Schreiner et al. (2009) adapted the concept of psychological *flourishing* to the college context. Human flourishing involves a number of psychological characteristics, including resilience and optimism in the face of difficulty (Keyes & Haidt, 2003). Similarly, student thriving suggests that a student is experiencing hope and optimism within the college setting. Students who thrive are more likely to persist, graduate, and report greater learning gains (Schreiner, et al., 2009).

The construct of thriving is based on the assumption that self-efficacy, attitude toward college, coping, internal or external locus of control, social integration, academic integration, and other outcomes are "psychologically motivated" (Schreiner, Pothoven, Nelson, & McIntosh, 2009, p.3). Schreiner, et al. (2009) conceptualized *Thriving* as a method to measure psychological constructs that are organized into the categories of academic thriving, interpersonal thriving, and intrapersonal thriving. A student who thrives academically reflects a number of characteristics that correlate with academic success as measured by college grade point average; such characteristics include academic self-efficacy, academic effort (Robbins et al., 2004), and engaged learning (Schreiner & Louis, 2011). Interpersonal thriving involves a student's connectedness with others. Students who thrive interpersonally value the contributions

of friends and those who represent different points of view and experience a sense of belonging among their peers (Schreiner, McIntosh, et al., 2009). Intrapersonal thriving reflects a sense of positive well-being as related to a student's interpersonal life, academic performance, and social connectedness (Schreiner, Louis, & Nelson, 2012). To measure academic, interpersonal and intrapersonal thriving, Schreiner, Pothoven, et al. (2009) developed the *Thriving Quotient* survey instrument. The instrument measures five factors of thriving: (1) Engaged Learning; (2) Academic Determination; (3) Diverse Citizenship; (4) Positive Perspective; and (5) Social Connectedness. (Schreiner, Pothoven, et al., 2009).

Dweck (2006) argued that individuals with a growth or incremental mindset believe in effort as a pathway to mastery. Similarly, students who exhibit *academic determination* set goals, exert significant effort, and manage their time to accomplish academic tasks (Schreiner et al., 2012). Additionally, among students with high levels of academic determination, effort is seen as essential to success. When they encounter obstacles or challenges, they interpret the experiences through an internal locus of control. They assume if they work harder or more efficiently, they can overcome most problems (Schreiner, 2010). Students who demonstrate *engaged learning* make connections between their learning in the classroom and their own experiences; new information animates and amplifies their inherent curiosity (Astin, 1984; Schreiner et al., 2012). Such students seek ways to interact about classroom material with their classmates and faculty and are energized by what he or she is learning (Schreiner et al., 2012). Optimism shapes the experiences of students who reflect a *positive perspective*. Positive perspective does not mean thoughtless positivity. Rather, students with high levels of positive perspective face problems with a learning posture (Seligman, 2011). The future of students with a positive perspective represents opportunities rather than threats (Schreiner et al., 2012). *Social*

connectedness embodies notions of strong interpersonal relationships in which a student feels safe and stable (Schreiner et al., 2012). *Diverse citizenship* is characterized by openness to difference, to perspectives that represent alternate points of view.

In previous studies student thriving explained an additional 12%-18% of the variance in intent to graduate, college grades, institutional fit, learning gains, and satisfaction with college experience after controlling for demographic variables, institutional features, faculty interaction, and campus engagement (Schreiner, Pothoven, Nelson, & McIntosh, 2009). The advantage of using thriving as a measure of student success is multifaceted. Colleges can create environments that positively impact student thriving for all students, but particularly students of color. Ash and Schreiner (2016) found that thriving increased for students of color when faculty demonstrated sensitivity to the needs of diverse learners. Colleges that focus on improving faculty interactions with students and understand the link between student thriving and spirituality can design interventions that positively impact student success (McIntosh, 2012; Schreiner, 2014; Schreiner et al., 2013). Additionally, the significant relationship between psychological sense of community (PSC) and thriving suggests the need to further explore what factors positively contribute to PSC among students of color (Ash & Schreiner, 2016; McIntosh, 2012; Schreiner, 2014; Schreiner et al., 2013).

Psychological Sense of Community

Tinto theorized that student persistence in or departure from college depended on the degree to which college students integrated academically and socially into the college/university community (Tinto, 1975). Over the last three decades, researchers in higher education have worked to identify the mechanisms that influence student integration into college communities. Although scholars initially focused on behaviors indicative of integration, a growing body of

literature reflects a focus on the psychological components of student transition to college, specifically psychological sense of community (Hurtado & Carter, 1997; Hurtado, Han, Saenz, Espinosa, Cabrera, & Cerna, 2007; Locks, Hurtado, Bowman, & Osequera, 2008).

The construct of psychological sense of community (PSC) arose out of Sarason's work on community mental health (1974). Sarason argued that disconnection from community results in alienation and despair (Fisher, Sonn, & Bishop, 2002). He was particularly concerned about the relative absence of community in human relationships and its deleterious impact on a person's psychological well being (Sarason, 1974). McMillan and Chavis (1986) contributed to Sarason's conceptualization of PSC by defining it as "a feeling that members have of belonging and being important to each other, and a shared faith that their needs will be met by their commitment to be together" (p. 9). The challenge in understanding and measuring PSC relates to the multiple definitions and labels of the construct (Strayhorn, 2012). Scholars disagree as to whether PSC reflects a cognitive process, a set of behaviors, an environmental phenomenon, or an emotional state (Chipuer & Pretty, 1999). Multiple synonyms for PSC exist in higher education literature including psychological sense of integration, sense of community, and sense of belonging. Despite the heterogeneity of definitions and labels related to PSC, a significant amount of literature reflects a growing consensus that PSC is important for psychological well being and human functioning (Hurtado & Carter, 1997; Keyes & Haidt, 2003; Seligman, 2011; Strayhorn, 2012). PSC and the related construct of sense of belonging reflect an important heuristic in the understanding of college student departure, particularly students of color.

A number of scholars have critiqued Tinto's theory of student departure, because he assumed that all students successfully transition to a college campus in the same way (Bensimon, 2007; Hurtado & Carter, 1997). Tinto theorized that students who aligned with an institution

academically (i.e., met the academic standards) and normatively (i.e., shared values of the institution) were more likely to persist than those who did not (Braxton, Hirschy, and McClendon, 2004; Tinto, 1975). In other words, a students' commitment to a college is more dependent on student engagement and participation than on strategies an institution might employ to create a welcoming environment for all students. Tinto's theory fails to account for the differential experiences of underrepresented minority students on college campuses.

Hurtado & Carter (1997) found that Latino students struggle to participate in college communities, resulting in lower graduation and retention rates as compared to majority culture students. Key to understanding the variability in student success among racial and ethnic student groups is their differences in reported levels of sense of belonging (Kinzie, Gonyea, Shoup, & Kuh, 2008). A national study of 2,967 first-year students from 34 different colleges in 24 states found that underrepresented minority students consistently reported lower levels of sense of belonging (Johnson, Soldner, Leonard, Alvarez, Inkelas, Rowan-Kenyon, & Longerbeam, 2007) that led to lower levels of commitment to an institution. A number of studies show that sense of belonging significantly predicts student persistence (Hausmann, Ye, Schofield, & Woods, 2009). A sense of belonging is critical to all students but is especially for students of color (Hernandez, 2000; Hurtado & Carter, 1997; McIntosh, 2012). Although many of the pre-college characteristics that predict student success (i.e., high school GPA, socio-economic status, and academic preparation for college) cannot be addressed by institutions of higher education, colleges and universities can create environments that facilitate the development of belonging and community among all students (Kinzie, et al., 2008; Strayhorn, 2012). For example, college students feel a greater sense of PSC when they are engaged in sub-communities with social connections such as sororities or fraternities (Lounsbury & DeNeui, 1995), when they interact

with faculty (Strayhorn, 2012), and when they participate in campus activities (DeNeui, 2003; Strayhorn, 2012). Schreiner, Kammer, Primrose, & Quick, (2011) found that the strongest predictor of PSC was spirituality for African American students, interaction with faculty for Caucasian students, certainty of major for Asian students, and campus involvement for Latino students. The concepts PSC and sense of belonging reveal mechanisms of social cohesion that are important contributors to college student retention.

Experiences of Students of Color on College Campuses

The campus experiences of students of color, particularly on predominantly White campuses, are qualitatively different than those of their White peers. Students of color report lower levels of satisfaction and sense of belonging than do Caucasian students (Park, 2009), are more likely to experience the campus racial climate as negative (Lowe, Byron, Ferry, & Garcia, 2013), and describe relationships with faculty in ways that differ significantly from their Caucasian peers (Cole, 2007; Kim & Sax, 2009). In a recent study specifically assessing thriving, Ash and Schreiner (2016) found that students' perceptions of institutional integrity and institutional commitment to student welfare were significantly predictive of their sense of community on campus, intent to graduate, and thriving. They also found that faculty's sensitivity to the needs of diverse learners was predictive of the variation in the same outcomes.

Institutional Integrity and Commitment to Student Welfare

Astin (1999) and Tinto (1975) developed theories of student persistence that identified student behavior as the primary variable in student departure. Students who invest psychological energy in academic activities, engage in class discussion, and spend more time studying are more likely to persist and graduate (Astin, 1999). Similarly, students who meet the academic standards of an institution and align with the values of the college are less likely to depart an

institution (Tinto, 1975). In each case, student behavior and participation determines college persistence. The concepts of institutional integrity and commitment to student welfare reflect an attempt to identify how institutional commitments influence college persistence (Braxton, Hirschy, & McLendon, 2004); student persistence depends on both individual agency and institutional strategy.

Ryan & Deci (2000) found that organizational environments influence the levels of intrinsic motivation experienced by institutional members. Similarly, colleges that achieve alignment between “the goals proclaimed by the given college of university” and “the actions of a college or university’s administrators, faculty, and staff” facilitate greater levels of social integration among students (Braxton, Hirschey, and McClendon, 2004, pg. 24). In addition, institutions that demonstrate an “abiding concern for the growth and development of its students [and]...communicates the high value it places on students in group as well as individuals” experience higher levels of student persistence (Braxton, Hirschey, & and McClendon, 2004, p 22). The concepts of institutional integrity and commitment to student welfare are significantly related to students’ psychological sense of community (PSC), particularly among students of color (Ash & Schreiner, 2016). Students who perceived an alignment between admission messages, college policies, and staff and administrator behavior reported high levels of PSC (Ash & Schreiner, 2016). Among students of color, PSC increased for those students who reported a greater sense of spirituality (McIntosh, 2012). The relationship between spirituality and PSC aligns with findings that show ethnic and racial minority students reporting increased levels of PSC when they participated in campus clubs and groups focused on spirituality (Bensimon, 2007). Even though participation in spirituality does not depend on specific campus strategies, encouraging students to participate in spiritually related activities or fostering

environments among faculty and students that encourage reflective meaning making may ameliorate a variety of campus dynamics generally contributing to attrition among students of color.

Spirituality

A number of studies focused on the spiritual dimension of the college student experience reflect a promising area of research. The concept of spirituality and religiousness represents 12 factor construct significantly related to a variety of important student outcomes (Astin, Astin & Lindholm, 2010, Astin, Astin, & Lindholm, 2011). Students who reported higher levels of spirituality were likely to experience higher levels of satisfaction with college, increased levels of academic self-esteem, reported higher GPA, and were more likely to embrace diversity (Astin, Astin, & Lindholm, 2010). For students of color, spirituality and religiousness mediated resilience in the face of micro-aggressions as well as coping mechanisms that facilitated forgiveness and empathy (Johnson, 2012). Additionally, spirituality and religiousness facilitate coping in the face of adversity (Constantine, Miville, Warren, Gainor, & Lewis-Coles, 2006) and among Hispanic students, involvement in spirituality resulted in students reporting they were even better off after having faced adversity (Consoli, Delucio, Noriega & Llamas, 2015). The efficacy of spirituality as a coping mechanism when experiencing adversity may explain why levels of spirituality are higher among African-American students at PWI's than they are among African-Americans attending HBU's (West, Hagan, & Norwood, 2013).

The influence of spirituality on the college experience varies across student ethnicities. For example, reported levels of spirituality among students of color were a stronger predictor of student thriving than for White students (McIntosh, 2015; McIntosh, 2012). In fact, apart from a psychological sense of community, spirituality was the single largest predictor of thriving

among students of color. More broadly, higher levels of spirituality influenced students' perception of institutional integrity, commitment to student welfare, faculty sensitivity to diverse learners, and interracial and peer interactions (Ash & Schreiner, 2016). Ash and Schreiner (2016) suggested that spirituality serves as the lens through which students of color interpret their college experience. Given the degree to which student spirituality mediates a variety of student success outcomes, including thriving, the construct was included in this study.

Although student spirituality appears to mediate campus experiences especially for students of color, understanding what campus leaders can do to develop college environments that promote student success for vulnerable student populations represents a crucial area of research. Two categories related to academic dynamics in and out of the classroom represent significant promise.

Student Faculty Interaction

Student interactions with faculty members are a consistent predictor of student success across institution type and contribute to student satisfaction with campus climate (Hu & Kuh, 2003). The relationship between interaction with faculty and a variety of positive student outcomes such as satisfaction, academic achievement, and persistence is well documented (Astin, 1993; Pascarella & Terenzini, 2005; Hu & Kuh, 2003; Kim & Sax, 2009; Lundberg & Schreiner, 2004). Different populations of students however, experience faculty interaction distinctly. The benefits of these interactions vary by major (Kim & Sax, 2009) by ethnic group (Cole, 2010; Lundberg & Schreiner, 2004), or by the nature of the interaction (Cole 2007). White students receive a greater benefit from student faculty interaction than African-American students (Lundberg & Schreiner, 2004) but African-American students experience an increase in intellectual self-concept and grades when they develop mentor relationships with faculty (Cole

2007). Latino students benefit more than other populations from social interactions with faculty, and Asian students reported higher levels of self-development gains when their interactions focused on academics and career planning (Einarson & Clarkberg, 2010). Both the frequency and the quality of faculty interaction impact student experiences. Individual faculty members may qualified to advocate for students of color depending on their comfort and training discussing race and racial issues. An emerging body of literature on inclusive pedagogy, one that creates an openness to diversity in the classroom, shows promise (Linder, Harris, Allen & Hubain, 2015).

Diverse Perspectives

Diverse learning environments facilitate critical learning outcomes for all students (Smith, 2009). Students that participate in diverse learning contexts report gains in critical thinking, leadership competency, and the ability to work with others (Hurtado, 2001; Harper & Yeung, 2013). In addition, students who interact with diverse peers are more satisfied with their college experience and their own self-concept (Chang, 1999). The degree to which students experience diverse relationships depends on structurally-diverse environments and the nature of interracial interactions (Fischer, 2007). Increasing structural diversity without adequately addressing dynamics of cross-racial interactions can detrimentally impact students of color (Chang, 1999). For example, even well intentioned peers, faculty, and administrators may unwittingly commit micro-aggressions (Linder et al., 2015). A number of studies examine the negative effects of micro-aggressions on physical, emotional, and mental health (Constantine & Sue, 2007). These studies also found a connection between micro-aggressions and burnout and exhaustion (Wells, 2008). The ability of faculty members to develop trust with students, particularly students of color, appears to engender increased levels of relational connection.

Cohen and Steele (2002) identified trust as an important part of the peer and faculty relationships students form. Students who identify with stigmatized class or ethnic group may be less trusting of their school or faculty because they fear they will receive unfair treatment. However, when students are affirmed, and believe that they are not being viewed through the lens of a negative stereotype they are more likely to trust their educators. Steele (1997) recommended practices called “Wise schooling” (p. 613) in which faculty members interact with students of color in a way that minimizes or decreases stereotype threat. One element of wise schooling is to present multiple or diverse perspective. “This refers to strategies that explicitly value a variety of approaches to both academic substance and the larger academic culture in which that substance is considered” (Steele, 1997, p 625). Professors adopting a wise schooling approach assume that the student has the necessary academic ability and that the student belongs in the institution. Students who have been affirmed in this way are less susceptible to stereotype threat and are more likely to trust their educators and feel like they can more safely invest themselves in their education (Cohen & Steele, 2002). Students demonstrate an attitude of openness to diversity when they perceive that their institution is committed to diversity (Harper & Yeung, 2013), when course content reflects the experience of minorities, when they believe that diverse interactions are an expectation (Whitt, Edison, Pascarella, Terenzini, & Nora, 2001) or when faculty members use inclusive pedagogical techniques such as authenticity, vulnerability, and validation.

Although considerable research documents the benefits of pedagogy that is sensitive to the needs of diverse learners, including presenting multiple perspectives in class (Nelson Laird, 2011), little of this research has focused exclusively on the first year of college or has targeted the specific benefits to students of color. Even less research in this area has focused

on a holistic student success outcome such as that represented by thriving. The first year of college is a pivotal year for student success (Upcraft, Gardner, & Barefoot, 2005), and model first-year seminars are considered a high-impact practice (Kuh, 2008) because of the many ways they encourage student behaviors that lead to deeper learning and success. As a result, determining the extent to which multiple perspectives presented in the first-year seminar contribute to the variation in thriving, particularly among students of color, could provide institutions with the opportunity to strengthen pathways toward thriving in this particular population during a crucial transition period. Controlling for students' entering student characteristics and campus experiences during the first semester would bolster confidence in such findings.

The purpose of this study was to explore the extent to which diverse perspectives articulated by first-year seminar faculty in classroom discussions or assignments influenced variation in thriving among students of color. Research with multi-institutional national samples of students of color have indicated that there are differential pathways predictive of thriving among Asian, African American, Latino, and multiethnic students (Ash & Schreiner, 2016; McIntosh, 2012; Schreiner, 2014), yet no studies examined first-year students of color and the role multiple perspectives presented specifically in a first-year seminar.

This study explored the direct and indirect effects of these diverse perspectives on such psychosocial variables as a psychological sense of community and students' perceptions of institutional integrity. Structural equation modeling (SEM) was chosen to address the following research question: To what extent do multiple perspectives presented by first-year seminar faculty contribute to the variation in thriving among first-year students of color, after taking into consideration their entering characteristics and other campus experiences during

the first semester?

Methodology

A longitudinal correlational design was used to address the research question. At the beginning of the semester, 941 students in a first-year seminar at a 4-year doctoral research university completed the *Thriving Quotient* (Schreiner, 2012) as part of an online survey, with 518 of those students completing the posttest at the end of the semester. Missing value estimation and screening for univariate and multivariate outliers resulted in 392 usable records for analysis. The sample ($N= 392$) was 80.4% female and 52.6% White, which was representative of the racial composition of the first-year student population at that institution, but was not representative of the gender composition (see Table 1).

Insert Table 1 about here

The demographic characteristics and other pre-college variables included in the model were those supported by previous research as contributing to student success. These variables included gender, race, family income, generation status, high school grade point average, standardized test scores, federal, state, and institutional financial aid awards, and levels of spirituality as measured by items adapted from the College Student Beliefs and Values Scale (Higher Education Research Institute, 2007).

We measured thriving using the *Thriving Quotient* (TQ; Schreiner, 2012). The TQ consists of 25 items across five scales assessing the positive functioning and well-being of college students (Schreiner, Kalinkewicz, Cuevas, & McIntosh, 2013). The instrument is valid and reliable, as evidenced by 6-week test-retest reliability of $r = .87$ and a coefficient alpha estimate of $\alpha = .89$ with confirmatory factor analysis indicating that the construct of thriving is a second-order factor measured across five factors ($\chi^2 (260) = 2,781.32$ ($p < .001$), CFI = .955;

RMSEA = .042 with 90% confidence intervals of .040 to .043; Schreiner et al, 2013). The five scales of the TQ include Engaged Learning ($\alpha = .83$), Academic Determination ($\alpha = .82$), Positive Perspective ($\alpha = .83$), Social Connectedness ($\alpha = .82$), and Diverse Citizenship ($\alpha = .80$). Confirmatory factor analysis with this sample of first-year students indicated adequate goodness of fit ($\chi^2 = 400.55$, $p < .001$; CFI = .937; RMSEA = .06). Confirmatory factor analysis was conducted for each latent variable as part of the measurement model (See Table 2).

Insert Table 2 about here

Psychological sense of community, measured using four items ($\alpha = 0.86$; Schreiner, 2006) demonstrated excellent fit ($\chi^2 = 867.111$, $p < .001$; CFI = .998; RMSEA = .042). Institutional integrity consisted of three items ($\alpha = 0.82$) that assessed students' perceptions of mission congruence within the institution (Braxton et al., 2004) and indicated excellent fit ($\chi^2 = .011$, $p < .916$; CFI = 1; RMSEA = .000). Two items comprised the Student-Faculty Interaction construct that assessed the quantity and quality of interactions with faculty ($\alpha = 0.87$). Because only two items comprised the construct, confirmatory factor analysis was not completed. Spirituality was assessed by measuring three items related to religious beliefs providing a sense of strength, meaning and purpose, and a foundation for life ($\alpha = 0.87$). The model fit the data well, ($\chi^2 = 2.554$, $p < .279$; CFI = .999; RMSEA = .027).

Analysis and Results

In this study, we conducted structural equation modeling using the AMOS 23.0 software to determine the goodness of fit for the proposed omnibus model and subsequent multi-group analysis. The omnibus model demonstrated acceptable fit ($\chi^2 = 1426.947$, $p < .001$; CFI = .903; RMSEA = .053) and accounted for 70% of the variation in student thriving. The

regression pathways were statistically significant and consistent with our hypothesized model. The final model indicated that faculty presentation of diverse perspectives in the classroom had a significant direct effect on student thriving ($\beta = .256$). Additionally, presentation of these diverse perspectives had a direct positive effect on the quality and quantity of student-faculty interaction ($\beta = .559$) and on student perceptions of institutional integrity ($\beta = .301$), thus contributing indirectly to the variation in thriving levels. The more faculty presented and encouraged diverse perspectives in the classroom, the more satisfied students were with interactions with faculty and the more likely they were to perceive a congruence between the institutional mission and the actions of faculty and staff. All of these characteristics significantly contributed to the variation in student thriving, both directly and indirectly.

Insert Figure 1 about here

Multi-group analysis was conducted to determine whether students of color responded differently than white students to diverse perspectives articulated in the classroom. The results indicated that the presentation of diverse perspectives had a similar direct effect on spirituality and psychological sense of community for these two groups, but that significant differences existed between the two groups relative to the strength of relationship between diverse perspectives, student-faculty interactions, institutional integrity, and student thriving. The influence of diverse perspectives on student-faculty interactions for students of color ($\beta = .61$) was significantly higher than for Whites ($\beta = .479$). Additionally, the impact of diverse perspective on the variation in thriving was significantly higher for students of color ($\beta = .542$) than for Whites ($\beta = .50$). For both groups of students, hearing or experiencing diverse perspectives in the classroom positively impacted the variation in student-faculty interactions and student thriving, but were particularly powerful for students of color. Conversely, the

influence of diverse perspective on perceptions of institutional integrity was significantly higher for Whites ($\beta = .451$) than for students of color ($\beta = .429$), indicating that White students' perceptions of the institution's mission congruence were more positively correlated to the diverse perspectives they encountered in the classroom.

Discussion

The inability of institutions to significantly effect persistence and graduation rates, particularly for students of color, reflects the complexity of the problem and an incomplete understanding of the psychological and sociological dynamics that influence student departure. A primary critique of Tinto's original theory of student departure focused on Tinto's assumption that students who persist will successfully assimilate into an institution (Hurtado & Carter, 1997). In response, Tinto changed the language of his theory from integration to membership in an effort to account for the experiences of students of color on college campuses (Tinto, 1993). Institutions of higher education rely heavily on incoming students to integrating into campus cultures and reflecting majority culture values and assumptions (Bensimon, 2007; Hurtado & Carter, 1997). Students of color struggle to thrive on college campuses unless they meaningfully connect with subgroups on campus and /or participate in spiritual activities that mediate negative campus experiences (Ash & Schreiner, 2016).

The findings presented in this study demonstrate how colleges and universities can increase student thriving for all students, but particularly students of color. Students were more likely to thrive when they were presented with diverse perspectives in the classroom. In turn, students who experienced diverse perspectives reported increased levels of satisfaction with faculty student interactions and increased frequency of interactions. As satisfaction with faculty interactions improved, student perceptions regarding institutional integrity increased. In

other words, students believed that the promises institutional representatives made during the admission process accurately reflected their experience on campus. When students positively perceived the institution, they experienced increased levels of psychological sense of community that directly impacted variation in student thriving. These findings show how creating learning environments that encourage students to consider diverse perspectives and points of view, directly and indirectly effect student thriving, but particularly thriving for students of color. More importantly, the variables included in this study account for 70% of the variance in overall student thriving.

Diverse Perspective

The findings of our study confirm the critical relationship between the quality of student faculty interactions and the incorporation of diverse perspectives in the classroom (Cohen & Steele, 2002). Introducing diverse perspectives in the classroom had a greater direct effect on the quality and quantity of student faculty interactions for students of color ($\beta = .61$) than for white students ($\beta = .479$). In addition, hearing diverse perspectives in the classroom indirectly and directly affected thriving scores of students of color for a total effect of $\beta = .542$ as compared to $\beta = .501$ of White students.

Insert Table 3 about here

Given the relationship between student thriving and student success outcomes such as intent to graduate (Ash & Schreiner, 2016), persistence (Schreiner et al., 2009), and College GPA (Schreiner, 2012), the direct effects of introducing diverse perspectives in the classroom on student thriving reflects a significant contribution to our understanding of the mechanisms that positively influence persistence and graduation rates of students of. This finding suggests that encountering alternative perspectives in the classroom may reflect an openness to the

experience of ethnic and racial minorities, which increases perceived level of safety and a welcomeness among students of color (Whitt, Edison, Pascarella, Terenzini, & Nora, 2001).

Insert Table 4 about here

Faculty Student Interactions

As noted previously, Cohen & Steele (2002) highlighted the importance of trust in successful faculty student interactions among students of color. In our study, the quality and frequency of student faculty interactions had a direct effect on the degree to which students perceived an alignment between the marketing messages used at the institution in admission materials and the actual experience of students on campus. The total effect of faculty student interactions on institutional integrity was higher for students of color ($\beta = .262$) than for White students ($\beta = .248$). This finding suggests that the ways students of color perceive institutional integrity are more impacted by the quality and quantity of faculty student interactions than for White students, albeit moderately differently. The quality and quantity of interactions with faculty indirectly effects a student's sense of community with a larger total effect for students of color ($\beta = .241$) than White students ($\beta = .219$). The relationship between faculty student interaction, institutional integrity, and PSC indicates that positive relationships between students and faculty lead to a greater sense of community for students of color.

Insert Table 5 about here

Psychological Sense of Community

Over the last two decades, numerous studies confirmed the significant relationship between PSC and student persistence (Hausmann, Ye, Schofield, & Woods, 2009; Hernandez,

2000; Hurtado & Carter, 1997; McIntosh, 2012). For students of color in particular, PSC reflects a powerful predictor of student persistence or departure (Hurtado & Carter, 1997). In this study, the direct and total effects of PSC on student thriving were greater for students of color ($\beta = .456$) than White students ($\beta = .343$). Although the direct and total effects of institutional integrity on PSC were large for all students, there were significant differences between students of color and White students. The direct effects of institutional integrity on PSC among students of color was $\beta = .881$ compared to $\beta = .809$ for White students, meaning the degree to which students of color perceived that the institution accurately described the existing college community during the admission process significantly affected their reported levels of PSC. The results of this study provide evidence that institutional leaders can directly impact PSC and student thriving by developing academic strategies that positively impact persistence and graduation rates. Specifically, by integrating diverse perspectives in the class, institutions can improve faculty student relationships, increase perceived levels of institutional integrity, enhance a student's sense of belonging, and ultimately affect the variation in student thriving.

[Insert Table 6 about here](#)

Institutional integrity and Student Welfare

Our findings regarding institutional integrity are consistent with the Braxton et. al (2004) model of persistence. In this model, institutional integrity was an underlying construct predicting social integration. Students who perceived an alignment between student welfare and institutional policy (institutional integrity) were more likely to integrate socially, and ultimately to persist to graduation. Among the students in this study, those who perceived the institution as reflecting integrity were more likely to experience a psychological sense of community, and thus

were more likely to thrive. Our study is also consistent with recent study indicating that institutional integrity directly predicted PSC and indirectly predicted thriving among students of color (Ash & Schreiner, 2016).

Students believe that their institution demonstrates integrity when accurately portrayed in the admissions process and when college fulfills its stated mission and goals (Braxton et al, 2004). When students believe the institution has been accurately portrayed and demonstrates integrity it leads to a sense of confidence in the institution (Bean & Eaton, 2000). Conversely, when students have unmet expectations they may feel “confused, disappointed [and] even betrayed (Braxton et al, 2004, p 99). In our study, diverse perspectives and student faculty interaction were predictors of integrity scores. This finding indicates that students of color expected to hear diverse perspectives in the classroom and experience positive interactions with faculty; consequently they perceived that the institution demonstrated integrity when these expectations were met.

Insert Table [7](#) about here

Spirituality

Although not a primary focus of this study, spirituality represents a significant predictor of student thriving for all students, but particularly for White students in this sample. Spirituality was measured by student responses to three questions, 1) My spiritual or religious beliefs provide me with a sense of strength when life is difficult, 2) My spiritual or religious beliefs give meaning and purpose to my life, and 3) My spiritual or religious beliefs are the foundation of my approach to life. The direct effect of spirituality on White student thriving was $\beta = .41$ compared $\beta = .365$ among students of color. In previous studies, spirituality was a stronger predictor of thriving for African-American students compared to Whites (Ash & Schreiner, 2016; McIntosh,

2012). The students included in this study completed the survey during the first semester of their freshman year at a faith-based, predominately white institution (PWI). Previous studies measured thriving and spirituality of students at all academic levels (freshman, sophomore, junior, senior). White students attending a faith-based PWI may report higher thriving scores during the first semester of attendance as a result of feelings of affiliation with the institution. Therefore, spirituality among students of color may become a more significant predictor of thriving as they navigate PWIs overtime (Bensimon, 2007; Hurtado & Carter, 1997). For both White and non-White students in this study, spirituality directly affected thriving but did not significantly affect PSC or institutional integrity.

Insert Table 8 about here

Implications for Practice

Develop Campuses that are Student Ready

Developing student talent represents the primary mission of higher education (Astin, 2016). Shifting the focus from identifying prospective students most likely to succeed on a college campus to developing academic and student life structures that support the academic and social development of all students as they mature into thoughtful adults reflects a significant opportunity for colleges and universities. Institutions can create environments that increase the likelihood that students will thrive. The efficacy of first year seminars can be further enhanced specifically through the inclusion of diverse perspectives in assignments and classroom conversations. Diverse perspectives can be strategically embedded in syllabuses with intentionality at the stage of course design without a significant increase in the workload of teaching faculty throughout the duration of the course. Additionally, faculty members may enjoy the increased quality and quantity of student-faculty interaction reported by students who

perceive a higher level of diverse perspectives in class. Faculty members may also have additional opportunities to experience positive interactions with students of color, who often report lower levels of satisfaction with faculty interaction (Cole, 2007; Lundberg & Schreiner, 2004). As institutions continue seeking ways to improve student success and persistence, methods of promoting student success that are both effective and low-cost in terms of time and resources are growing in importance.

Align marketing messages with institutional realities

The significance of students' perception of institutional integrity demonstrates the importance of "[delivering] on institutional promises" (Ash & Schreiner, 2016, p 56). University administrators should take measures to ensure that the university is portrayed fairly and accurately throughout the admissions process, on university websites, and in publications especially specific to the presence of diversity and diverse perspectives in admission material. For example, brochures and websites that display an exaggerated level of diversity may imply to perspective students that the student body is more ethnically diverse than it is. As students discover that the student body is less diverse than expected they may feel mislead or betrayed. Admissions and marketing leaders should develop materials and websites that accurately represent the diversity of the student body. Additionally, institutions should consider publishing information about the racial and ethnic diversity of the student body, faculty, and executive leadership. This practice will increase transparency and integrity in the admissions process, and may also serve as catalyst for internal efforts to increase diversity.

Prospective students may also form expectations for diverse perspectives after reading university mission statements. A study by Wilson, Meyer, and McNeal (2012) found that 75% of surveyed institutions included diversity in their mission statement. Although mission

statements should represent campus-wide priorities and institutional values (Meacham & Barrett 2003), students may see little evidence that diversity is an institutional value if it is not reflected in the classroom. Institutional leaders should review literature, slogans and mission statements prospective students encounter as they begin to learn about the university and examine them congruency between such statements and the lived student experience.

Limitations

The single-school nature of the sample limits the generalizability of these findings. The student population included in this study was limited by the requirements structural equation modeling to utilize complete samples of collected data, thus resulting in a relatively small sample size. Additionally, the school in the study is a mid-sized, religiously-affiliated, private institution. Finally, although the sample was representative of the racial composition of the college, females were over-represented in the final sample.

Suggestions for Further Research

The research in this study can be advanced with future studies focused on faculty interactions, diverse perspectives, and institutional integrity. We offer three recommendations. First, this study showed that faculty members significantly influence student thriving by the quality and quantity of their interactions with students. However, the nature of those interactions is not as clear from within this study. A future qualitative study might conceptualize what behaviors are included in effective student interactions. Second, including diverse perspectives in the classroom significantly increased thriving among non-white students. A qualitative study focusing on student interpretive meaning *of diverse perspectives* could provide needed clarification as to what characterizes a diverse perspective for thriving students. Finally, this study joins a growing body of research that explores the important relationship between

institutional integrity and student success (Ash & Schreiner, 2016). The majority of these studies examined the individual perceptions of institutional integrity while ignoring the structural aspects of institutions that might contribute to institutional integrity such as mission, faculty-student ratio, and other institutional characteristics that both facilitate interactions with students and meet student expectations. Therefore, a multi-level analysis might be beneficial in exploring how much institutional integrity exists at the student level, and how much exists at the institutional level.

Conclusion

The purpose of this study was to explore and identify the predictors of thriving among first-year students of color. The results indicated that presenting diverse perspectives in class directly and indirectly contributed to the variation in thriving in this student population. In an era when students of color comprise a growing proportion of America's college population (Colby & Ortman, 2015), but persist at lower rates than their White counterparts (Ross et al., 2012), identifying pathways to thriving among students of color can provide institutions with opportunities to close this achievement gap. The results of this study indicate that exposing first-year students to diverse perspectives in the classroom may contribute positively to their engaged learning, investment of effort, relationships with peers, openness to difference, and optimism - the elements measured by the Thriving Quotient. This exposure to multiple perspectives has positive effects on all students, but is particularly influential among students of color as it is related to greater frequency and satisfaction with student-faculty interactions and contributes more significantly to their levels of thriving at the end of the first semester.

Students of color have fewer pathways to thriving than white students (Ash, Schreiner, 2016), making each known pathway an important contributor to student success. The more limited pathways to thriving among students of color provide focus for investment in opportunities optimized for thriving within this strategic population. In our study, each

significant relationship examined, with the exception of spirituality, was stronger in students of color than in White students. This finding suggests that focused student success initiatives, such as those described in this study, will benefit all students, but will have the greatest impact on students of color.

References

- American College Testing Program, (2016). *National collegiate retention and persistence to degree rates*. [<http://act.org/content/act/en/research.html>]. Retrieved February 2017.
- Ash, A. N., & Schreiner, L. A. (2016). Pathways to success for students of color in Christian colleges: The role of institutional integrity and sense of community. *Christian Higher Education, 15*(1-2), 38–61.
- Astin, A. W. (2016). *Are you smart enough?: How colleges' obsession with smartness shortchanges students*. Sterling, VA.: Stylus Publishing.
- Astin, A. (1999). Student involvement: A developmental theory for higher education. *Journal of College Student Development, 40*(5), 518–529.
- Astin, A. W. (1993). *What matters in college: Four critical years*. San Francisco, CA.: Jossey- Bass.
- Astin, A. W. (1984). Student involvement: A developmental theory for higher education. *Journal of college student personnel, 25*(4), 297-308.
- Astin, A. W. & Astin, H. S. & Lindholm, J. A. (2011). Assessing Students' Spiritual and Religious Qualities. *Journal of College Student Development, 52*(1), 39-61.
- Astin, A. W., Astin, H. S., & Lindholm, J. A. (2010). *Cultivating the spirit: How college can enhance students' inner lives*. San Francisco, CA: Jossey-Bass.
- Bean, J. P., & Eaton, S. B. (2000). A psychological model of college student retention. In J. M. Braxton (Ed.), *Reworking the Student Departure Puzzle* (pp. 48-61). Nashville, TN:

Vanderbilt University Press.

Bensimon, E. (2007). The underestimated significance of practitioner knowledge in the scholarship on student success. *The Review of Higher Education*, 30(4), 441-469.

Braxton, J. M., Hirschy, A. S., & McClendon, S. A. (2004). Reducing institutional rates of departure. *Understanding and Reducing College Student Departure*, 67-79.

Chang, M. J. (1999). Does racial diversity matter? The educational impact of a racially diverse undergraduate population. *Journal of College Student Development*, 40, 377-395.

Chipuer, H. M., & Pretty, G. M. (1999). A review of the sense of community index: Current uses, factor structure, reliability, and further development. *Journal of community psychology*, 27(6), 643-658.

Cohen, G., & Steele, C. (2002). A barrier of mistrust: How negative stereotypes affect cross-race mentoring A barrier of mistrust: How negative stereotypes affect cross-race mentoring. In G. Cohen, C. Steele, & J. Aronson (Eds.), (2002), *Improving academic achievement: Impact of psychological factors on education* (pp. 303-327). San Diego, CA: Academic Press.

Colby, S. & Ortman, J. (2015). *Projections of the size and composition of the U.S. Population: 2014 to 2060*. Retrieved from <https://www.census.gov/content/dam/census/library/publications/2015/demo/p25-1143.pdf>

Cole, D. (2007). Do interracial interactions matter ? An examination of student-faculty contact

- and intellectual self-concept. *Journal of Higher Education*, 78(3), 249–281.
- Cole, D. (2010). The effects of student-faculty interactions on minority student's college grades: Differences between aggregated and disaggregated data. *The Journal of the Professoriate*, 3(2), p. 137-160.
- Consoli, M., Delucio, K., Noriega, E., & Llamas, J., (2015). Predictors of resilience and thriving among Latina/o undergraduate students. *Hispanic Journal of Behavioral Sciences*, 37(3), 304-318.
- Constantine, M. G., Miville, M. L., Warren, A. K., Gainor, K. A., & Lewis-Coles, M. E. L. (2006). Religion, spirituality, and career development in African American college students: A qualitative inquiry. *Career Development Quarterly*, 54(3), 227–241
- Constantine M. & Sue D., (2007). Perceptions of racial microaggressions among black supervisees in cross-racial dyads. *Journal of Counseling Psychology*, 54, 142–153.
- DeNeui, D. L. (2003). An investigation of first-year college student's psychological sense of community on campus. *College Student Journal*, 37(2), 224-235.
- Dweck, C. (2006). *Mindset: The New Psychology of Success*. Random House, Inc.
- Einarson, M. K., & Clarkberg, M. E. (2010). Race Differences in the Impact of Students' Out-of-Class Interactions with Faculty. *Journal of the Professoriate*, 3(2).
- Fischer, M. J. (2007). Settling into campus life: differences by race/ethnicity in college involvement and outcomes. *The Journal of Higher Education*, 78(2), 125–156.
- Fisher, A. T., Sonn, C. C., & Bishop, B. J. (2002). *Psychological sense of community: Research, applications, and implications*. Springer Science & Business Media.
- Harper, C. E., & Yeung, F. (2013). Perceptions of institutional commitment to diversity as a predictor of college students' openness to diverse perspectives. *The Review of*

- Higher Education*, 37(1), 25–44.
- Hausmann, L. R. M., Ye, F., Schofield, J. W., & Woods, R. L. (2009). Sense of belonging and persistence in white and African American first-year students. *Research in Higher Education*, 50(7), 649–669.
- Hernandez, C. J. (2000). Understanding the retention of Latino college students. *Journal of College Student Development*, 41, 575-584.
- Hu, S. & Kuh, G. D. (2003). Diversity experiences and college student learning and personal development. *Journal of college student development*, 44(3), 320-334.
- Hurtado, S. (2001). Linking diversity and educational purpose: How diversity affects the classroom environment and student development. In G. Orfield & M. Kurlaender (Eds.), *Diversity challenged: Evidence on the impact of affirmative action* (pp. 187–203). Cambridge, MA: Harvard Education Publishing Group.
- Hurtado, S., & Carter, D. F. (1997). Effects of college transition and perceptions of the campus racial climate on Latino college students' sense of belonging. *Sociology of Education*, 70(4), 324–345.
- Hurtado, S., Carter, D. F., & Spuler, A. (1996). Latino student transition to college: Assessing difficulties and factors in successful college adjustment. *Research in higher education*, 37(2), 135-157.
- Hurtado, S.; Han, J.; Saenz, V.; Espinosa, L.; Cabrera, N.; & Cerna, O. (2007). Predicting transition and adjustment to college: Biomedical and behavioral science aspirant's and minority students' first year of college. *Research in Higher Education*, 48(7), 841-887.

- Johnson, L. D., (2012) *Spirituality as a viable resource in responding to racial microaggressions: An exploratory study of black males who attended a community college* (Doctoral dissertation). Retrieved from ProQuest
- Johnson, D. R., Soldner, M., Leonard, J. B., Alvarez, P., Inkelas, K. K., Rowan-Kenyon, H. T., & Longerbeam, S. D. (2007). Examining sense of belonging among first-year undergraduates from different racial/ethnic groups. *Journal of College Student Development, 48*(5), 525-542.
- Keyes, C.L.M. (2003). Complete mental health: An agenda for the 21st century. In C.L.M. Keyes & J. Haidt (Eds), *Flourishing: Positive psychology and the life well-lived* (pp. 293-309). Washington, D.C.: American Psychological Association.
- Keyes, C. L. M., & Haidt, J. (Eds.). (2003). *Flourishing: Positive psychology and the life well-lived*. Washington, D. C.: American Psychological Association.
- Kim, Y. K., & Sax, L. J. (2009). Student-faculty interaction in research universities: Differences by student gender, race, social class, and first-generation status. *Research in Higher Education, 50*, 437–45.
- Kinzie, J.; Gonyea, R.; Shoup, R.; Kuh, G. (2008). Promoting persistence and success of underrepresented students: Lessons for teaching and learning. *New Directions in Teaching and Learning, 115*, 21-38.
- Kinzie, J. (2012). High-impact Practices: Promoting Participation for All Students. *Diversity Democracy, 15*(3), 13-14.
- Kramer, G. L., & Associates. (2007). *Fostering student success in the campus community*. San Francisco, CA: Jossey-Bass
- Kuh, G. D., (2008). *High-Impact Educational Practices: What They Are, Who Has Access to*

- Them, and Why They Matter*. Washington DC: AAC&U Press.
- Kuh, G. D., Kinzie, J., Schuh, J. H., & Whitt, E. J., and associates. (2005). *Student success in college: Creating conditions that matter*. San Francisco: Jossey-Bass.
- Linder, C., Harris, J., Allen, E., & Hubain, B., (2015). Building inclusive pedagogy: Recommendations from a national study of students of color in higher education and student affairs graduate programs. *Equity and Excellence in Education, 48*(2), 178-194.
- Locks, A.; Hurtado, S.; Bowman, N., & Oseguera, L. (2008). Extending notions of campus climate and diversity to student's transition to college. *The Review of Higher Education, 31*(3), 257-285.
- Lounsbury, J., & DeNeui, D. (1995). Psychological sense of community on campus. *College Student Journal, 29*(3), 270-277.
- Lowe, M. R., Byron, R. A., Ferry, G., & Garcia, M. (2013). Food for thought: Frequent interracial dining experiences as a predictor of students' racial climate perceptions. *Journal of Higher Education, 84*(4), 569–600.
- Lundberg, C. A., & Schreiner, L. A. (2004). Quality and frequency of faculty-student interaction as predictors of learning: An analysis by student race/ethnicity. *Journal of College Student Development, 45*(5), 549–565.
- McIntosh, E. J. (2012). Thriving in college: The role of spirituality and psychological sense of community in students of color (Doctoral dissertation). Retrieved from ProQuest Dissertations and Theses.
- McIntosh, E. J. (2015). Thriving and spirituality: Making meaning out of meaning making for students of color. *About Campus, 19*(6).
- McMillan, D. W., & Chavis, D. M. (1986). Sense of community: A definition and

- theory. *Journal of community psychology*, 14(1), 6-23.
- Meacham, J., & Barrett, C. (2003). Commitment to diversity in institutional mission statements. *Diversity Digest*, 7(1,2), 6–9.
- Nelson Laird, T. F. (2011). Measuring the diversity inclusivity of college courses. *Research in Higher Education*, 52, 572-588.
- Pascarella, E., & Terenzini, P. (2005). *How college affects students, volume 2: A third decade of research*. San Francisco, CA: Jossey-Bass.
- Park, J. J. (2009). Are we satisfied?: A look at student satisfaction with diversity at traditionally white institutions. *The Review of Higher Education*, 32(3), 291–320.
- Robbins, S. B., Lauver, K., Le, H., Davis, D., Langley, R., & Carlstrom, A. (2004). Do psychosocial and study skill factors predict college outcomes? A meta-analysis. *Psychological Bulletin*, 130(2), 261–288. doi:10.1037/0033-2909.130.2.261
- Robbins, S. B., Allen, J., Casillas, A., Peterson, C. H., & Le, H. (2006). Unraveling the differential effects of motivational and skills, social, and self-management measures from traditional predictors of college outcomes. *Journal of Educational Psychology*, 98(3), 598-616.
- Ross, T., Kena, G., Rathbun, A., Kewal Ramani, A., Zhang, J., Kristapovich, P., & Manning, E. (2012). Higher education: Gaps in access and persistence. Washington, DC: National Center for Education Statistics. Retrieved from <http://nces.ed.gov/pubsearch/pubsinfo.asp?pubid D2012046>
- Schreiner, L. A. (2006). [Psychological sense of community on campus index]. raw data.
- Ryan, R. M., & Deci, E. L. (2000). Self-determination theory and the facilitation of intrinsic

- motivation, social development, and well-being. *American Psychologist*, 55(1), 68–78.
<https://doi.org/10.1037/0003-066X.55.1.68>
- Sarason, S. B. (1974). *The psychological sense of community: Prospects for a community psychology*. Jossey-Bass.
- Schreiner, L. A. (2014). Different pathways to thriving among students of color: An untapped opportunity for success. *About Campus*, 19(5), 10–19.
- Schreiner, L. A. (2013). Thriving in college. *New Directions for Student Services*, 143, 41-52.
- Schreiner, L. A. (2010). The “Thriving Quotient”: A new vision for student success. *About Campus*, 15(2), 2–10.
- Schreiner, L. A. (2012). From surviving to thriving during transitions. In L. A. Schreiner, M. C. Louis, & D. D. Nelson (Eds.), *Thriving in transitions: A research-based approach to college student success* (pp. 1–18). Columbia: University of South Carolina, National Resource Center for the First-Year Experience and Students in Transition.
- Schreiner, L. A., Louis, M.C., & Nelson, D. (Eds.). (2012). *Thriving in transitions: A research-based approach to college student success*. Columbia, SC: University of South Carolina, National Resource Center for The First Year Experience and Students in Transition.
- Schreiner, L., & Louis, M. (2011). The Engaged Learning Index: Implications for faculty development. *Journal on Excellence in College Teaching*, 22(1), 5–28.
- Schreiner, L. A., Kammer, R., Primrose, B., & Quick, D. (2011). *Predictors of thriving in students of color: Differential pathways to college success*. Paper presented at the Association for the Study of Higher Education, Charlotte, NC.
- Schreiner, L. A., Kalinkewicz, L., Cuevas, A. P., & McIntosh, E. J. (2013). *Measuring the*

- malleable: Expanding the assessment of student success*. Paper presented at the annual conference of the Association for the Study of Higher Education, St. Louis, MO.
- Schreiner, L. A., Pothoven, S., Nelson, D., & McIntosh, E. (2009). *The Thriving Quotient: Advancing the assessment of student success*. Paper presented at the Association for the Study of Higher Education. Vancouver, British Columbia.
- Seligman, M. E. P. (2011). *Flourish: A visionary new understanding of happiness and well-being*. New York, NY: Free Press.
- Smith, D. (2009). *Diversity's promise for higher education: Making it work*. Baltimore, MD: John Hopkins University Press.
- Snyder, T., de Bray, C., and Dillow, S. (2015). Digest of Education Statistics 2013. NCES 2015-11. *National Center for Education Statistics*.
- Steele, C. M. (1997). A threat in the air. How stereotypes shape intellectual identity and performance. *The American Psychologist*, 52(6), 613–629.
- Strayhorn, T. (2012). *College students' sense of belonging: A key to educational success for all students*. Taylor and Francis, NY.
- Tinto, V. (1993). *Leaving college: Rethinking the causes and cures of student attrition* (2nd ed.). University of Chicago Press, IL.
- Tinto, V. (1975). Dropout from higher education: A theoretical synthesis of recent research. *Review of Educational Research*, 45(1), pp. 89-125
- United States Department of Education. (2014). *National Center for Educational Statistics*. [<https://nces.ed.gov/ipeds/Home/UseTheData>]. Retrieved February 2017.

- Upcraft, M. L., Gardner, J., & Barefoot, B. (2005). *Challenging and Supporting the First-Year Student: A Handbook for Improving the First Year of College*; San Francisco: Jossey-Bass.
- Wells, R. (2008). Social and cultural capital, race and ethnicity, and college student retention. *Journal of College Student Retention, 10*(2), 103-128.
- West, K., Hagen, W. Norwood, K. (2013). Impact of college environments on the spiritual development of African American Students. *Journal of College Student Development, (54)*3, 299-314.
- Whitt, E. J., Edison, M. I., Pascarella, E. T., Terenzini, P. T., & Nora, A. (2001). Influences on students' openness to diversity and challenge in the second and third years of college. *The Journal of Higher Education, 72*(2), 172-204.
- Wilson, J., Meyer, K. & McNeal, L., (2012). Mission and diversity statements: What they do and do not say. *Innovative Higher Education, 37*, 125-139.

Tables & Figures

Figure 1 – Omnibus Model

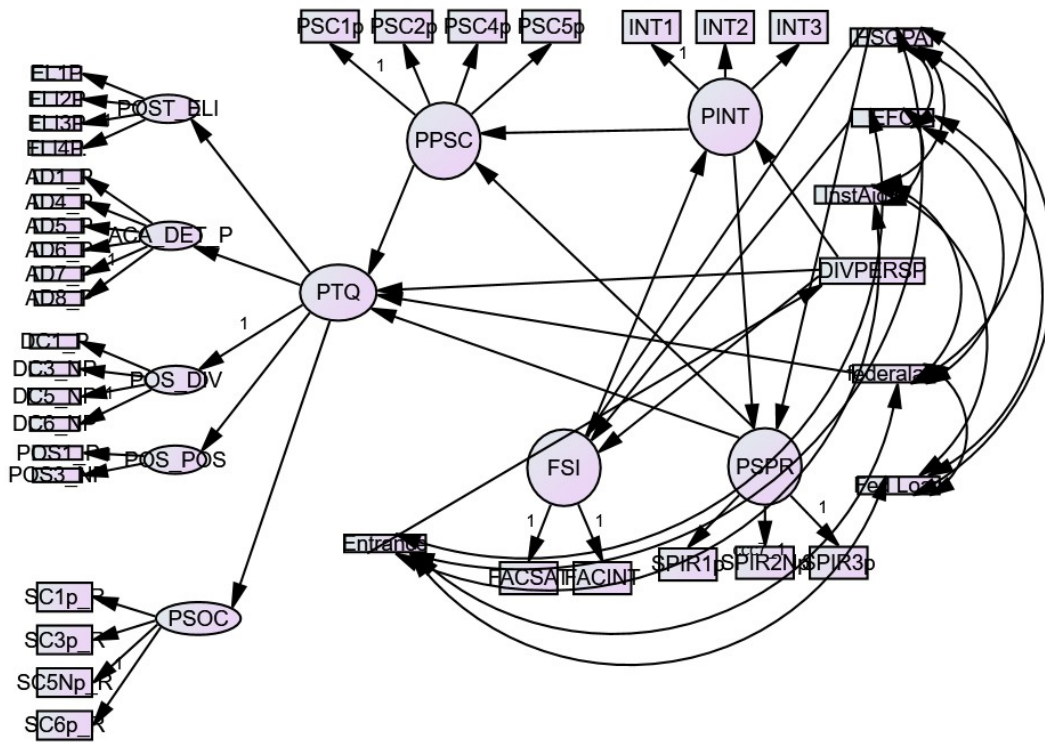


Table 1: Demographic Table

Race		
White	206	
Non-White	186	
Total	392	
Gender		
Male	77	
Female	315	
Total	392	
ACT Score		
21 and Below	54	
22-24	61	
25-27	53	
28 and Above	32	
No Score	192	
Total	392	
	267	
Federal Aid		
\$0	267	
\$2,888 and Below	25	
\$2,889 to \$4,725	26	
\$4,26 to \$5,725	25	
\$5726 to \$5,775	30	
\$5775 to \$7775	19	
	392	
	<u>M</u>	<u>SD</u>
SAT	1082.47	135.749
Estimated Family Contribution	\$22,931	\$32,011
Institutional Aid	\$15,617	\$6,014
Federal Loans	\$7,096	\$8,556

Table 2: Descriptive Statistics and Correlations and Study Variables

Variable	Descriptives		Correlations						
	M	SD	1	2	3	4	5	6	
1 Spirituality	5.26	0.80	—	.510	.444	.243	.274	.539	
2 Sense of Community	4.97	0.81	.510	—	.751	.341	.359	.661	
3 Integrity	4.88	0.76	.444	.751	—	.400	.431	.589	
4 Faculty Student Interaction	4.81	0.81	.243	.341	.400	—	.516	.344	
5 Diverse Perspectives	4.81	0.94	.274	.359	.431	.516	—	.430	
6 Thriving	4.57	0.55	.539	.661	.589	.344	.430	—	

(all correlations were significant at the .010 level or greater)

Table 3: Model Fit Statistics for Confirmatory Factor Analysis

Variable	X^2	df	p	CFI	RMSEA
Psychological Sense of Community	3.401	2	0.183	0.998	0.042
Spirituality	2.472	3	0.116	0.998	0.061
Integrity	0.011	3	0.916	1.000	0.000
Thriving	400.055	164	0.000	0.937	0.061
Faculty Student Interaction	0.000	0		1.000	0.962

Table 4: Standardized Indirect, Direct, and Total Effects on Post-Thriving

	Non-White (N=186)			White (N=206)		
	Indirect	Direct	Total	Indirect	Direct	Total
Diverse Perspective		0.276	0.542	0.23	0.271	0.501
Faculty Student Interaction	0.162		0.162	0.126		0.126
Post Institutional Integrity	0.619		0.619	0.509		0.509
Post Spirituality		0.369	0.401	0.051	0.417	0.468
Post Psychological Sense of Community		0.456	0.456		0.343	0.343
Post Thriving Quotient						

Table 5: Standardized Indirect, Direct, and Total Effects on Post-Faculty Student Interaction

	Non-White (N=186)			White (N=206)		
	Indirect	Direct	Total	Indirect	Direct	Total
Diverse Perspective		0.61	0.61		0.479	0.479
Faculty Student Interaction			n/a			
Post Institutional Integrity						
Post Spirituality						
Post Psychological Sense of Community						
Post Thriving Quotient						

Table 6: Standardized Indirect, Direct, and Total Effects on Post-Psychological Sense of Community

	Non-White (N=186)			White (N=206)		
	Indirect	Direct	Total	Indirect	Direct	Total
Diverse Perspective	0.395		0.395	0.399		0.399
Faculty Student Interaction	0.241		0.241	0.219		0.219
Post Institutional Integrity	0.039	0.881	0.92	0.074	0.809	0.883
Post Spirituality		0.073	0.073		0.149	0.149
Post Psychological Sense of Community			n/a			
Post Thriving Quotient						

| Table 7: Standardized Indirect, Direct, and Total Effects on Post-Institutional Integrity

	Non-White (N=186)			White (N=206)		
	Indirect	Direct	Total	Indirect	Direct	Total
Diverse Perspective	0.159	0.27	0.429	0.119	0.333	0.451
Faculty Student Interaction		0.262	0.262		0.248	0.248
Post Institutional Integrity			n/a			
Post Spirituality						
Post Psychological Sense of Community						
Post Thriving Quotient						

Table 8: Standardized Indirect, Direct, and Total Effects on Post-Spirituality

	Non-White (N=186)			White (N=206)		
	Indirect	Direct	Total	Indirect	Direct	Total
Diverse Perspective	0.233		0.233	0.223		0.223
Faculty Student Interaction	0.142		0.142	0.123		0.123
Post Institutional Integrity		0.543	0.543		0.495	0.495
Post Spirituality			n/a			
Post Psychological Sense of Community						
Post Thriving Quotient						

