

SHIFTING THE FOCUS: THE ROLE OF INSTITUTIONAL AND RACIAL/ETHNIC
PROTECTIVE FACTORS IN PROMOTING RESILIENCE AMONG BLACK AND LATINA
COLLEGE WOMEN

By

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ABSTRACT

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Although much of the literature has focused on the academic deficits of Black and Latino college students, there are subsets of this population that have demonstrated remarkable success despite facing societal and systemic challenges. One such group is comprised of Black and Latina college women, who have illustrated resilient academic outcomes (e.g. college enrollment rates, college achievement rates) in spite race- and gender- based discrimination (Perez et al., 2009; Snyder & Dillow, 2015). Therefore, this study explored the protective factors that assist this population in obtaining resilient outcomes in the face of various risk factors. The study used secondary data collected from a sample of female undergraduate students (N = 285) enrolled in a large Midwestern university to determine if two specific types of protective factors (i.e. institutional protective factors, racial/ethnic protective factors) play a significant role in fostering resilient outcomes among the population of interest. Specific protective factors, supported by the literature, were used to represent each type of protective factor; in particular, campus climate served as a representative of institutional protective factors and family ethnic socialization served as a representative of racial/ethnic protective factors. Using these protective factors, the current study investigated whether campus climate and family ethnic socialization predicted the resilience outcome (i.e. GPA), and whether these relationships changed based on one's race/ethnicity and year in college. It is also important to note that parental support was included in the current study as a control variable as the literature suggests that it is the strongest

protective factor for the population of interest. Results indicated that institutional and racial/ethnic protective factors are in fact significant predictors of resilience for Black and Latina college women, and that institutional protective factors are especially important for Blacks. However, these results must be interpreted with caution given the measurement limitations discussed in tandem with the results. This study adds to the literature, as there is a lack of previous research investigating institutional and racial/ethnic protective factors; instead, much of the literature explores relational protective factors, such as parental support. Future directions for research on protective factors, as well as practical implications for colleges and universities serving students of color are discussed.

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This dissertation is dedicated to my husband and my son, for serving as my greatest sources of motivation throughout this journey.

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CHAPTER I

INTRODUCTION

The literature consists of many scholarly pieces that document the academic shortcomings of Black and Latino college students (e.g. Rovai, Gallien, & Wighting, 2005). However, little attention has been given to the subsets of these populations that have obtained remarkable success despite the societal obstacles they have faced. Specifically, Black and Latina women have demonstrated markedly resilient outcomes (e.g. increased enrollment in college; Snyder & Dillow, 2015) in the field of higher of education despite experiences of social injustices such as racism and sexism (Perez et al., 2009; Sutton & Kimbrough, 2001). Despite being doubly marginalized as people of color and as women (Banks, 2009), these students have vigorously pursued their academic goals in order to achieve resilient outcomes. This exploratory study will focus on this oft-forgotten population in an effort to explore the role of specific protective factors in fostering resilient outcomes among Black and Latina college women.

Notwithstanding the resilient outcomes some students have achieved, it is clear that more work is to be done in order to promote the advancement of other Black and Latina women in the higher education realm. Although college enrollment among Black and Latina women is rising, graduation rates and academic performance appear to be lagging. Between 1976 and 2012, enrollment in degree-granting institutions increased from 4% to 15% for Latino students and from 10% to 15% for Black students (Snyder & Dillow, 2015). However, among those enrolled in four-year institutions in 2008, only 25% of Black women and 34% of Latinas graduated in 4 years (Snyder & Dillow, 2015). This is compared to an average four-year graduation rate of 44% across women from all races/ethnicities and an average graduation rate of 49% for White college women (Snyder & Dillow, 2015). Furthermore, academic performance among Black and Latina

women remain far outpaced by that of their counterparts. For example, even in a high-achieving group of women, one study found significant ethnic differences in GPA across Whites, Asians, Latinas, and Blacks (Keels, 2013). Specifically, White and Asian students were found to have the highest GPAs, Latina students had a significantly lower GPA, and Black students had the lowest GPA (Keels, 2013). The disparities in academic performance and graduation rates among Black and Latina female undergraduate students are problematic as academic achievement and persistence can have lifelong consequences. For example, the United States Bureau of Labor Statistics (2014) reported that female workers with a bachelor's degree earned 1.62 times more income and were 1.80 times more likely to be employed than those with just a high school diploma.

The underperformance among Black and Latina college women underscores the importance of understanding the factors that prevent these negative outcomes and promote resilience among these populations. A recent review by Campbell (2016), demonstrated that it is specifically important to study institutional and racial/ethnic protective factors as a disproportionate amount of the resilience literature focuses on relational protective factors. Shifting the focus to institutional and racial/ethnic protective factors is critical because the field may be producing an incomplete picture of this body of literature. If this is the case, then the information used to inform practitioners working with Black and Latina college students might not result in the most optimal outcomes for this population. If instead we, as researchers, turn to investigating areas within the field that are underdeveloped (i.e. institutional, racial/ethnic protective factors), then we can potentially help to advance the literature. And more importantly, advance practical applications of the literature for college students of color.

The focus on college students is important, as there is a paucity of research on resilience on this population. Instead, most resilience studies that focus on academic outcomes have been conducted with samples of students in grades K-12. The lack of studies on college students is unfortunate because transition to college is a stressful time, which can affect many students' academic performance (Baldwin, Chambliss, & Towler, 2003). Furthermore, the study's focus on Black and Latina women, specifically, sheds light on protective factors that are specific to these racial/ethnic and gender groups. Although the literature illustrates gender differences in students' college experiences (Kim & Sax, 2009; Wawrzynski, & Sedlacek, 2003), many resilience studies fail to disaggregate findings across males and females (Winkle-Wagner, 2015). Similarly, it is necessary to look closely at the unique experience of women who identify as Black and Latina because studies often focus on students of color as opposed to specific ethnic groups (Winkle-Wagner, 2015). The failure to disaggregate findings by race/ethnicity and gender runs the risk of obscuring the unique experiences of the individuals in these demographic groups.

Moreover, focusing on Black and Latina college women presents an intersectional view of women and of students who identify as Black or Latinx. This is critical in order to ensure the most nuanced understanding of the protective factors that are most useful for the population of interest, as race/ethnicity and gender can only be experienced simultaneously within a given individual (West & Fenstermaker, 1996). Further, the intersection of race and gender is of utmost importance for Black and Latina women because of the complex social context that their ethnic and gender groups represent (Reid & Comas-Diaz, 1990).

Therefore, the current study will examine the role of institutional and racial/ethnic protective factors in promoting resilience among Black and Latina college women. It is important to note that this study is exploratory in nature as most previous studies in this topical

area have failed to investigate institutional and racial/ethnic protective factors. This dissertation is organized as follows: Chapter I presents background information for the study, the theories used to frame the study, and a review of the limited literature related to institutional and racial/ethnic protective factors. Chapter II is an introduction to the study. Chapter III describes the methods and procedures used to analyze the data. Chapter IV details the study's results, and chapter V presents a discussion of the study and its findings.

THEORETICAL FOUNDATION

The theoretical frameworks used to frame this study are Resilience Theory and Ecological Systems Theory. Resilience theory has been applied in many fields of study; however, there has been a failure to establish a consistent definition across resilience work. This study will align with the definition that takes an ecological perspective (Bronfenbrenner, 1979), and holds that resilience is marked by positive outcomes as a result of successfully adaptive relationships between an individual and the risk and protective factors embedded within his or her ecology (Lerner et al., 2013). Several studies have documented ecological factors that are critical to research on resilience (e.g. Campa, 2010; Herndon & Hirt, 2004; Lewis & McKissic, 2010). Bronfenbrenner's (1979, 1986) ecological systems theory identifies multiple factors within one's ecological systems—microsystems, mesosystem, exosystem, macrosystem, and the chronosystem—that may affect development throughout the lifespan. In regards to resilience, Bronfenbrenner's framework explains how the individual interacts with the risk and protective factors within each system to influence how one adapts successfully despite exposure to challenging life situations. Ecological theory demonstrates that resilient outcomes are the result of a number of bi-directional influences throughout the course of one's life.

Definitions

The resilience definition above highlights each component that influences resilience: risk, protective factors, outcomes, context, and population. Risk factors are elements or circumstances that increase the likelihood of negative outcomes related to academic, personal, and social failure (Johnson, 1994). Protective factors are those that alter responses to risk in order to avoid potential negative outcomes and enhance the possibility of positive outcomes (Zolkoski, 2012). These factors are not stationary; they change in relation to context and population. This means that a particular combination of risk exposure and protective factors may effectively promote resilience for one group of people, or in a specific context, but may be ineffective for a different population, in a different context. Therefore, researchers have suggested that resilient outcomes are optimized when protective factors are introduced and strengthened at all levels of the ecological model (Benzies & Mychasiuk, 2009).

Resilience Theory and The Current Study

As the definition suggests, resilience cannot exist without risk. Resilience theory, supported by the ecological systems theory, is applicable to the promotion of academic success among Black and Latina female college students because they have demonstrated both risk exposure and subsequent resilience in the domain of higher education. Examples of risk domains that this population have been exposed to include socio-structural risk, such as, racial and gender-based discrimination; institutional risk, including non-inclusive campus climate and a lack of institutional support services; and personal risk, including low socioeconomic status, conflicting commitment to family and education, and a lack of social support (Cokley, 2000; Engle & Tinto, 2008; Gallien & Peterson, 2004; Morris & Daniel, 2008; Neville et al., 2004; Thayer, 2000).

REVIEW OF THE RELATED LITERATURE

Protective Factors

Within the social sciences, a vast amount of research has been conducted in order to identify protective factors that foster resilience among various groups of people. However, for Black and Latina college women, research focused on institutional and racial/ethnic protective factors is sparse compared to studies on other types of protective factors (Winkle-Wagner, 2015; Campbell, 2016). Nonetheless, the studies that do exist suggest that these understudied types of protective factors may, in fact, be useful in fostering resilience for the population of interest.

The Role of the Institutional Support in Promoting Resilience

Institutional protective factors are factors within the confines of the college setting that are not relational (Campbell, 2016). Compared to other types of protective factors, the institution in which students are embedded is perhaps the most closely related to their ability to succeed academically given that academics are the primary function of the institution. Therefore, it was surprising that not many studies in this body of literature included an examination of an institutional protective factor. Further, even fewer studies found a significant relationship between institutional protective factors and resilient outcomes. Among the studies that emphasized the role of institutional protective factors, 67% highlighted campus organizations (e.g., Fischer, 2007; Kuh et al., 2008), 17% emphasized campus services and resources (e.g., Cabrera & Padilla, 2004; Patton, 2006), and another 17% underscored a supportive campus climate (e.g. Hurtado, Carter, & Spuler, 1996; Wolf-Wendel, 2000). This following section will examine the protective processes found at the institutional level.

Campus Organizations

Across the studies that investigated campus organizations, types of organizations that were related to resilience include academic clubs and honor societies (Sutton & Kimbrough, 2001), racial/ethnic organizations (Lewis & McKissic, 2010; Museus, 2008; Sutton & Kimbrough, 2001), religious organizations (Lewis & McKissic, 2010; Strayhorn, 2011; Walker & Dixon, 2002), Greek Letter organizations (Sutton & Kimbrough, 2001), and other extracurricular clubs and organizations (Fischer, 2007; Kuh et al. 2008, Perez et al., 2009).

One study found that having on-campus ties through involvement in any type of campus organization increased GPA for Blacks and Latinas (Fischer, 2007). Another study supported these results by indicating that student engagement in campus organizations was predictive of increases in both GPA and persistence rates (Kuh et al., 2008). While these studies did not focus on a specific type of organization, others suggested that involvement in specific types of organizations were especially beneficial for students of color.

Most of the studies denoting specific types of organizations highlighted race-based organizations and religious organizations as those that are most beneficial for Blacks and Latinas. For example, one study found that ethnic student organizations contribute to persistence through cultural validation, cultural expression, and cultural familiarity (Museus, 2008). The idea here is that students persist to graduation because they are more likely to stay in college if they have a niche in which they are able to embrace their culture. Religious organizations and clubs such as participation in the campus gospel choir played similar roles (Lewis & McKissic, 2010). It is interesting to note that very few studies highlighted specific organizations beyond the realms of race and religion (e.g. Sutton & Kimbrough, 2001).

Ethnic differences in the findings related to campus organizations include the examination of religious organizations solely among Black samples. Interestingly, the same is true for studies focused on race-based organizations. In other words, the studies that sought to uncover the importance of religious and racial/ethnic organizations included either an entirely Black sample or a sample comprised of students from different races/ethnicities, but excluded Latinx. The presence of these organizations in research on Black college women may suggest differences in researchers' conceptualization of contributors of resilience for Blacks and Latinas. One may conclude that researchers in this field hold specific beliefs about which types of organizations are most beneficial for Blacks versus Latinas. In this case, they may believe that religious and racial/ethnic organizations are more beneficial for Black students and therefore, fail to investigate their usefulness among Latinx students. It is important to note that this bias will inevitably influence findings from this body of literature.

These studies suggested that campus organizations are effective in promoting resilience among Black and Latina students, but that racial/ethnic and religious organizations were especially beneficial for Black students. These findings should be cautiously interpreted as specific findings may have been found for Black students as a result of the way in which researchers' have conceptualized contributors of resilience in this particular category of protective factors.

Campus Resources and Services

In addition to student organizations, some of the studies that focused on institutional protective factors indicated that campus services and resources were important in promoting resilience among Black and Latina college women. While only two studies examined campus services and resources, both of these studies confirmed a relationship between campus

services/resources and resilience. Campus services and resources in this body of literature include Black cultural centers, which serve as a safe space for Black students at predominantly White universities (Patton, 2006) and Chicano and Latinx service centers, which provide Latinx students with the ability to surround themselves with students from similar backgrounds (Cabrera & Padilla, 2004).

Patton (2006) conducted a qualitative study with African American students and yielded results suggesting that the Black Cultural Center at a predominantly White institution played a vital role in providing the safe and welcoming environment that students found advantageous for their academic success. Similarly, Cabrera and Padilla's (2004) study revealed the importance of the Chicano and Latinx service center for Latinx students. Specifically, one Latina student noted that the Chicano and Latinx service center allowed her to work on social issues concerning the living and working conditions for Latinx immigrants, which in turn empowered her to do well academically (Cabrera & Padilla, 2004).

While only these two studies explored the role of specific services in promoting academic success among Black and Latina students, it is important to note that a number of other studies investigated the role of campus services and resources, but these studies did not focus on academic outcomes. Nonetheless, the few studies that did seek to understand how campus services/resources influence students' academic success suggest that these resources are significantly related to resilience for the population of interest.

Supportive Campus Climate

In addition to campus organizations and services, the role of campus climate was also investigated and confirmed in a few studies in this area of research. Although to a great degree the protective factors discussed within the categories of student organizations and campus

services may be included in the overall campus climate, sociocultural protective factors are distinct features that comprise a campus's climate. Sociocultural protective factors are essential to campus climate as they indicate the campus's level of inclusivity and support for its students' various identities, especially those who are often marginalized in society and in institutions of higher education. Therefore, considering that Black and Latina college women comprise historically marginalized racial/ethnic and gender identity groups, campus climate is especially relevant for these populations.

One study conducted a qualitative examination of African American, Latina, and White college women at five colleges and found that campuses with high academic expectations, positive role models, opportunities for leadership, and caring and supportive environments were more likely to promote student success as measured by higher GPAs than their counterparts (Wolf-Wendel, 2000). In another study, a college climate measure was used that only contained one positive protective factor (i.e. student centered faculty and administration); the remaining components of the measure (i.e. perceptions of racial/ethnic tension, experiences of discrimination) were included to uncover negative aspects of campus climate as opposed to its protective components (Hurtado, Carter, & Spuler, 1996).

Hurtado, Carter, and Spuler's (1996) study sheds light on a trend in the literature on campus climate. While there are only a few studies focused on campus climate as a protective factor for students of color, there are a plethora of studies that explore the negative aspects of campus climate (or campus climate as a risk factor for students with marginalized identities).

An important consideration provoked by this section is the possibility that most college campuses still struggle with ensuring positive or inclusive campus climate, and therefore, researchers may be primarily studying the negative aspects of campus climate because of its

prominence. Nonetheless, although there were only a few studies that focused on campus climate in a positive light, many of the studies that explored ways in which campuses support students' various identities (i.e. race-based organizations and spaces; Patton, 2006, religious organizations; Strayhorn, 2011) may be deemed as related to campus climate.

Summary of Institutional Protective Factors

It is important to take into account that researchers' conceptualizations of factors that promote resilience play a critical role in determining which factors will be represented in the literature. Few researchers investigated institutional protective factors in their study of resilience hence the low number of studies that support a relationship between these factors and resilience. Additionally, there are a number of studies that investigated institutional factors throughout the literature; however, these studies often explored ways in which said factors may be used to promote non-academic outcomes such as sense of belonging, social integration, or student engagement. This may suggest that researchers believe that institutional protective factors are related to non-academic outcomes as opposed to academic outcomes. This domain of protective factors warrants much additional research to reveal its true contribution to resilience. The current study aims to fill this important gap in the literature by contributing a preliminary examination of these types of protective factors to the literature.

The Role of Racial/Ethnic Protective Factors in Promoting Resilience

Racial/ethnic protective factors are those that contribute to positive outcomes because they provide students with opportunities to connect to their race/ethnicity in relationships or institutional contexts. These studies are pivotal as they placed emphasis on one's race/ethnicity, a salient identity for most students of color. As students of color, many of whom must navigate a predominantly white culture at PWIs, race is a constant part of their lives, which often influences

how they experience college on a daily basis. Therefore, it is surprising that only a few studies have examined and pointed to the importance of racial/ethnic protective factors in promoting academic success among Black and Latinx students.

Across these studies, 39% emphasized same-race peers (e.g., Cabrera & Padilla, 2004; Coker, 2003; Getz, 2000; Herndon & Hirt, 2004), 17% highlighted same-race faculty members (Baker, 2013; Guiffrida, 2005; Lee, 1999), another 17% underscored ethnic student organizations (Lewis & McKissic, 2010; Museus, 2008), 11% discussed racial/ethnic specific services (Cabrera & Padilla, 2004; Patton, 2006), and 5% highlighted the family's role in students' racial/ethnic socialization (Brown, 2008). All of the studies that investigated the role of racial/ethnic protective factors confirmed their hypotheses that these protective factors were critical in supporting resilient outcomes among students of color.

Racial/Ethnic Relationships – Same-Race Peers and Faculty/Mentors

The racial/ethnic peer studies were the most prominent protective factors among all of the racial/ethnic protective factors (e.g. Cabrera & Padilla, 2004; Getz, 2000; Lewis & McKissic, 2010; Littleton, 2003; Martin Aleman, 2000; Martinez-Vogt, 2015). Further, all of the studies that investigated racial/ethnic peers found support for an association between this factor and resilience. These relationships were of particular benefit to Black and Latina college women as they help to provide a sense of community on predominantly white college campuses (Herndon & Hirt, 2004; Littleton, 2003). In Martin Aleman's (2000) study, for instance, not only did same-race female friendships help boost students' academic success, but they also help to combat "racial chilliness" that often has a negative impact on academic achievement. This study points to the importance of friendships at the intersection of race and gender in order to directly

enhance students' academic performance as well as to do so indirectly by combating the negative effects of race relations seen across college campuses.

Similarly, all of the studies that explored same-race faculty/mentors clearly pointed to the importance of these factors in facilitating resilience (e.g. Baker, 2013; Dorsey & Jackson, 1995; Guiffrida, 2005; Lee, 1999). In one study with a sample comprised of Blacks and Latinx, both general faculty and same-race faculty were included as potential predictors of GPA; however, only same-race faculty emerged significant for both ethnic groups (Baker, 2013). The general faculty variable was only significant for Latina students; however, same-race faculty was significant for both Latinas and Blacks. Is it also important to note that even among Latinas, same-race faculty was significant at the $p < .01$ level while general faculty was significant at the $p < .05$ level (Baker, 2013).

In addition, among the articles that focused on students' relationships with faculty and mentors, the term "other-mothering" was examined solely among Black women's relationships with Black female faculty members (Guiffrida, 2005). This term has its roots in slavery when mothering other women's children was a necessity (Beauboeuf-Lafontant, 1999). However, it has transcended through time and in the context of academic resilience, represents students' expectations that African American faculty members will go above and beyond their academic roles in order to "mother" them appropriately (Guiffrida, 2005). In doing so, students expect faculty members to feel a sense of obligation to not only contribute to their academic development but also to their psychosocial and emotional development (Guiffrida, 2005). Therefore, students described these faculty members as skilled in providing comprehensive career, academic, and personal advising, as well as support and advocacy. These "mothers" also

challenge students in ways that cause them to feel that they must rise to faculty/mentors' expectations in ways similar to students' desire to make their parents proud (Guiffrida, 2005).

Race-Based Organizations & Resources

Similar to the previous protective factor, all of the studies that examined race-based organizations supported their importance in fostering resilience. Interestingly, the type of college that students attended was a determinant of the importance of race-based protective factors. Among a sample of Black college students, one study found that student organizations were important for Black students, but primarily those attending predominantly White institutions (PWIs) (Sutton & Kimbrough, 2001). Students attending PWIs were more likely to be involved in Black organizations while students attending Historically Black Colleges and Universities (HBCUs) were more likely to be involved in academic clubs, honor societies, or student government organizations that did not place emphasis on race (Sutton & Kimbrough, 2001). Black service centers specifically tailored to groups of Black students and others tailored to Latinx had similar positive effects on these groups of students (Cabrera & Padilla, 2004; Patton, 2006).

Family Racial/Ethnic Socialization

In addition to these racial/ethnic protective factors, one study also indicated that racial/ethnic socialization by one's family also served as a protective factor for Black and Latina college women (Brown, 2008). This study suggested that positive racial socialization that encouraged students to be proud of their racial backgrounds was critical in supporting high academic achievement and persistence for the population of interest (Brown, 2008).

Summary of Racial/Ethnic Protective Factors

These studies indicate that there is a unique contribution of racial/ethnic protective factors in promoting resilience among students of color. However, it is clear that there is little support for these types of protective factors given the limited research dedicated specifically to racial/ethnic protective factors. This type of protective factors is similar to institutional protective factors because they are studied infrequently throughout the literature, which has inevitably decreased the prominence of racial/ethnic protective factors in the literature. Therefore, this category of protective factors warrants further review to uncover its true association with resilient outcomes. The current study will advance this area of research by taking an exploratory look at the role of these types of protective factors in promoting resilient academic outcomes.

Summary of the Literature

Overall, it is apparent that there are only a few studies focused on racial/ethnic and institutional protective factors. As such, it is difficult to draw conclusions about these factors as contributors to the success of Black and Latina students because researchers' failure to examine these factors suggest that they are often not thought to play vital roles in the academic achievement of this population. These factors are often omitted from investigations seeking to understand this phenomenon. Resilience is being studied in a biased manner, as the literature revealed a lack of studies that conceptualized resilience as influenced by institutional and racial/ethnic protective factors.

It is also important to note that many of the studies represented in this review were conducted with samples comprised of both African Americans and Latinas and did not disaggregate their findings across racial/ethnic groups. Only a few studies actually highlighted differences across the two ethnic groups. These studies found that results varied across the two

ethnic groups with regards to which aspects of certain protective factors are most pivotal for each. The use of mixed samples in studies that do not disaggregate their findings by ethnic groups is a major gap in the literature that the current study aims to address by explaining differences in findings for Blacks and Latinas.

The literature demonstrates that resilience among Black and Latina college women is an area of research that warrants additional inquiry, especially as it relates to the responsibility of institutional and racial/ethnic protective factors, and specifically campus climate and family ethnic socialization, in promoting success among students of color. While these domains are lacking in research exploration, research related to these specific protective factors are especially limited. In addition to these content-based gaps in the literature, methodological trends indicate a need for more advanced methodological approaches as some studies only included descriptive analyses (e.g. Cabrera et al., 1999; Clark et al., 2006; Newton et al., 2013; Sutton & Kimbrough, 2001). The current study will answer the call for more advanced methodologies by using moderated regression analyses to examine the intersections of protective factors and race as well as protective factors and year in school.

CHAPTER II

THE PRESENT STUDY

The current study is exploratory in nature given that little is known about the domains of protective factors, as well as the specific protective factors, being investigated in this study. This study's primary goal is to examine the impact of institutional and racial/ethnic protective factors on resilience (while controlling for relational protective factors) among Black and Latina college women. Specifically, the study's main objectives are to:

- (1) Investigate the relationship between campus climate and GPA while accounting for parental support, and
- (2) Examine the association between family ethnic socialization and GPA while accounting for parental support.

Secondary objectives are to explore whether race/ethnicity and year in college moderate the effects of the aforementioned variables (i.e. campus climate, family ethnic socialization) on GPA. With these goals in mind, this study will include parental support as a control variable and as a representative of relational protective factors. Campus climate will serve as a representative of institutional protective factors, family ethnic socialization will represent racial/ethnic protective factors, and GPA will represent resilient outcomes.

Research Questions

1. What is the effect of campus climate on GPA after accounting for parental support?
2. What is the effect of family ethnic socialization on GPA after accounting for parental support?
3. Does race/ethnicity moderate the effect of campus climate and family ethnic socialization on GPA?

4. Does year in college moderate the effect of campus climate and family ethnic socialization on GPA?

The Variables of Interest

Campus climate and family ethnic socialization will represent institutional and racial/ethnic protective factors, respectively, because they were the least studied in each protective factor category. Specifically, campus climate was only seen in 17% of the institutional studies and family ethnic socialization was seen in only 5% of the racial/ethnic studies. The lack of studies investigating these variables indicates the importance of focusing on campus climate and family ethnic socialization in order to advance the understanding of these variables. On the other hand, parental support will serve as the control variable because Campbell's (2016) review suggest that relational protective factors are the most closely related to resilience among Black and Latina undergraduate females. Furthermore, family or parental support was the strongest variable to control for when seeking to account for relational protective factors (Campbell, 2016). Finally, GPA will be used as the marker of resilience in this study because the GPAs of Black and Latina college women are lagging when compared to those of their counterparts (Keels, 2013). Therefore, increased GPAs will indicate resilient outcomes for a population that is at risk of underperformance in the area of academia.

Furthermore, the two primary variables of interest (i.e. campus climate, family ethnic socialization) are important because they are of particular relevance to the population of interest. Campus climate, for example, is important because "The academic, social, and psychological worlds inhabited by most non-White students on predominantly white campuses are substantially different in almost every respect from those of their White peers" (Pascarella & Terenzini, 1991, p. 644). Therefore, when students of color enter a predominantly White environment it is critical

for said environment to be inclusive and supportive of the differences they bring with them. By focusing on this variable, this study will shed light on how inclusive and supportive the participants perceive their campus to be and how their perception of campus climate impact their ability to achieve resilient outcomes. Also, focusing on campus climate has the potential of preventing victim blaming (Ryan, 1976) and placing the responsibility of fostering resilience in the hands of the institution as opposed to making students and families the ones who are primarily responsible for their own resilience.

In regards to family ethnic socialization, this variable is important because parents' and other family members' expose youth to cultural values and behaviors that impact how they navigate through various environments (Umana-Taylor et al., 2009). This socialization prepares children who eventually become college students to cope in environments that they may perceive as non-inclusive or unsupportive. Therefore, coping strategies that some students may use to thrive in less than optimal environments may be related to the ways in which students were socialized by their families in regards to their ethnic backgrounds. It is critical to begin the exploration of this variable given that it is understudied yet quite relevant to the problem at hand.

CHAPTER III

METHOD

This exploratory study will use secondary survey data collected by Johnson (2013) to address the goals and objectives outlined above. This methodology was selected because it will allow the researcher to measure the primary variables of interest as well as additional descriptive and control variables included in the study. The survey was an online survey distributed on a small scale only to students who met the sampling criteria, which will be described below. The online survey was used because of its advantageous features, such as lower costs, reduced implementation time, and greater access to technology across college campuses (Evas & Mathur, 2005; Wright, 2005).

Setting

Employing a cross-sectional design, this study utilized data that was collected in the spring semester of 2014 from a large, research university located in the Midwestern part of the United States. This predominantly White university was suitable for exploring the study's key variables (i.e. campus climate and family ethnic socialization) given its proportions of students by race and gender. According to the university's Office of Planning and Budgets (2016), the university was comprised of 6.7% Black students, 3.8% Latinx students, and 50% females in 2014. These proportions suggest that there was an adequate amount of females to assess resilience in an entirely female sample, and an underrepresentation of students of color, which suggested that these students might feel marginalized in this setting.

Sample

Black and Latina female undergraduate students from the university described above were recruited for data collection. In order to be selected for inclusion in the sample, students not

only had to identify as Black or Latina women, but also had to be non-international students in their first through fifth year at the selected institution. Further, the sampling criteria restricted students from identifying as a Black-Latina, instead the sample solely consisted of students who identified as either Black *or* Latina. Students also had to meet one of the following criteria in order to be invited to complete the survey: (1) have a 3.5 or higher high school GPA, (2) a 2.7 or greater cumulative college GPA, or a (3) 3.0 or better in the semester in which the data was being collected. These criteria were selected in order to ensure a high-achieving sample in which to investigate academically resilient outcomes. After contacting the university's office of registrar, researchers responsible for collecting the data obtained contact information for 989 African American women and 534 Latinas who met these criteria and were enrolled in the spring semester of 2014.

The data collectors sent invitations to participate in the study to this entire sample of 1,523 students along with instructions explaining how to access the survey website in order to complete the survey. In addition, two reminder emails urging student participation were sent following the initial invitation to participate in the study. If students chose to participate, they were required to access the survey using the Qualtrics link provided, sign the consent form (see Appendix 4), and proceed to the study. The survey remained open for participation three weeks following the date of the initial invitation to participate. Given that the survey was entirely online and anonymous, no contact was ever made with the participants. However, those collecting the data were sure to include debriefing and support materials at the end of the survey as well as instructions on how students' may obtain their incentive, which was in the form of a \$10 gift card. Of the 1,523 students who were invited to participate in the study, only 495 (32.5%) chose to participate.

Further, the sample of 495 participants contained a plethora of missing data; therefore, the researcher decided to remove all cases (or participants) that consisted of more than 20% missing data, and retain all those with at least 80% of their data completed. This procedure lead to a final sample of $N = 285$ students, of which $n = 193$ (67.8%) were Black and $n = 92$ (32.2%) were Latina. The average age of these students is 20.52 years. Almost all (97.8%) students were enrolled in the institution full time. The percentages of students across year in college are as follows: 33% were seniors (4th year), 26.3% were juniors (3rd year), 23.5% were sophomores (2nd year), 11.5% were seniors beyond their 4th year (5^{th+} year), and 2.8% were freshmen (1st year). This is mostly similar to the overall population of Black and Latina undergraduate females (2,422 students—1,620 Blacks, 802 Latina—enrolled in 2014) at the institution of interest; for example, the average age of those in the general institution's population is 20.60 years and 88.10% are enrolled in the institution full time. Differences in the study's sample and the institution's population primarily lie in the percentages of students across year in college: 33% were freshmen, 23.8% were juniors, 23.1% were seniors (2nd year), and 20% were sophomores (1st year) (Office of Planning and Budgets, 2016). These differences may be a result of the selection criteria described above.

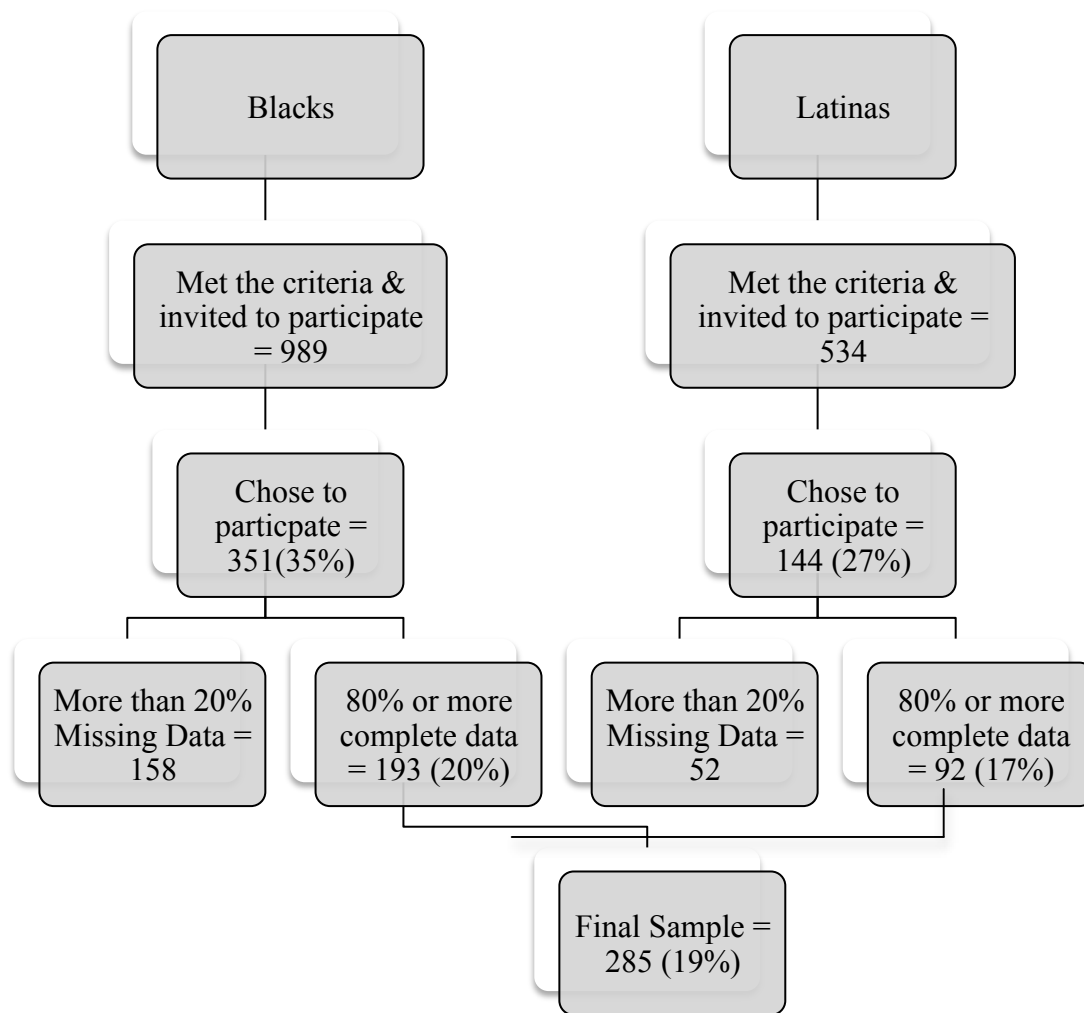


Figure 1. Sample Break-down One thousand five hundred and twenty-three students were invited to participate in the study; of those invited, 495 students participated. Of those who participated, 285 students completed at least 80% of the survey. Therefore, there are 285 students in the final sample; of this total, 193 are Black and 92 are Latina. On the other hand, 158 Black students and 52 Latinas were removed from this study's sample because they did not complete at least 80% of the survey.

Measures

Grade point average (GPA)

The measure of resilience that will be used in this study is GPA. GPA is a self-reported variable measured on a scale of 0.0 – 4.0. Students were asked to report their GPA anonymously on the survey described above. The participants' college GPA at the time of the study was

measured by a single item, which asked, “What is your current grade point average?” All respondents appropriately responded on a scale of 0.0 – 4.0. Previous research on students of color has found a strong correlation, .76, between self-reported grades and official grades (Dornbusch, Ritter, Leiderman, Roberts, & Fraleigh, 1987).

Perceived Parental Academic Support

A revised version of the *Perceived Parental Academic Support Scale (PPASS)* (Chen, J. J.-L., 2005) was used to measure perceived parental academic support. The original PPASS consisted of 31 items representing six dimensions: interpersonal (i.e. relationship and communication), cognitive (i.e. interpretation of expectations), emotional (i.e. care and encouragement), behavioral (i.e. social control and monitoring), instrumental (direct assistance with schoolwork, discussion about school-related matters, and provision of educational resources), and overall support. The version of the scale used to collect the data used in this study only consisted of 24 items, and scale refinement techniques performed on the 24-item scale further reduced the scale to 15 items in order to create a unidimensional scale for use in the current study. The scale refinement techniques used called for each of the 24 items to be evaluated by examining the corrected item-total correlations as suggested by scale development theory (Devellis, 2003). The researcher conducted scale reliability analyses in SPSS Version 23 in order to calculate the corrected item-total correlations. Nine of the 24 items were removed from the PPASS as a result of low corrected item-total correlation.

Examples of the 15 items used in the current study include: “My parents help me find ways to resolve school problems” and “My parents have high expectations for me to do well in school.” Respondents indicated their responses on a 5-point Likert scale ranging from 5 (*strongly agree*) to 1 (*strongly disagree*). Some items on this scale were also reverse scored; for example:

“My parents do not care whether I do well in school or not” and “My parents do not care about my academic progress.” These items will be reverse coded prior to data analysis. For the sample used in the current study, the revised version of the PPASS had a high Cronbach’s alpha internal reliability value of .92.

Family Ethnic Socialization

The Family Ethnic Socialization Scale (FES; Umana-Taylor & Fine, 2004) will be used to measure family ethnic socialization. The scale is comprised of nine items; example items include: “My family teaches me about my ethnic/cultural background” and “Our home is decorated with things that reflect my ethnic/cultural background.” Respondents indicated their responses on a 5-point Likert scale ranging from 5 (*very much true*) to 1 (*not true at all*). Similar to the PPASS, scale refinement techniques (Devellis, 2003) were conducted on this scale, but none of the corrected item-total correlations for the items on this scale were low enough for an item to be removed. The composite score yielded from this scale has to be predictive of GPA in order for FES to be considered a contributor of resilience in this study. This scale was developed on a group of Mexican-origin Latino adolescents living in the United States, and has been validated for the current sample. For the sample used in the current study, the scale had a high Cronbach’s alpha internal reliability value of .89.

Campus Climate

The Campus Climate Scale was constructed for the study in which the survey data was originally collected (Johnson, 2013). The scale originally consisted of eight items, used to measure participants’ perception of campus climate. However, two items were removed after conducting the scale refinement techniques described above (Devellis, 2003), resulting in a six-item scale. Example items on this scale include: “I feel a strong sense of belonging at [my

institution]” and “[My institution] has been very welcoming.” Respondents indicated their responses on a 7-point Likert scale ranging from 7 (*strongly agree*) to 1 (*strongly disagree*). Some items on this scale were also reverse scored; for example: “I often feel I don’t belong here” and “[My institution] has not been welcoming to me.” These items will be reverse coded prior to data analysis. The composite score yielded from this scale has to be predictive of GPA in order for campus climate to be considered a contributor of resilience in this study. For the sample used in the current study, the scale had a high Cronbach’s alpha internal reliability value of .84.

Race/Ethnicity

Race and ethnicity were measured using two items. The race item asked, “How would you describe yourself?” and presented various racial identities as options for students to select from while the ethnicity item asked, “Are you Hispanic, Latina, or of Spanish origin?” Participants who identified as Black, African American, or of African descent will be coded 1, and those who identified as Hispanic, Latina, or of Spanish origin will be coded 0.

Year in College

Year in college was measured using one item, which was essentially a phrase accompanied by five options. The phrase stated: “Are you currently... .” The accompanying options were freshman (1st year), sophomore (2nd year), junior (3rd year), senior (4th year), and senior (5th+ year).

Data preparation

Data Filling

After determining that the data was missing at random, the researcher utilized a missing data technique, namely, means substitution, in order to appropriately replace the (20% or less) data that was missing from the remaining cases. The Means Filling/Substitution technique allows

researchers to replace any missing value with the mean of that variable for all other cases. This technique has the benefit of not changing the sample mean for that variable.

Data Analytic Plan

Moderated Linear Regression

A series of moderated linear regressions were employed to address the research questions. Four models sought to uncover the relationships between campus climate and GPA and between family ethnic socialization and GPA. These models also examined whether or not these relationships changed at different levels of race/ethnicity and year in college. In the first model, the researcher aimed to discover if campus climate predicts GPA, and if the relationship between campus climate and GPA is moderated by race/ethnicity. In the second model, the goal was to determine if family ethnic socialization predicted GPA, and if the relationship between family ethnic socialization and GPA was moderated by race/ethnicity. The third model was similar to the first in that it also tested the relationship between campus climate and GPA, but it is different because it examined whether or not this relationship is moderated by year in college. And lastly, the fourth model was similar to model number two in its investigation of the relationship between family ethnic socialization and GPA, but it also tested whether or not this relationship is moderated by year in college. In other words, these models tested the direct relationships between the independent and dependent variables, while also testing if these relationships are different for Blacks versus Latinas and for underclassmen (i.e. freshman and sophomore students) versus upperclassmen (i.e. juniors and seniors).

The selected statistical technique, multiple regression models, was appropriate for the examination of these research questions as it produces information on the incremental increase in GPA for every one-point increase in the independent variables. Cohen (1968) proposed multiple

regression analyses as a general data analytic strategy that can analyze combinations of categorical and continuous variables. Therefore, race was entered into each model as a categorical variable (i.e. coded 0 for Latinas, 1 for Blacks) while the continuous variables, perceived parental academic support, perceived family ethnic socialization, and perceived campus climate were grand-mean centered before being entered into the model (Aiken, West, & Reno, 1991). The interactions in each model were represented as product terms created by multiplying the two independent variables used to create a specific interaction (i.e. campus climate X race/ethnicity) (Aiken, West, & Reno, 1991).

CHAPTER IV

RESULTS

Descriptive Statistics

Prior to investigating the study's research questions, descriptive statistics were calculated for the full sample as well as for Black and Latina women separately. Descriptive statistics were calculated for the control, predictor, and outcome variables: perceived parental support, perceived family ethnic socialization, perceived campus climate, and grade point average (GPA) (see Table 1). As shown in Table 1, a series of independent samples t-tests between proportions indicated that there were no significant differences between Blacks and Latinas on the control and independent variables, but Latinas had a significantly higher GPA on average than Blacks.

Table 1. Control, Predictors, and Outcome Variables Across Ethnic Groups

	Full Sample	Blacks	Latinas	Test of Differences across Groups
	<i>M (SD)</i>	<i>M (SD)</i>	<i>M (SD)</i>	
Perceived Parental Support	3.77 (.73)	3.80 (.74)	3.71 (.72)	$t(283) = .95$
Perceived Family Ethnic Socialization	3.23 (.96)	3.29 (.93)	3.11 (1.00)	$t(283) = 1.55$
Perceived Campus Climate	4.96 (1.12)	4.92 (1.08)	5.04 (1.21)	$t(283) = -.85$
Grade Point Average (GPA)	3.04 (.48)	2.98 (.47)	3.17 (.48)	$t(283) = -3.26^{**}$

Note. $*p < .05$ $**p < .01$

*Moderated Linear Regression Models Predicting GPA by Climate, Family Ethnic Socialization,
& Race/Ethnicity*

In the first model, a moderated linear regression analysis was employed to investigate if perceived campus climate predicted GPA, and if race/ethnicity played a moderating role in this relationship. Perceived parental support was entered as a control variable, the main effects of campus climate and race/ethnicity were then examined, and finally, the interaction between campus climate and race/ethnicity were investigated. While the overall model was significant ($F(4, 280) = 3.73, p < .05$), with an R^2 of .05, the only variable with a significant regression equation was race/ethnicity (see Table 2). The results of this model indicated that neither perceived campus climate nor the interaction between perceived campus climate and race/ethnicity reached statistical significance in predicting GPA.

The second model was similar, and yielded similar results. This model investigated the main effect of perceived family ethnic socialization, race/ethnicity, and the interaction between family ethnic socialization and race/ethnicity (parental support was also entered as a control variable). Similar to the previous model, only race/ethnicity emerged as significant in this model (See Table 3). In this model, the significant regression equation for the overall model was $F(4, 280) = 3.81, p < .05$, with an R^2 of .05. This model suggests that neither family ethnic socialization nor the interaction between family ethnic socialization and race/ethnicity reached statistical significance in predicting GPA.

Table 2. Moderated Regression Predicting GPA by Campus Climate and Race/Ethnicity

Full Sample	Variable	<i>B</i>	<i>SE</i>	β	P value	<i>F</i>	<i>R</i> ²
(<i>N</i> = 285)	Parental Support	.03	.04	.05	.ns	3.73**	.05
	Campus Climate	.04	.03	.09	.ns		
	Race/Ethnicity	-.10	.03		<.05		
				-.19			
	Climate X Race	.01	.03		.ns		
				.03			
	Constant	3.08	.03		<.05		

Parental support and campus climate were grand mean centered prior to the analysis.

Note. **p* < .05 ***p* < .01

Table 3. Moderated Regression Predicting GPA by Family Ethnic Socialization and Race/Ethnicity

Full Sample	Variable	<i>B</i>	<i>SE</i>	β	P value	<i>F</i>	<i>R</i> ²
(<i>N</i> = 285)	Parental Support	.07	.04	.10	.ns	3.81**	.05
	Family Ethnic Socialization	-.06	.03	-.11	.ns		
	Race/Ethnicity	-.10	.03	-.19	<.05		
	FESM X Race	-.01	.03	-.01	.ns		
	Constant	3.08	.03		<.05		

Parental support and campus climate was grand mean centered prior to the analysis.

Note. **p* < .05 ***p* < .01

Moderated Linear Regression Models Predicting GPA by Climate, Family Ethnic Socialization, & Year in College

The third and fourth regression models yielded non-significant results for all variables in the models. In the third model, parental support was entered as a control variable, then the main effects of perceived campus climate and year in college were examined, and finally the interaction between perceived campus climate and year in college were investigated. Neither the main effects nor the interaction term reached significance. In the fourth model, parental support was entered as a control variable, then the main effects of perceived family ethnic socialization and year in college were examined, and finally the interaction between perceived family ethnic socialization and year in college were investigated. Neither the main effects nor the interaction term yielded significant results.

Additional Analyses

Given the nonsignificant findings in the models above, I conducted additional analyses to attempt to understand these null findings. Since neither campus climate nor family ethnic socialization were significant in the moderated regression models above, I conducted simple regression analyses to determine the relationship between campus climate and GPA as well as the relationship between family ethnic socialization and GPA (without accounting for the additional variables in the previous models). The simple linear regressions calculated to predict GPA based on campus climate and family ethnic socialization both yielded nonsignificant results though they were near significance.

For perceived campus climate, the simple regression equation was $F(1, 283) = 3.87, p = \text{n.s.} (.05)$, with an $R^2 = .01$. For perceived family ethnic socialization, the regression equation was $F(1, 283) = 2.56, p = \text{n.s.} (.11)$, with an $R^2 = .01$. I conducted these simple regression analyses

without controlling for parental support because preliminary correlational analyses indicated that parental support was not significantly related to GPA. This was true for the full sample as well as for the separate Black and Latina subsamples. These simple regression analyses confirmed that these variables (i.e. perceived campus climate and perceived family ethnic socialization) could not have emerged significant in the moderated regression models given that they do not reach significance in simple regression analyses. Further, it is also the case that the interaction terms (i.e. perceived campus climate by race/ethnicity or year in college, perceived family ethnic socialization by race/ethnicity or year in college) could not reach significance because the main effects of campus climate and family ethnic socialization are not significant.

Secondly, I conducted the previous analyses separately for the Black subsample as well as the Latina subsample. For Blacks, the simple regression model with campus climate predicting GPA was nonsignificant, but near significance ($F(1,191) = 3.27, p = \text{n.s. } (.07), R^2 = .02$). The simple regression model with family ethnic socialization predicting GPA was also nonsignificant ($F(1,191) = 1.28, p = \text{n.s. } (.26), R^2 = .01$) for Black students. I then conducted two moderated regression analyses for the Black sample. The first model included campus climate, year in college, and the interaction between campus climate and year in college; none of the variables in this model were significant. The second model included family ethnic socialization, year in college, and the interaction between family ethnic socialization and year in college; these variables did not reach significance either. However, the main effect of family ethnic socialization was near significance ($p = \text{n.s. } (.06)$). Please note that these models were conducted both with and without parental support as a control variable; the results were the same in both cases.

Similar analyses were conducted for Latinas. When two simple regressions were conducted using campus climate and family ethnic socialization as predictors, the results yielded in both analyses were nonsignificant ($F(1,90) = .44, p = \text{n.s.} (.51), R^2 = .01$; $F(1,90) = \text{n.s.} (.50), p = .48, R^2 = .01$, respectively). Subsequently, I conducted two moderated regressions: the first including campus climate, year in college, and the interaction between campus climate and year in college, and the second including family ethnic socialization, year in college, and the interaction between family ethnic socialization and year in college. All variables were nonsignificant in each model; however, year in college was near significance in both models ($p = \text{n.s.} (.06)$). Similar to the analyses conducted for the Black subsample, these models were conducted both with and without parental support as a control variable; the results were the same in both cases.

The third and final set of additional analyses I conducted was pertaining to the scales used to measure perceived parental support, perceived campus climate and perceived family ethnic socialization. Specifically, I conducted bivariate correlations for each item on the three scales with GPA in order to determine which items were significantly correlated with GPA and subsequently utilize these items to create new measures to conduct the initial set of analyses. Only two items on each scale were significantly correlated with GPA. I proceeded to using these items to create new versions of the original scales in order to conduct new regression analyses with these new scales. Given the apparent limitations of these revised scales, it is important to interpret the findings below with caution.

Simple regressions were conducted with the new campus climate measure predicting GPA and the new family ethnic socialization measure predicting GPA. Parental support was included in each model as a control variable. Both regression models were significant; however,

it is clear that the significance of these variables is contingent upon the revised measures used in these analyses. Using these revised scales, campus climate predicted GPA with an $F(2,282) = 4.16, p < .05, R^2 = .03$ and family ethnic socialization predicted GPA with an $F(2, 282) = 4.20, p < .05, R^2 = .03$. The results of these analyses were the same when parental support was excluded from the models.

Subsequently, I conducted the original analyses in order to determine if the revised scales would yield different results using moderated regression analyses. The first model included parental support as a control variable, the main effects of campus climate and race/ethnicity, and the interaction between campus climate and race/ethnicity. In this model, campus climate was near significance ($p = \text{n.s. } (.05)$), and the overall model was significant with an $F(4,280) = 4.56, p < .05, R^2 = .06$. When parental support is removed from the model, the p value for campus climate reaches significance at $p < .05$. However, the inclusion of parental support as a control variable is important in this model as the shortened parental support scale (with only the items that are significantly correlated with GPA) is significantly correlated with GPA. Similar results emerged for the model containing parental support (control variable), family ethnic socialization, race/ethnicity, and the interaction between family ethnic socialization and race/ethnicity. The overall model was significant ($F(4,280) = 4.37, p < .05, R^2 = .06$), and family ethnic socialization was near significance ($p = \text{n.s. } (.05)$).

The next set of analyses sought to investigate the model including parental support (control variable), the main effects of campus climate and year in college, and the interaction between campus climate and year in college. In this model, none of the variables reached significance. The next model included parental support (control variable), the main effects of family ethnic socialization and year in college, and interaction between family ethnic

socialization and year in college. In this model, family ethnic socialization emerged as significant ($F(4,280) = 2.68, p < .05, R^2 = .04$). One may recall, however, that this variable was not significant in a similar model using the non-revised scales. Thus, these findings should be understood only after considering the role of measurement differences in the two models.

Lastly, I conducted the moderated regression analyses with the new scales separately for the Black subsample and the Latina subsample. First, I conducted simple regression analyses for Blacks only (with parental support included as a control variable) and found that campus climate significantly predicts GPA ($F(2,190) = 3.58, p < .05, R^2 = .04$), but that family ethnic socialization does not. Please note that a significant relationship did not emerge between campus climate and GPA for Black students when using the original measures; therefore, it is important to interpret these findings with caution. Two subsequent models were conducted for Black students: one with the variables parental support (control variable), campus climate, year in college, and the interaction between campus climate and year in college (model 1) and another with parental support (control variable), family ethnic socialization, year in college, and the interaction between family ethnic socialization and year in college (model 2). Neither of these models contained any significant relationships.

For Latinas, the simple regression analyses were nonsignificant both for campus climate and family ethnic socialization. However, the simple regression equation that emerged for predicting GPA based on family ethnic socialization (with parental support included as a control variable) was near significance with an $F(2,89) = 1.86, p = \text{n.s.} (.06), R^2 = .04$. Similar to the analyses conducted for the Black subsample, I also conducted two subsequent moderated regression analyses for Latinas. The first model included the variables parental support (control variable), campus climate, year in college, and the interaction between campus climate and year

in college, while the second model included parental support (control variable), family ethnic socialization, year in college, and the interaction between family ethnic socialization and year in college. Similar to the results for Blacks, neither of these models contained any significant relationships.

CHAPTER V

DISCUSSION

Although to date the literature has primarily focused on the academic deficits of Black and Latina college students, there is a subset of this population that has been demonstrating resilient outcomes in the domain of higher education (Perez et al., 2009; Sutton & Kimbrough, 2001). This resilient subset was the focus of this exploratory study; specifically, the study focused on determining the role of two specific types of protective factors in fostering resilience among Black and Latina college women. The literature highlighted three ecological domains of protective factors as relevant for this population: relational, institutional, and racial/ethnic protective factors; however, there were far more articles that investigated relational protective factors than those that investigated the latter domains (Campbell, 2016). This study aimed to fill this gap by taking one of the literature's first looks at the role of institutional and racial/ethnic protective factors in fostering resilience for Black and Latina women. The study also aimed to uncover the potential moderating role of race/ethnicity and year in college in these relationships (e.g. the relationship between institutional protective factors and resilience).

Summary of the Results

The planned moderated regression analyses yielded results suggesting that institutional and racial/ethnic protective factors do not play a significant role in fostering resilience for this sample. However, the results did suggest that race/ethnicity was a significant predictor of GPA. Specifically, being Latina (as opposed to being Black) was predictive of higher GPAs (or a more resilient outcome). Year in college did not reach significance in the planned analyses. Furthermore, neither race/ethnicity nor year in college emerged as significant moderator variables in the relationships between any of the predictor and the outcome variables.

Given these results, further investigation was pursued. First, simple regressions confirmed that neither the institutional nor the racial/ethnic protective factors were significant predictors of resilience. Further, when moderated regression analyses were conducted separately for Blacks and Latinas, none of the relationships reached significance for either racial/ethnic group.

The final attempt in understanding these results prompted a shift of focus onto the measures used in the study. First, new versions of the study's measures were created, and then the regression analyses were repeated. Using the revised measures, simple regression analyses indicated that both institutional and racial/ethnic protective factors were predictive of resilience for the full sample. However, only the relationship between the racial/ethnic protective factor and resilience was significant in the moderated regression analyses. Furthermore, it is important to note that this was only true for the model consisting of parental support, family ethnic socialization, year in college, and the interaction between family ethnic and year in college; family ethnic socialization (i.e. racial/ethnic protective factors) was not significant in the model containing race/ethnicity. These analyses were repeated for Blacks and Latinas separately (with the new measures). For Blacks, simple regressions revealed that there was a significant relationship between the institutional protective factor and resilience, but not between the racial/ethnic protective factor and resilience. The moderated regression models were nonsignificant for Blacks. For Latinas, neither the simple regressions nor the moderated regressions yielded significant results.

Overall, the findings suggest that race/ethnicity was a significant predictor of resilience when using the original measures; institutional and racial/ethnic protective factors significantly predicted resilience for the full sample when using the revised measures; and the institutional

protective factor was a significant predictor of resilience for Blacks when using the new measures. It is critical to acknowledge that the findings yielded from the revised measures should be interpreted with caution given apparent measurement-related limitations. While these findings provide insight about the study's variables of interest, this insight is weak and warrants additional support as the revised measures may reflect known psychometric challenges.

Explaining the Results

While the study was exploratory, the researcher expected that both the institutional and the racial/ethnic protective factors might have been predictive of resilience for both racial/ethnic groups represented in this study. However, these hypotheses were not entirely supported in this sample. This was not completely surprising because there is not a strong body of literature in support of these protective factor domains, nor the specific protective factor variables used to represent each domain (i.e. campus climate, family ethnic socialization). Instead these protective factor domains and variables were largely understudied in the literature, causing this study to be primarily exploratory given the little that was known about institutional and racial/ethnic protective factors. Specifically, only 5% of the already few racial/ethnic protective factor studies examined family ethnic socialization, and only 17% of the limited number of institutional protective factor studies included an investigation of campus climate. Therefore, little was known about these variables, and domains, prior to the current study. Further, the measures of protective factors used in this study do not have a long-standing empirical history. There will be greater discussion of this issue in subsequent sections.

Racial/Ethnic Protective Factors – Family Ethnic Socialization

The researcher anticipated that the racial/ethnic protective factor domain would have been a significant predictor of resilience because all of the articles that investigated racial/ethnic

protective factors found that it was significantly related to resilience. However, only one article specifically investigated and found that family ethnic socialization was predictive of resilience (Brown, 2008). Thus, in the current study, it was important to pursue further understanding of this variable given that it is understudied in the resilience literature. The current study provided only mixed to weak support in regards to this variable and the protective factor domain it represents. Initially, it appeared that racial/ethnic protective factors are not predictive of resilient academic outcomes; however, when the measure was revised, it appeared that this domain was in fact related to resilience. These results should be interpreted with caution, the discussion below on measurement elaborates on this point.

The researcher posits that the nonsignificant findings yielded from the analyses using the nine-item Family Ethnic Socialization Scale (Umana-Taylor, et al., 2001) may be related to the appropriateness of the measure used. As mentioned above, the secondary data used in the study was collected from a university sample; however, careful review of studies using this measure indicates that it has primarily been administered to adolescent samples (Supple, 2006; Umana-Taylor & Fine, 2004; Umana-Taylor, et al., 2009; Umana-Taylor, et al., 2013). Only one study reported using this measure in both a university and high school sample; this study reported a Cronbach's alpha of .94 for their university sample (Umana-Taylor, Yazedjian, & Bamaca-Gomez, 2004). This is comparable to the current study, which reported an adequate internal reliability of .89 for the Family Ethnic Socialization Scale.

However, Umana-Taylor, Yazedjian, and Bamaca-Gomez's (2004) study, like many others in this field (Supple, 2006; Umana-Taylor, et al., 2009; Umana-Taylor, et al., 2013), used a revised version of the Family Ethnic Socialization Scale with 12 items as opposed to the original nine-item scale used in the current study. The prevalence of the revised scale throughout

the literature may suggest that this scale is more valid and reliable than the original family ethnic socialization scale used in this study. Furthermore, the means and standard deviations found for samples administered the revised version of the family ethnic socialization scale are not comparable to those found in the current sample given the differences between the original and revised scale.

The only study that utilized the original nine-item scale is the original study that discussed the creation of the family ethnic socialization scale (Umana-Taylor & Fine, 2004). In this study, it appears that the average family ethnic socialization score ($M = 3.28$) is similar to the average score found in the current study ($M = 3.23$). However, it is important to note that the average family ethnic socialization score found in Umana-Taylor and Fine's (2004) study was yielded after an exploratory factor analysis, with an oblique rotation, reduced the scale from a nine-item scale to an eight-item scale with two dimensions (i.e. overt FES and covert FES). One item was dropped as a result of demonstrating weak loadings on the two factors that emerged from the exploratory factor analysis (Umana-Taylor & Fine, 2004). Therefore, these means are not comparable as the final scale used in Umana-Taylor and Fine's (2004) study only consisted of eight items. Furthermore, this study was also conducted with a high school sample, underscoring additional differences between the sample used in the current study and the sample used in Umana-Taylor and Fine's (2004) study.

Additionally, the family ethnic socialization scale has not been previously used in attempts to predict academic outcomes. Only one study examined academic outcomes, and this study did not find a significant relationship between family ethnic socialization and school performance among high school students (Supple, 2006). Supple (2006) even explored an indirect relationship between family ethnic socialization and school performance (i.e. family

ethnic socialization → ethnic identity → school performance), and this did not reach significance. Also, although one study notes adequate internal reliability for ethnically diverse samples (Umana-Taylor, Yazedjian, & Bamaca-Gomez, 2004), the family ethnic socialization scale was developed on a sample of Mexican-American adolescents, and has primarily been used among Latino samples (Supple, 2006; Umana-Taylor & Fine, 2004; Umana-Taylor, et al., 2009; Umana-Taylor, et al., 2013). Therefore, it is possible that the scale was not entirely appropriate for the sample used in the current study. Taken together, this discussion of the family ethnic socialization scale may suggest that a more appropriate scale should have been selected to collect the data used in the current study. For example, the only study that has highlighted a relationship between family ethnic socialization and resilience used the 40-item TERS (Stevenson et al., 2002) instrument (see Brown, 2008).

Institutional Protective Factors – Campus Climate

The researcher also expected that the institutional protective factor included in this study would have been predictive of the resilience outcome (i.e. GPA) because a major function of the institution is to educate its students, which is often measured academically. However, only a few studies examined supportive campus climate in their investigation of institutional protective factors (Hurtado, Carter, & Spuler, 1996; Wolf-Wendel, 2000). Therefore, similar to family ethnic socialization, it was necessary for the current study to further explore this understudied variable in order to understand its usefulness in fostering resilience for this population. Similar to family ethnic socialization, the findings related to campus climate was not entirely clear as the planned analyses did not yield results supporting a relationship between campus climate and GPA. However, when the revised measure was introduced, campus climate was in fact predictive of GPA both for the full sample and specifically, for Black students. However, these significant

findings are very clearly related to the revised measures, indicating that these findings require an understanding of the limitations related to the measure. A discussion of the scale used to measure campus climate is presented below in order to assist with an appropriate interpretation of these findings.

The campus climate measure was created by Johnson (2013) specifically for the collection of the data used in this study. Therefore, this measure is not an established campus climate scale, and has not been previously used in studies throughout the literature. Furthermore, the scale refinement techniques that reduced the measure from eight to six items may have also contributed to limitations of this measure. However, given that there is no previous literature supporting the original scale, one cannot soundly posit that reducing the scale was in fact compromising. It is possible that the nonsignificant results related to campus climate may be a result of the fact that this measure has not been previously validated in published research.

It is also interesting that campus climate was significantly predictive of GPA for Black students, but did not reach significance for Latinas as the studies in which campus climate was found to be significant did not demonstrate an overrepresentation of Black students. If a skew were to be anticipated, one might expect that campus climate would be more important for Latinas given the literature. Among the two studies that examined campus climate, Wolf-Wendel's (2000) study utilized a mixed sample comprised of both Blacks and Latinas while Hurtado, Carter, and Spuler's (1996) study used an entirely Latinx sample. However, it is important to note that campus climate is a dynamic variable that may include campus organizations as well as campus services and resources that support students' various identities. And that these types of protective factors (i.e. campus organizations) appear to be most prevalent among Black students; for example, many studies discussed the importance of religious

organizations and race-based organizations for Black students' success (Strayhorn, 2011; Strayhorn & Saddler, 2009; Sutton & Kimbrough, 2001; Walker & Dixon, 2002). Therefore, this conceptualization of campus climate may provide insight for the current study's findings that campus climate is significantly predictive of resilience for Blacks, but not significant for Latinas. An alternative explanation may be related to the fact that these results were yielded using the revised measures, and not the original measures. It may be the case that the nature of the revised measures potentially compromised the findings indicating statistically significant differences between Blacks and Latinas.

Race/Ethnicity

In addition to the findings regarding racial/ethnic and institutional protective factors, the current study also found that race/ethnicity is a significant predictor of resilience; specifically, that being Latina is predictive of higher GPAs. This was not surprising as recent statistics demonstrates similar trends both in persistence and achievement. Specifically, among those enrolled in four-year institutions in 2008, 34% of Latinas graduated in 4 years compared to only 25% of Black women (National Center for Education Statistics, 2015). Furthermore, one study found that, even in a high-achieving group of women, White and Asian students were found to have the highest GPAs, Latina students had a significantly lower GPA, and Black students had the lowest GPA (Keels, 2013). Therefore, it appears that while Blacks and Latinas may experience similar challenges in institutions of higher education, Latinas appear to be faring slightly better than their Black counterparts.

Explaining the Overall Results

In addition to the measure-related issues discussed above, another potential explanation of the nonsignificant findings yielded from the planned analyses may be relating to the sampling

criteria used to select the participants from which the data was collected. Johnson (2013) developed a sampling criteria, which was designed specifically to select high-achieving students into the sample for data collection. While the rationale related to the development of these criteria was the researcher's desire to investigate factors related to high academic achievement among students; this sampling criteria resulted in a restricted range in the sample used in the current study. The sample was skewed toward high-achieving students for both the Black and Latina subsamples. Specifically, the average GPA for all Black female undergraduate students at the institution from which the sample was selected is 2.65, while the average GPA for Black women in the current study was 2.98 (both on a 4.0 scale) (Office of Planning and Budgets, 2016). Similarly, the average GPA for all Latina female undergraduate students at the institution from which the sample was selected is 3.01, while the average GPA for Latina women in the current study was 3.17 (both on a 4.0 scale). Therefore, the sample used in the current study is over-representative of high-achieving students, which means there is reduced variability or range in the sample used. Furthermore, the sample is also over-representative of college seniors (see method section above), which further indicates differences between the population and the study's sample as well as issues related to range restriction. Given these sample challenges, it is not surprising that the predictor variables were not correlated with or predictive of the resilience outcome given that a known effect of range restriction is decreased correlation. In other words, the reduction of non-resilient students from the sample likely contributed to the low correlations and low predictability of the independent variables used in the current study. Thus, this study may have suffered from restriction of variance in both the predictor and criteria variables.

Limitations and Future Directions

In addition to the sampling and measure related issues discussed thus far, this study was also subject to additional limitations. First, the major advantage of secondary analysis is that it is designed to maximize use of existing data resources; therefore, it is cost and time efficient (Kiecolt & Nathan, 1985). However, the primary limitation associated with using existing databases is a measurement concern. That is, secondary analysts tend to be constrained by measurement choices made by previous researchers and the way in which scales and items have been operationalized (Zhao & Kuh, 2004). These choices may place limits on the kind of indicators that can be constructed in a given study (Koljatic, 2000). In other words, the study's analyses were limited to factors that could be defined or operationalized using measures drawn from the pre-existing database. Thus, the use of secondary data is a limitation because the researcher is unaware of possible systemic errors that might be related to the way in which the data was collected (Vieira et. al., 2009).

Second, the sample is not readily generalizable to similar populations as a result of the sampling criteria used to select participants for data collection. Future research on this topic should be sure to include both high-achieving and underperforming students in their sample in order to ensure an appropriate range in the sample used in future studies. Third, this study also focused solely on Black women and Latinas; it may be useful for future studies to include students belonging to other ethnic minority groups. While it is important to understand the unique patterns of resilience among Blacks, Latinx, and women, future studies including students from multiple identity groups may be able to provide insight about similarities and differences across groups. Fourth, race and year in college were the only moderators considered in the

current study, future studies should consider other demographic variables such as socioeconomic status, high school achievement, and parent's level of education.

A fifth limitation, which is arguably a major one, is that the only significant findings related to the variables of interest (i.e. campus climate, family ethnic socialization) were found using the revised measures. It is problematic that these revised measures are only comprised of two items each; therefore, it is important that future studies aim to explore the role of these variables, and their respective domains of protective factors using more established measures. Currently, the literature on institutional and racial/ethnic protective factors, and specifically articles investigating campus climate and family ethnic socialization, are sparse. Therefore, future studies in this area are warranted in order to better understand the role of these protective factor domains in facilitating resilience. Similarly, it may have also been problematic to utilize the variables, campus climate and family ethnic socialization to represent institutional and racial/ethnic protective factors, respectively. Although the current study chose to utilize these variables in order to enhance the scholarly community's knowledge on these specific variables, it may have been more appropriate to utilize variables that are more established in the literature (i.e. campus organizations). Future studies should consider the use of more established variables in addition to more established measures when investigating these protective factor domains.

Also, the present study's use of self-reported data may be considered by some to be an additional limitation; however, this is only to the extent that respondents did not know the information being requested or found survey questions to be ambiguous and unclear (Pike & Kuh, 2005). A large number of scholars lend support to the merit of self-reported data (e.g. Astin, 1993; Kuh et al., 1997, 2001; Pace, 1985). As Gonyea (2005) noted, "In reality, all questionnaire surveys, whether locally produced or nationally published, rely on some type of

self-reported information” (p. 74). Therefore, self-reports are considered to be valid under the following conditions: (a) when the information requested is known by the respondents, (b) the questions are phrased clearly and unambiguously, and (c) when the respondents think the questions merit a serious and thoughtful response (Pike and Kuh 2005).

Implications and Conclusion

Despite the above limitations, this exploratory study contributes to our understanding of the influence of institutional and racial/ethnic protective factors on Black and Latina students’ resilience. The current study provisionally supported the idea that institutional and racial/ethnic protective factors are important contributors of resilient academic outcomes among Black and Latina college women. Findings related to these protective factors domains were compromised by the revised measures used to yield the results in support of these protective factor domains. Nonetheless, these findings imply that we still do not know enough about these protective factors to discontinue or increase their use. This study strongly advises researchers in this field to continue rigorous research regarding this topic in order to present a clearer picture of the role of institutional and racial/ethnic protective factors in fostering resilience for various populations.

Despite the findings of this study, higher education administrators should consider the body of research that supports the usefulness of institutional and racial/ethnic protective factors, and aim to enhance these types of supports for Black and Latina college women. This study was merely an important first look at institutional and racial/ethnic protective factors, and therefore, its findings should not be viewed as a sole indicator of the importance of the two protective factor domains investigated in this study. Instead, it should be viewed as an attempt to inform higher education administrators of ways in which they can hold the institution and its stakeholders responsible for student success. Specifically, a major goal of this study was to

provide student service professionals with an understanding of the importance of providing institutional support for students of color as well as to establish the importance of understanding racial/ethnic protective factors as vital contributors to academic success.

It is critical that we continue to investigate these protective factor domains in order to completely understand the factors necessary to close the achievement gap in which Black and Latina college women—but especially Black women, according to the current study—are far outpaced by their White and Asian counterparts. Failure to determine the role of specific protective factors relevant for the success of this population can potentially permeate into society beyond the higher education system as success in college may be related to success in one's career and the upward mobility of one's ethnic group. Therefore, this dissertation hopes to contribute to future efforts to support college students who belong to various ethnic minority groups in order to ensure their success, and ultimately that of their entire racial/ethnic group.

APPENDIX

ONLINE CONSENT FORM

Dear Participants,

Thank you for considering participation in the “Interpersonal and Ethno-Gender Challenges and Coping among College Women of Color” study! We are asking you to be a part of a study that explores the experiences and race/gender challenges among female college students and how they cope using personal and institutional resources. We are particularly interested in how these challenges impact the success of women of color, especially African-American and Latina, in their studies.

Project Information

The purpose of this project is to help identify the unique and often untapped experiences and strengths of female college students navigating campus life. We focus on previous family and community life as well as cultural strengths to determine how women of color may cope with experiences of interpersonal relationships, prejudice and harassment and remain true to their educational goals. We also are interested in whether available University supports and services have helped in addressing stress, support and academic needs to remain successful at [the institution of interest]. Information from each individual will be used to help us better understand the core experiences of college women of color and how the institution can better serve their needs. If you decide to participate in this research, you will go on to complete the online survey, which will take about 45 minutes of your time. In the survey, you will be asked about yourself, family background, school experiences, parental messages and beliefs about race and ethnicity, any experiences with racial or sexual harassment, relationships, other challenges and coping. Also, you will be asked about your use of resources, your well-being, and your academic achievement.

Participation in this research project is completely voluntary and confidential. You have the right to say no. You may change your mind at any time and withdraw. You may choose not to answer specific questions or to stop participating at any time.

You will receive a \$10 gift card for completing the survey. We really appreciate your time and participation.

Risks /discomforts and Benefits

The potential for risk to you is minimal. Although highly confidential, some psychological discomfort could be experienced from sharing personal information or thinking about things that are related to your past or current experiences. You are able to take a break at any point during the survey process; and of course, you are also free to discontinue participating at any time. There are no direct benefits to you from participation in this study. However, potentially you may experience indirect benefits from your participation as it may contribute to the larger community having a better understanding of the racial/ethnic minority female student and improved policies and services at [the institution of interest].

Confidentiality

Your confidentiality will be protected to the maximum extent allowable by law. Your survey data will be linked by a code. We have access to the code but not your name. The survey will be kept in password-protected server, and access to the information will be limited to the researcher, the research team members and the institution's Institutional Review Board (IRB). [The institution of interest] may review your research record. All other research data for this study will be kept in password-protected files at the primary researcher's institution address for a minimum of 3 years after the conclusion of the project. Information from your survey will be averaged and reported in aggregate for presentations or written products related to the study. Neither your name nor any other identifying information will be used in presentations or in written products resulting from this study. Your individual responses to questions will not be shared with other participants in the study.

Contact Information

If you have any concerns or questions about this study, such as scientific issues, how to do any part of it, or if you believe, you have been harmed because of the research, please contact the researcher, Deborah J. Johnson, Ph.D., Department of Human Development and Family Studies.

You can reach her by mail at 552 W. Circle Drive, MSU, East Lansing, MI 48824; by phone at 517 432 9115; or by email at collwm14@msu.edu.

If you have questions or concerns about your role and rights as a research participant or to obtain information or offer input, or to register a complaint about this study, you may contact, anonymously if you wish, the Michigan State University Human Research Protection Program at 517-355-2180, Fax 517-432-4503, or e-mail irb@msu.edu or regular mail at 207 Olds Hall, MSU, East Lansing, MI 48824.

Consent to participate

By clicking "Yes" below, you indicate that you have read and understand that:

- Your participation in this survey is voluntary.
- You have given consent to be a subject of this research.
- Your questions have been answered.
- You certify that you are 18 or older.

<input type="radio"/> Yes, I want to participate (1)
<input type="radio"/> No, I do not want to participate (2)

REFERENCES

REFERENCES

- Aiken, L. S., West, S. G., & Reno, R. R. (1991). *Multiple regression: Testing and interpreting interactions*. Sage.
- Arbona, C., & Nora, A. (2007). The influence of academic and environmental factors on Hispanic college degree attainment. *The Review of Higher Education*, 30(3), 247-269.
- Astin, A. W. (1993). *What matters in college: Four critical years revisited*. San Francisco: Jossey-Bass.
- Baker, C. N. (2013). Social support and success in higher education: The influence of on-campus support on African American and Latino college students. *The Urban Review*, 45(5), 632-650.
- Banks, C. A. (2009). Black women undergraduates, cultural capital, and college success (Vol. 20). New York, NY: Peter Lang.
- Beauboeuf-Lafontant, T. (1999). A movement against and beyond boundaries: Politically relevant teaching among African American teachers. *Teacher's College Record*, 100(4), 702-723.
- Benzies, K., & Mychasiuk, R. (2009). Fostering family resiliency: A review of the key protective factors. *Child & Family Social Work*, 14, 103-114.
- Bleuler, M. (1984). Different forms of childhood stress and patterns of adult psychiatric outcome. In N. F. Watt, E. J. Anthony, L. C. Wynne, & J. E. Rolf (Eds.), *Children at risk for schizophrenia* (pp. 537-542). Cambridge: Cambridge University Press.
- Brown, D. L. (2008). African American resiliency: Examining racial socialization and social support as protective factors. *Journal of Black Psychology*, 34(1), 32-48.
- Brook, J. S., Whiteman, M., Gordon, A. S., & Cohen, P. (1986). Dynamics of childhood and adolescent personality traits and adolescent drug use. *Developmental Psychology*, 22(3), 403-414.
- Cabrera, A. F., Nora, A., Terenzini, P. T., Pascarella, E., & Hagedorn, L. S. (1999). Campus racial climate and the adjustment of students to college: A comparison between White students and African-American students. *Journal of Higher Education*, 70(2), 134-160.
- Cabrera, N. L., & Padilla, A. M. (2004). Entering and succeeding in the "culture of college": The story of two Mexican heritage students. *Hispanic Journal of Behavioral Sciences*, 26(2), 152-170.

- Campa, B. (2010). Critical resilience, schooling processes, and the academic success of Mexican Americans in a community college. *Hispanic Journal of Behavioral Sciences*, 32(3) 429 – 455.
- Campbell, N. A. (2016). Taking the burden off the student: Identifying ecological protective factors that promote resilience among Black and Latina college women. Manuscript in preparation.
- Carey, J. W. (1993). Linking qualitative and quantitative methods: Integrating cultural factors into public health. *Qualitative Health Research*, 3, 298-318.
- Casanova, S. (2012). The stigmatization and resilience of a female indigenous Mexican immigrant. *Hispanic Journal of Behavioral Sciences*, 34(3) 375 – 403.
- Catalano, R. F., Hawkins, J. D., Berglund, M. L., Pollard, J. A., & Arthur, M. W. (2002). Prevention science and positive youth development: competitive or cooperative frameworks? *Journal of Adolescent Health*, 31(6), 230-239.
- Cavazos Jr, J., Johnson, M. B., Fielding, C., Cavazos, A. G., Castro, V., & Vela, L. (2010). A qualitative study of resilient Latina/o college students. *Journal of Latinos and Education*, 9(3), 172-188.
- Ceballos, R. (2004). From barrios to Yale: The role of parenting strategies in Latino families. *Hispanic Journal of Behavioral Sciences*, 26(2), 171-186.
- Clark, M. A., Brooks, M., Lee, S. M., Daley, L. P., Crawford, Y., & Maxis, S. (2006). Factors influencing the educational success of minority pre-service educators. *Journal of College Student Retention: Research, Theory & Practice*, 8(1), 121-135.
- Cohen, J. (1968). Multiple regression as a general data-analytic system. *Psychological Bulletin*, 70(6p1), 426.
- Coie JD, Watt NF, West SG, et al. The science of prevention. A conceptual framework and some directions for a national research program. *Am Psychol* 1993;48:1013–22.
- Coker, A. D. (2003). African American female adult learners: Motivations, challenges and coping strategies. *Journal of Black Studies*, 33(5), 654–674.
- Cokley, K. (2000). An investigation of academic self-concept and its relationship to academic achievement in African American college students. *Journal of Black Psychology*, 26(2), 148–162.
- Cokley, K., & Moore, P. (2007). Moderating and mediating effects of gender and psychological disengagement on the academic achievement of African American college students. *Journal of Black Psychology*, 33(2), 169–187.

- Cole, D. (2008). Constructive criticism: The role of student-faculty interactions on African American and Hispanic students' educational goals. *Journal of College Student Development*, 49(6), 587–605.
- Connor, K., & Davidson, J. (2003). Development of a new resilience scale: The Connor-Davidson Resilience Scale (CD-RISC). *Depression and Anxiety*, 18, 76-82.
- Cooper, H. M. (1982). Scientific guidelines for conducting integrative research reviews. *Review of Educational Research*, 52, 291–302.
- Cress, C. M. (2008). Creating inclusive learning communities: the role of student–faculty relationships in mitigating negative campus climate. *Learning Inquiry*, 2(2), 95-111.
- Dorsey, M. S., & Jackson, A. P. (1995). Afro-American students' perceptions of factors affecting academic performance at a predominantly white school. *Western Journal of Black Studies*, 19(3), 189–195.
- Du Bois, W. E. B. (2007). *The souls of black folk*. Oxford, England: Oxford University Press.
- Engle, J., & Tinto, V. (2008). *Moving beyond access: College for low-income, first-generation students*. Washington, DC: The Pell Institute.
- Fergus, S., & Zimmerman, M. A. (2005). Adolescent resilience: A framework for understanding healthy development in the face of risk. *Annual Review of Public Health*, 26, 399–419.
- Fischer, M. H. (2007). Settling into campus life: Differences by race/ethnicity in college involvement and outcomes. *Journal of Higher Education*, 78(2), 125–161.
- Fish, J. M. (2000). What anthropology can do for psychology: Facing physics envy, ethnocentrism, and a belief in "race". *American Anthropologist*, 102(3), 552-563.
- Freeman, K. (1999). No services needed? The case for mentoring high-achieving African American students. *Peabody Journal of Education*, 74(2), 15–26.
- Fujimoto, M. O. F. O. (2013). Resisting the Dominant Narrative: The Role of Stories in Latina Educational Success. *Association of Mexican American Educators Journal*, 7(1), 38-47.
- Gallien, L., & Peterson, M. (2004). *Instructing & mentoring the African American college student, Strategies for success in higher education*. Boston, MA: Allyn & Bacon.
- Garmezy, N., Masten, A. S., & Tellegen, A. (1984). The study of stress and competence in children: A building block for developmental psychopathology. *Child Development*, 55, 97–111.

- Gerber, P. J., Ginsberg, R., & Reiff, H. B. (1992). Identifying alterable patterns in employment success for highly successful adults with learning disabilities. *Journal of Learning Disabilities*, 25(8), 475–487.
- Getz, C. (2000). Observing the spirit of resilience: The relationship between life experiences and success in higher education for African American students. In S. T. Gregory (Ed.), *The academic achievement of minority students* (pp. 457-490). Lanham, MD: University Press of America.
- Gonyea, R. M., Kish, K. A., Kuh, G. D., Muthiah, R. N., & Thomas, A. D. (2003). *College student experiences questionnaire: Norms for the fourth edition*. Bloomington, IN: Indiana University Center for Postsecondary Research, Policy, and Planning.
- Graff, C. S., McCain, T., & Gomez-Vilchis, V. (2013). Latina resilience in higher education: Contributing factors including seasonal farmworker experiences. *Journal of Hispanic Higher Education*, 12(4), 334-344.
- Greer, T., & Chwalisz, K. (2007). Minority-related stressors and coping processes among African American college students. *Journal of College Student Development*, 48(4), 388–402.
- Grier-Reed, T. L., Madyun, N. H., & Buckley, C. G. (2008). Low Black student retention on a predominantly white campus: Two faculty respond with the African American student network. *Journal of College Student Development*, 49(5), 476–485.
- Gruber, J. & Trickett, E. (1987). Can we empower others? The paradox of empowerment in governing an alternative school. *American Journal of Community Psychology*, 15, 353-371.
- Guiffrida, D. A. (2005). Othermothering as a framework for understanding African American students' definitions of student-centered faculty. *Journal of Higher Education*, 76(6), 702–723.
- Herndon, M. K., & Hirt, J. (2004). Black students and their families: What leads to success in college? *Journal of Black Studies*, 34(4), 489–513.
- 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., Milem, J. F., Clayton-Pedersen, A. R., & Allen, W. R. (1998). Enhancing campus climates for racial/ethnic diversity through educational policy and practice. *Review of Higher Education*, 21, 279-302.
- Johnson, G. M. (1994). An ecological framework for conceptualizing risk. *Urban Education*, 29(1), 34-49.
- Johnson, S. C., & Arbona, C. (2006). The relation of ethnic identity, racial identity and race-related stress among African American college students. *Journal of College Student Development*, 47, 495–507.
- Johnson, D. J. (2013). Interpersonal and ethno-gender challenges: The influences of coping and university supports on achievement among college women of color. Manuscript in preparation.
- Jones, L. V. (2009). Claiming your connections: A psychosocial group intervention study of Black college women. *Social Work Research*, 33(3), 159–171.
- Keefe, S. E., Padilla, A. M., & Carlos, M. L. (1978). The Mexican American extended family as an emotional support system. Spanish Speaking Mental Health Research Center Monograph Series.
- Keels, M. (2013). Getting them enrolled is only half the battle: College success as a function of race or ethnicity, gender, and class. *American Journal of Orthopsychiatry*, 83(2pt3), 310-322.
- Kiecolt, K. J., & Nathan, L. E. (1985). *Secondary analysis of survey data* (Vol. 53). Sage.
- Kim, B. S. K., Soliz, A., Orellana, B., & Alamilla, S. G. (2009). Latino/a Values Scale: Development, reliability, and validity. *Measurement and Evaluation in Counseling and Development*, 42, 71-91.
- Kirby, L. D., & Fraser, M. W. (1997). Risk and resilience in childhood. In M. W. Fraser (Ed.), *Risk and resilience in childhood: An ecological perspective* (pp. 10-33). Washington, DC: NASW.
- Koljatic, M. (2000). A longitudinal assessment of college student perceptions of good practices in undergraduate education. Bloomington: Indiana University. Unpublished doctoral dissertation.
- Kuh, G. D., Cruce, T. M., Shoup, R., Kinzie, J., & Gonyea, R. M. (2008). Unmasking the effects of student engagement on first-year college grades and persistence. *Journal of Higher Education*, 79, 540–563.

- Kuh, G. D., Hayek, J. C., Carini, R. M., Ouimet, J. A., Gonyea, R. M., & Kennedy, J. (2001). NSSE technical and norms report. Bloomington, IN: Indiana University Center for Postsecondary Research and Planning.
- Kuh, G. D., Pace, C. R., & Vesper, N. (1997a). The development of process indicators to estimate student gains associated with good practices in undergraduate education. *Research in Higher Education*, 38, 435–454.
- Lee, W. Y. (1999). Striving toward effective retention: The effect of race on mentoring African American students. *Social Work Research*, 33(3), 159-171.
- Lerner, R. M., Agans, J. P., Arbeit, M. R., Chase, P. A., Weiner, M. B., Schmid, K. L., & Warren, A. E. A. (2013). Resilience and positive youth development: A relational developmental systems model. In *Handbook of resilience in children* (pp. 293-308). Springer US.
- Lewis, K. S., & McKissic, S. C. (2010). Drawing sustenance at the source: African American students' participation in the Black campus community as an act of resistance. *Journal of Black Studies*, 41, 264-280.
- Littleton, R. (2003). Community among African American students on a small, pre- dominantly white campuses: The unforeseen “minority within a minority” experience. *NASPA Journal*, 40(4), 83–104.
- 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.
- Luthar, S. S., Cicchetti, D., & Becker, B. (2000). The construct of resilience: A critical evaluation and guidelines for future work. *Child Development*, 71(3), 543–562.
- Maldonado, D. E. Z., Rhoads, R., & Buenavista, T. L. (2005). The student-initiated retention project: Theoretical contributions and the role of self-empowerment. *American Educational Research Journal*, 42(4), 605–638.
- Martínez Alemán, A. M. (2000). Race talks: Undergraduate women of color and female friendships. *The Review of Higher Education*, 23(2), 133-152.
- Martinez-Vogt, E. (2015). Hearing the silence: Acknowledging the voice of my Latina sisters. *Research in Higher Education Journal*, 28, 1-16.
- Masten, A. S., Best, K. M., & Garmezy, N. (1991). Resilience and development: Contributions from the study of children who overcome adversity. *Development and Psychopathology*, 2, 425–444.

- Masten, A. S., & Obradovic, J. (2006). Competence and resilience in development. *Annals of the New York Academy of Sciences*, 1094, 13–27.
- Masten, A. S. (2007). Resilience in developing systems: Progress and promise as the fourth wave rises. *Development and Psychopathology*, 19, 921–930.
- Masten, A. S. (2011). Resilience in children threatened by extreme adversity: Framework for research, practice, and translational synergy. *Development and Psychopathology*, 23, 493–506.
- Morales, E. E. (2000). A contextual understanding of the process of educational resilience: High achieving Dominican American students and the “resilience cycle”. *Innovative Higher Education*, 25(1), 7-22.
- Morales, E. E. (2010). Linking strengths: Identifying and exploring protective factor clusters in academically resilient low-socioeconomic urban students of color. *Roeper Review*, 32(3), 164-175.
- Morgan Consoli, M. L., 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.
- Morris, L. D. K., & Daniel, L. G. (2008). Perceptions of a chilly climate: Differences in traditional and non-traditional majors for women. *Research in Higher Education*, 49(3), 256–273.
- Mrazek PJ, Haggerty RJ, Institute of Medicine Committee on Prevention of Mental Disorders. *Reducing Risks for Mental Disorders: Frontiers for Prevention Intervention Research*. Washington, DC: National Academy Press, 1994.
- Museum, S. D. (2008). The role of ethnic student organizations in fostering African American and Asian American students’ cultural adjustment and membership at predominantly white institutions. *Journal of College Student Development*, 49, 568–586.
- Neville, H., & Lilly, R. (2000). The relationship between racial identity cluster profiles and psychological distress among African American college students. *Journal of Multicultural Counseling and Development*, 28(4), 194–207.
- Neville, H., Heppner, P., Ji, P., & Thye, R. (2004). The relations among general and race-related stressors and psychoeducational adjustment and membership in Black students attending predominantly White institutions. *Journal of Black Studies*, 34(4), 599–618.
- Newton, B. C., Ghee, K. L., & Langmeyer, D. (2014). Correlates of African-American Undergraduate Student Achievement: Implications for the Prize Initiative. *Journal of College Student Retention: Research, Theory & Practice*, 15(4), 605-631.

- Ong, A. D., Phinney, J. S., & Dennis, J. (2006). Competence under challenge: Exploring the protective influence of parental support and ethnic identity in Latino college students. *Journal of adolescence*, 29(6), 961-979.
- Ong, A.D., Bergeman, C. S., & Boker, S.M. (2009). Resilience comes of age: Defining features in adulthood. *Journal of Personality*, 77(6), 1777–1804.
- Pace, C. R. (1985). *The credibility of student self-reports*. Los Angeles, CA: University of California Center for the Study of Evaluation.
- Pascarella, E. T. and Terenzini, P. T. (1991). *How college affects students*. San Francisco: Jossey-Bass.
- Patton, L. D. (2006). The voice of reason: A qualitative examination of Black student perceptions of Black Culture Centers. *Journal of College Student Development*, 47(6), 628–646.
- Perez, W., Espinoza, R., Ramos, K., Coronado, H. M., & Cortes, R. (2009). Academic resilience among undocumented Latino students. *Hispanic Journal of Behavioral Sciences*, 31(2), 149-181.
- Pike, G. R., & Kuh, G. D. (2005). First- and second-generation college students: a comparison of their engagement and intellectual development. *The Journal of Higher Education*, 76(3), 276–300.
- Prospero, M., & Vohra-Gupta, S. (2007). First-generation college students: Motivation, integration, and academic achievement. *Community College Journal of Research and Practice*, 31(12), 963-975.
- Reynolds, A. L., Sneva, J. N., & Beehler, G. P. (2010). The influence of racism-related stress on the academic motivation of Black and Latino/a students. *Journal of College Student Development*, 51(2), 135–149.
- Robinson, S. J., Esquibel, E., & Rich, M. D. (2013). “I’m still here”: Black female undergraduates’ self-definition narratives. *World Journal of Education*, 3(5).
- Rovai, A., Gallien, L., Jr., & Wighting, M. J. (2005). Cultural and interpersonal factors affecting African American academic performance in higher education: A review and synthesis of the research literature. *Journal of Negro Education*, 74, 359–370.
- Rowser, J. (1997). Do African American students’ perceptions of their needs have implications for retention? *Journal of Black Studies*, 27(5), 718–726.
- Rutter, M. (1976). Research report: Isle of Wight studies. *Psychological Medicine*, 6, 313–332.

- Rutter, M. (1987). Psychosocial resilience and protective mechanisms. *American journal of orthopsychiatry*, 57(3), 316.
- Ryan, W. (1976). *Blaming the victim* (Vol. 226). Vintage.
- Sabogal, F., Marin, G., Otero Sabogal, R., Marin, B. V., et al. (1987). Hispanic familism and acculturation: What changes and what doesn't? *Hispanic Journal of Behavioral Sciences*, 9, 397–412.
- Sandler, I., Wolchik, S., Davis, C., Haine, R., Ayers, T., 2003. *Correlational and experimental study of resilience in children of divorce and parentally bereaved children*. Resilience and Vulnerability: Adaptation in the Context of Childhood Adversities. New York: Cambridge University Press.
- Schneider, M. E., & Ward, D. J. (2003). The role of ethnic identification and perceived social support in Latinos' adjustment to college. *Hispanic Journal of Behavioral Sciences*, 25, 539–554.
- Sciarra, D., & Whitson, M. (2007). Predictive factors in postsecondary educational attainment among Latinos. *Professional School Counseling*, 10(3), 307-316.
- Settles, I. H. (2006). Use of an intersectional framework to understand Black women's racial and gender identities. *Sex Roles*, 54(9), 589–598.
- Seyfried, S. F., Birgen, J., & Mann, K. A. (2007). Educational resilience among African-American college students who have experienced long-term foster care. *Human behavior in the social environment from an African-American perspective*, 543-561.
- Snyder, T.D., & Dillow, S.A. (2015). *Digest of Education Statistics 2013*. NCES 2015-011. National Center for Education Statistics, Institute of Education Sciences, U.S. Department of Education. Washington, DC.
- Spekman, N. J., Goldberg, R. J., & Herman, K. L. (1992). Learning disabled children grow up: A search for factors related to success in the young adult years. *Learning Disabilities Research and Practice*, 7(3), 161–170.
- Strayhorn, T. L. (2011). Singing in a foreign land: An exploratory study of gospel choir participation among African American undergraduates at a predominantly White institution. *Journal of College Student Development*, 52(2), 137-153.
- Strayhorn, T. L., & Saddler, T. N. (2009). Gender differences in the influence of faculty-student mentoring relationships on satisfaction with college among African Americans. *Journal of African American Studies*, 13, 476–493.
- Sutton, E. M., & Kimbrough, W. M. (2001). Trends in Black student involvement. *NASPA journal*, 39(1), 30-40.

- Thomas, V. G. (2001). Educational experiences and transitions of reentry college women: Special considerations for African American female students. *Journal of Negro Education*, 70(3), 139–155.
- Thayer, P. B. (2000). Retention of students from first generation and low income backgrounds. *The Journal of the Council for Opportunity in Education*. Department of Education, Washington, DC.; National TRIO Clearinghouse, Washington, DC.
- U.S. Bureau of Labor Statistics. (2014). Women in the labor force. BLS Reports, 1049. Retrieved from <http://www.bls.gov/cps/wlf-databook-2013.pdf>.
- U.S. Department of Education, National Center for Education Statistics, Integrated Postsecondary Education Data System (IPEDS), Fall 2002 and Spring 2007 through Spring 2015, Graduation Rates component; and IPEDS Fall 2008, Institutional Characteristics component. (This table was prepared December 2015.)
- Valencia, R. R. (2002). "Mexican Americans don't value education!" On the basis of the myth, mythmaking, and debunking. *Journal of Latinos and Education*, 1(2), 81-103.
- Walker, K. L., & Dixon, V. (2002). Spirituality and academic performance among African American college students. *Journal of Black Psychology*, 28(2), 107-121.
- WETHEPROTESTERS (2015, December 8). The Demands. Retrieved from <http://www.thedemands.org/>.
- Willie, S. S. (2003). *Acting Black: College, identity, and the performance of race*. New York, NY: Routledge.
- Winkle-Wagner, R. (2009a). *The unchosen me: Race, gender, and identity among Black women in college*. Baltimore, MD: Johns Hopkins University Press.
- Winkle-Wagner, R. (2009b). The perpetual homelessness of college experiences: The tensions between home and campus for African American women. *Review of Higher Education*, 33(1), 1–36.
- Winkle-Wagner, R. (2015). Having Their Lives Narrowed Down? The State of Black Women's College Success. *Review of Educational Research*, 85(2), 171-204.
- Wolf-Wendel, L. E. (2000). Women-friendly campuses: What five institutions are doing right. *Review of Higher Education*, 23, 319–345.
- Zolkoski, S. M., & Bullock, L. M. (2012). Resilience in children and youth: A review. *Children and Youth Services Review*, 34(12), 2295-2303.

Zhao, C. M., & Kuh, G. D. (2004). Adding value: Learning communities and student engagement. *Research in higher education*, 45(2), 115-138.