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# Stress, Anxiety Symptomology, and the Need for Student Support Services for University Freshmen of First-Generation Status, Low-SES Backgrounds, and those Registered with Disabilities

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STRESS, ANXIETY SYMPTOMOLOGY, AND THE NEED FOR STUDENT SUPPORT  
SERVICES FOR UNIVERSITY FRESHMEN OF FIRST-GENERATION STATUS, LOW-SES  
BACKGROUNDS, AND THOSE REGISTERED WITH DISABILITIES

A Thesis

Submitted to the Graduate Faculty of the  
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## **ABSTRACT**

Three populations of concern for professional social workers in higher educational settings include first-generation college students (FGCSs), students from low socio-economic (low-SES) backgrounds, and students with disabilities. As the national demand for degrees in higher education rises both socially and economically, the push for young adults' postsecondary success becomes increasingly crucial. In college and university settings, a significant portion of students may be classified as FGCSs, low-SES, or may be registered with a disability.

Examining these vulnerable populations within higher education settings, particularly regarding stress and anxiety symptomology, can help social workers recognize the social, developmental, and academic inhibitions that mental health factors have on these student populations and help promote programs within higher education settings that support these students' social and academic success. By assessing stress and anxiety levels among FGCSs, students of low-SES, and students with disabilities, this study will build upon what is already known surrounding stress and anxiety within young adults, higher education students, and vulnerable student populations.

Stress and anxiety levels were evaluated within three student populations including: students of FGCS status, low-SES students, and students with disabilities. Stress was assessed using the Perceived Stress Scale (Cohen, 1988), and anxiety was assessed using the Overall Anxiety Severity And Impairment Scale (Norman, Cissell, Means-Christensen, & Stein, 2006). Results showed that FGCSs, low-SES students, and students with disabilities had stress levels that are much higher than average and had anxiety levels that are just below the threshold for an anxiety diagnosis. These results have implications for future research, education policy, and social work practice.

## CHAPTER 1: INTRODUCTION

Higher education is pivotal to young adults' success. For many youth within the general population, higher education is viewed as both feasible and achievable; it is an academic endeavor that inevitably follows high school graduation. High school graduates of distinctly disadvantaged populations, however, have more difficulty achieving academic success and maintaining enrollment in institutions of higher education. In particular, students of first-generation college status, students of low socio-economic backgrounds, and students with disabilities face obstacles while maneuvering through their post-secondary education. The educational barriers that these students encounter, coupled with the stress and anxiety that they often experience relating to their home environments and fear of failure, put many of them at risk for unsuccessful degree completion at college and universities.

College students of first-generation status represent half of the U.S. postsecondary student population (American Council on Education, 2002), yet campus resources are often not available to accommodate the needs of this prevalent student population. Due to their parents' lack of experience and limited knowledge regarding matriculation through college and university settings, first-generation college students are at a particular social disadvantage in the postsecondary realm. They also tend to be significantly less prepared for the financial and academic adjustments that come with college and university life (Hertel, 2002). The everyday experiences of academic pressure coupled with a lack of *social capital* among first-generation students are often significant obstacles to their academic success of these students (Phinney and Haas, 2003).

Individuals of low socio-economic status represent a significant portion of college and university students. More than half of recent high school graduates from low-income families

enroll in a postsecondary institution (National Center for Education Statistics, 2012). Similar to the academic and social disadvantages of first-generation college students, those from low-income families, neighborhoods, and communities encounter distinct obstacles to social integration and academic success in college and university life. In addition to the developmental difficulties of adjusting to college and university life, students of low socio-economic status also encounter personal difficulties and family responsibilities that create additional stressors. An absence of support and social resources has been shown to promote stress and anxiety in students of low socio-economic status (Hammen, Kim, Eberhart, & Brennan, 2009). Poor coping styles displayed by some students in response to stress-inducing situations can exacerbate the stress and anxiety experienced by low-income students (Palomar-Lever & Victorio-Estrada, 2012).

Students with disabilities share a unique set of challenges in the college and university setting. This population represents 11% of students enrolled in postsecondary institutions (NCES, 2013) and report higher levels of anxiety than their counterparts with no disabilities (Verhoof, Maurice-Stam, Heymans, & Grootenhuis, 2013). The stress reported by these students can lead to symptoms of anxiety, which can impair academic achievement (Gregg, Hoy, King, Moreland, & Jagota, 1992). Weinstein and Palmer (1990) found that when students with disabilities are under pressure to perform academically, they are likely to perform below the level of their full potential.

Through federal funding, Student Support Services programs on college and university campuses across the U.S. have provided academic and social support to students of first-generation college status, students of low socio-economic backgrounds, and students with disabilities. Using counseling, academic advising, tutoring, and skills-building courses (U.S. Department of Education, 2014), Student Support Services provides opportunities for academic

enhancement and social engagement to these disadvantaged populations (Kuh, 2008).

Participation in Student Support Services programs increase students' retention and degree completion through academic and psychological support (U.S. Department of Education, 2010).

The relationships formed and guidance provided to students through Student Support Services staff is a major contributor to the success of the students (Walsh & Kankakee Community College, 2000).

The adjustment to college and university life can be overwhelming to any freshman student. Moving away from one's hometown, maneuvering large campuses, encountering thousands of students, enrolling in auditorium-sized classes, and adjusting to what are often impersonal relationships with faculty and staff can make the transition into postsecondary education difficult for any first-year student. Given these complexities along with the unique stressors and anxiety-promoting aspects of being a first-generation college student, a low-income college student, or a student with a disability, success in higher education is even more difficult to achieve. The lack of social and academic support, and also the loss of a sense of community in large college and university settings can lead these freshmen to become stressed and anxious, resulting in poor performance during their academic undertakings. To better serve this population and, hopefully, improve their chances for academic success, more study of the extent of these difficulties is needed. The current study, therefore, poses the question: To what extent does the Louisiana State University Student Support Services freshman population experience high levels of stress and anxiety? Finding an answer to this question could point the way to improved services to support the academic success of these vulnerable students.

## CHAPTER 2: REVIEW OF THE LITERATURE

### Students in Higher Education

Currently in the United States, there are over 7000 degree-granting postsecondary institutions (NCES, 2013). In the fall of 2012, there were 17.7 million undergraduate students of full-time and part-time status enrolled in post-secondary institutions across the nation (NCES, 2014). Students that attend and successfully complete college report higher rates of employment, higher lifetime earnings, more engagement in civic activities, higher rates of healthy lifestyle choices, an increased likelihood of moving up the socioeconomic ladder, and an increased likelihood of educational involvement in their children's academic career (College Board, 2010). It has also been found that compared to their less educated counterparts, college-educated mothers spend more time with their children and devote a significant portion of this time to the developmental needs of their children (College Board, 2010).

**First-generation College Students.** According to College Board (2013), a *first-generation college student* (FGCS) is the first person in his or her immediate family to attend college, and the highest degree earned by either parent is a high school diploma, high school diploma equivalent, or less than the high school level. Between the years of 1992 and 2000, 22% of college freshmen were FGCSs (NCES, 2005). More recently, approximately 50% of all postsecondary students and about 34% of all students enrolled in 4-year postsecondary institutions are of FGCS status (American Council on Education, 2002). These students are disproportionately overrepresented among historically disadvantaged groups, including students of color and students from low-income backgrounds (The Pell Institute for Study of Opportunity in Higher Education, 2007). According to the National Center for Education Statistics (2001), only 54% of students whose parents' highest educational attainment was high school enrolled in

college immediately after completing high school, and a mere 36% of students whose parents' highest educational attainment was less than a high school enrolled in college immediately after completing high school. This is significantly lower than the 82% of non-FGCSs that enrolled in college immediately after completing high school (NCES, 2001). FGCSs are more likely to attend less selective colleges and also colleges in closer proximity to home (The Pell Institute for Study of Opportunity in Higher Education, 2007). FGCSs tend to work more while in college and also live off-campus, compared to their non-FGCS counterparts; this has been shown to negatively affect both academic and social aspects of students' college tenure (Higher Education Research Institute, 2007). Lastly, FGCSs are less likely to incorporate academic areas such as mathematics, science, and computer science, and are more likely to focus on vocational and technical fields (NCES, 2005).

**College Students of Low Socio-Economic Status.** According to The Pell Institute for Study of Opportunity in Higher Education (2007), a student of *low socio-economic status* (low-SES) is one that has a household annual income of \$25,000 or less. In 2012, 50.9% of recent low-income high school completers were enrolled in a two or four year college (National Center for Education Statistics, 2012). In 2010, the NCES reported that only 58.4% of high school graduates from low-income families enrolled in a two or four-year college immediately after high school, while 63.3% of students from middle-income families enrolled, and 78.2% of students from high-income families enrolled. Compared to only 16% of students with household annual incomes over \$100,000, 44% of low-SES college students enroll in a 2-year college, as opposed to a 4-year institution (National Center for Education Statistics, 2008). Thus, students of a low-SES background are less likely to enroll in a postsecondary institution, and when they do, it is more likely that this will be a two-year institution as opposed to a four-year institution

that their economically advantaged peers are likely to attend (National Center for Education Statistics, 2008).

The National Center for Education Statistics (2004) found that 63% of the lowest academically ranked college students took at least one remedial course during their postsecondary studies; it was also found that students offered remediation through courses are less likely to earn a degree or certificate. Adelman (1999) found that academic rigor of course work during students' elementary and high school education is one of the best predictors of college success. However, low-SES students are less likely to have attended high schools that offer rigorous, college-preparatory curricula. Eighty-three percent of students in the highest SES quintile attended a high school that offered a trigonometry course, while only 64% of students in the lowest SES quintile were offered a trigonometry course, and 72% of students in the highest SES quintile attended a high school that offered a calculus course, while only 44% of students in the lowest SES quintile were offered a calculus course (Adleman, 2006).

One way for high schools to encourage college-preparatory curricula is participation in Advanced Placement programs, which consist of over 30 courses and qualifying exams taught within high schools and designed to offer college-level credit to those who successfully complete them (The College Board, 2009). Students who participate in Advanced Placement courses have been shown to have a higher likelihood of obtaining a postsecondary degree (Bleske-Rechek, Lubinski, & Benbow, 2004). Educational Testing Service (2008) found, however, that low-SES students are much less likely to participate in an Advanced Placement program.

**College Students with Disabilities.** According to the National Center for Education Statistics (2013), *college students with disabilities* (CSD) are those who report a “specific learning disability, visual handicap, hard of hearing, deafness, speech disability, orthopedic

handicap, or health impairment”. The enrollment of students with disabilities in postsecondary institutions is increasing (Institute of Education Sciences, 2010). Four out of five high school students with disabilities identify postsecondary education as a goal (National Longitudinal Transition Study 2, 2004). During the 2007-2008 academic year, 11% of students who enrolled in postsecondary institutions reported having a disability (NCES, 2013). Even with this increasing number and an increase of high school students with disabilities taking rigorous college-preparatory courses (National Longitudinal Transition Study 2, 2004), students with disabilities encounter various challenges in the transition from high school to college. Institute of Education Sciences (2011), found that students with disabilities were more likely to be enrolled in 2-year colleges or community colleges than 4-year colleges or universities. While 37% of young adults in the general population have been enrolled in a 4-year postsecondary institution, only 15% of young adults with disabilities have been enrolled (Institute of Education Sciences, 2011).

Developing at the same rate as individuals in the general population can be challenging for young adults with disabilities (Stam, Hartman, Deurloo, Groothoff, & Grootenhuis, 2006). This population of young adults is at risk for poor educational, vocational, and social outcomes in later years (Maslow, Haydon, McRee, Ford, & Halpern, 2011). Young adults with chronic disabilities face particular difficulties in finding and maintaining employment (Schur, 2002), leading to not only occupational disadvantages, but financial and social disadvantages as well (Winn & Hay, 2009).

The prevalence and identified educational challenges of FGCSs, low-SES students, and students with disabilities calls for particular attention to their academic, social, and psychological well-being. A significant number of individuals in the young adult population suffer from

symptoms of mental illness. In fact, a Global Burden of disease study identified that almost half of the ten leading debilitating conditions afflicting 20-24 year olds are mental disorders (Gore et al., 2011). Specifically, adding to the socially and academically disadvantaged nature of FGCSs, low-SES students, and students with disabilities is the risk of stress, anxiety, and anxiety disorders among individuals within these populations. The transition into higher education can be especially challenging for FGCSs, low-SES students, and students with disabilities because of the strain, both educational and psychological, these young adults' disadvantages have on their academic successes.

### **Stress, Anxiety, and General Anxiety Disorder Symptomology**

**Features of Anxiety and General Anxiety Disorder.** The American Psychiatric Association (2013) describes *anxiety* as the anticipation of future threat. According to Baer, Kim, and Wilkenfeld (2012), the root meaning of the word anxiety is to “vex or trouble”. Palomar-Lever & Victorio-Estrada (2012) suggested that stress is a key predictor for anxiety. It was also found that poor coping styles are related to anxiety (Palomar-Lever & Victorio-Estrada, 2012).

An *anxiety disorder* combines features of excessive fear and anxiety and related behavioral disturbances (American Psychiatric Association, 2013). Whereas anxiety is often stress-induced, anxiety disorders are persistent (typically lasting 6 months or longer), and individuals with anxiety disorders typically overestimate the danger of situations they fear or avoid (American Psychiatric Association, 2013).

Specifically, *Generalized Anxiety Disorder* (GAD) is characterized by excessive anxiety and worry about a number of events or activities lasting for at least 6 months. With GAD, individuals find it difficult to control their worry, and the worry is associated with a myriad of

physical symptoms. One prominent diagnostic features in GAD is the intensity, frequency, and duration of the anxiety that is out of proportion to the everyday activity or event that is being worried about. The worries of individuals tend to be age and developmentally appropriate (e.g., adults worrying about job responsibilities and finances, while college students worry about the competence or quality of their academic performance). Many individuals with GAD report having feelings of anxiety and nervousness for their entire lives. The 12-month prevalence of GAD is 0.9% among adolescents of the general U.S. population and 2.9% among adults. Younger adults tend to experience greater severity of GAD symptoms than do older adults. (American Psychiatric Association, 2013)

There are distinct differences to be noted between GAD and nonpathological anxiety. Foremost, while the worries of everyday life are not excessive and are perceived as more manageable, worries associated with GAD are excessive and can interfere with psychosocial functioning. GAD is associated with worries that are more persistent, pervasive, pronounced, and distressing to individuals, and may occur without precipitating events. Also, while everyday worries are less likely to be accompanied by physical symptoms, individuals with GAD experience three or more of the following: restlessness or feeling keyed up or on edge, being easily fatigued, difficulty concentrating or mind going blank, irritability, muscle tension, and sleep disturbance, and to a lesser extent, sweating, nausea, and diarrhea. Individuals with GAD experience distress due to worrying about important areas of functioning which manifests in social, educational, and occupational impairments. The greater the range of life circumstances that an individual worries about (e.g., finances, health, academic performance, job performance), the more likely the individual's symptoms are to meet criteria for GAD. (American Psychiatric Association, 2013)

A risk factor of GAD that is related to the current populations of interest is individuals' experiences of adversities during childhood. One prominent functional consequence of GAD is the time and energy that excessive worrying consumes in individuals; in home, work, and school settings, exacts a toll on individuals' capacity to complete tasks efficiently. Also, GAD is associated with significant disability and distress that accounts for 110 disability days among the U.S. population.

**Students Enrolled in Postsecondary Institutions.** The prevalence and severity of mental health issues are increasing in the postsecondary student population (American College Counseling Association, 2011). The factors of academic life, financial burden, and social adjustments in postsecondary settings can contribute to stress and anxiety in students (DeBerard, Spelmans, & Julka, 2004). In a study of 2,785 U.S. university students, Eisenberg, Gollust, Golberstein, and Hefner (2007) found that 15.6% of undergraduates displayed symptoms of depression and/or anxiety. Mental health issues in university students can lead to negative outcomes, with a prevalent outcome being poor academic performance (Cook, 2007). According to Andrews and Wilding (2004), clinically anxious college students report lower exam scores than non-anxious students. Hussain, Guppy, Robertson, and Temple (2013) found that poor mental well-being is a key predictor of drop-outs in the postsecondary student population.

**First-year Students Enrolled in Postsecondary Institutions.** Mental health is an important factor to monitor in first-year postsecondary students because of both the social and academic adjustments that students encounter while transitioning from the high school setting to an institution of higher education. Hussain et al. (2013) found that 8% of a sample of first-year students from public university in England had received a diagnosis of either depression or anxiety, and of these students, psychological distress was elevated. Risks of poor mental well-

being, such as depression and anxiety, include poor physical health, maladaptive and/or a lack of social interactions, and negative outcomes in postsecondary education, including student drop-out (Cook, 2007; Patel, Flisher, Hetrick, & McGorry, 2007).

In a study of 226 first-year undergraduate students, Pancer, Hunsberger, Pratt, and Alisat (2000) found that college freshmen's initial adjustment during the first 6 months at their university was significantly related to their levels of stress immediately prior to beginning their undergraduate studies. Consequently, it was shown that college freshmen who experienced high levels of stress prior to beginning college showed poor levels of adjustment to university life (Pancer, Hunsberger, Pratt, & Alisat, 2000). Sasaki and Yamasaki (2007) stated that better adaptation to university life among students can be promoted by positive coping that focuses on problem-solving.

### **Stress and Coping: First-generation College Students**

FGCSs tend to experience greater stress than their non-FGCS counterparts (Phinney & Haas, 2003). These students tend to come from low-income households and therefore have greater financial need (Terenzini, Springer, Yaeger, Pascarella, & Nora, 1996); most have part-time or full-time jobs while also being enrolled as full-time students (Phinney & Haas, 2003). Many FGCSs from immigrant families, especially those living at home, experience the strain of commitments to cultural and household obligations, such as childcare and housework, while also balancing academics (American Association of University Women Educational Foundation, 2001).

FGCSs tend to be less prepared for postsecondary studies than their non-FGCS peers both socially and academically, and therefore tend to be overwhelmed with aspects of the college setting (Hertel, 2002). FGCSs also may perceive that they are less supported on campus than

non-FGCSs, and may therefore spend more time focusing on off-campus relationships (Hertel, 2002). Still, there are FGCSs who do not receive adequate support from family, and this can result in increased stress levels. College students with a strong belief in their ability to successfully perform in an academic setting tend to experience higher levels of psychological well-being and less anxiety (Chemers, Hu, & Garcia, 2001). However, FGCSs encounter more academic challenges than their non-FGCS counterparts (Horn & Nunez, 2000). Wang and Castañeda-Sound (2008) found that FGCSs report lower levels in their confidence to succeed academically, negatively affecting these students' overall psychological well-being. Wang and Castañeda-Sound (2008) also found that the greatest predictor of students' psychological well-being is high self-esteem, indicating higher levels of life satisfaction, lower levels of stress, and fewer psychological symptoms.

One factor that may be detrimental to the success of FGCSs is the lack of social capital that most FGCSs experience. Social capital can be defined as access to knowledge, resources, and leisure activities through social networks, and this can be highly beneficial to both the academic and social decision-making process while enrolled in college (Pascarella, Pierson, Wolniak, & Terenzini, 2004). Given this absence of social support and helpful resources, FGCSs encounter more challenges navigating the university setting, thus prohibiting full engagement in their academic pursuits (Soria & Stebleton, 2012). Newby-Fraser and Schlebusch (1997) found that in students, perceived absence of social support is associated with higher stress and lower academic performance.

FGCSs display less engagement in the postsecondary setting, both academically and socially. They tend to be less confident in their academics and are less likely to seek help from university faculty (Jenkins, Miyazaki, & Janosik, 2009) and may lose opportunities to pursue

mentoring relationships with older students and faculty within their institutions. FGCSs also report more confusion regarding faculty's expectations for assignments (Collier & Morgan, 2008). The lack of engagement results in the isolation and disconnection of FGCSs from their institutions, particularly those enrolled in large research universities (Kim, 2009). A study by Soria and Stebleton (2012) found that retention rates are lower in FGCSs as compared to non-FGCSs. Soria and Stebleton (2012) also found that even when controlling for demographic, academic, and social factors, FGCSs reported significantly lower academic engagement, concluding that FGCS status lowers students' social capital, thus decreasing these students' academic engagement.

**First-year Students Enrolled in Postsecondary Institutions.** The stress experienced and the relatively low availability of social capital while adjusting to postsecondary academic life is particularly damaging in FGCSs; first year students' initial experiences at an institution ultimately influence their ability to be successful (Soria & Stebleton, 2012). Phinney and Haas (2003) found that first-year FGCSs identified time conflicts, academic pressure, and family difficulties as major stressors; it was found that seeking support is the most successful coping strategy for first-year FGCSs. Accordingly, a lack of social support during FGCS first year of college was associated with less successful coping (Phinney & Haas, 2003). Chemers et al. (2001) stated that social support is related to academic success, specifically in the area of adjustment.

### **Stress and Anxiety in Low Socio-Economic Status**

**Young Adults (General U.S. Population).** Consistently positive relationships have been established between low-SES status and psychiatric disorders (Hudson, 2005). Individuals in lower social classes are exposed to more stressful experiences than those who are in a higher

social class (Wolff, Santiago, & Wadsworth, 2009). Stress is more psychologically damaging to individuals within lower social classes because this population has limited access to social relationships and other resources that could be helpful in stress-inducing situations (Wolff et al., 2009). Kinnier, Hofsess, Pongratz, and Lambert (2009) found that perceiving oneself's situation as hopeless is prevalent in individuals with anxiety disorders. Chronic exposure to stress promotes the development of anxiety symptoms (Hammen, Kim, Eberhart, & Brennan, 2009), and poor youth and adults experience chronically stressful living conditions (Wolff, Santiago, & Wadsworth, 2009). Palomar-Lever & Victorio-Estrada (2012) suggested that stress is a key predictor for anxiety. Specifically, it was found that poor coping styles exhibited by individuals in stress-inducing situations are related to anxiety (Palomar-Lever & Victorio-Estrada, 2012). Termed *poverty-related stress*, multiple stressors in the lives of low-SES individuals can have significant effects on psychological functioning (Wadsworth et al., 2008).

Chronic poverty-related stress can lead to the development of anxiety disorders (Weems, Zakem, Costa, Cannon, & Watts, 2005). Poverty-related stress can be detrimental to the mental health of all individuals, but younger adults tend to be more affected by this stress more than older individuals, and this may be due to the lack of power, such as his or her family's financial state, that young adults are not in a position to control or change (Wolff et al., 2009). In a study examining children and parents from low-SES families, it was found that experiencing high levels of poverty-related stress may lead to damaging psychopathology, particularly anxiety-related disorders (Wolff et al., 2009). Najman (2010) found that cumulative poverty across the lifespan through adolescence has a consistent impact on young adult anxiety. It has been argued that the linkage between low-SES living conditions and anxiety lies in individuals' continuous exposure to their perpetual lack of resources (Davidson et al., 2001). Younger people exposed to

poverty-related stress are also at greater risk because of their relative developmental vulnerability.

Historically, women have held the primary responsibility for household duties such as childcare, elder care, cooking, and chores; with women now being as equally involved as men in academia and the workforce, women are struggling to find the balance between household responsibilities and their education and/or careers (Bird, 1999). Women's high levels of this described responsibility for domestic work, combined with a low socioeconomic position, have resulted in high risks of psychological distress in adult women of low-SES status (Matthews & Powers, 2005).

One of the most commonly diagnosed psychological disorders in the socially disadvantaged is GAD (Kessler & Wittchen, 2002). Moffitt et al. (2007) found that low-SES living conditions during childhood are associated with the future onset of GAD. However, the social factors involved in the etiology of GAD often go unnoticed and remain unrecognized (Baer, Kim, & Wilkenfeld, 2012). In a study examining poor families, Baer et al. (2012) found that poverty is positively associated with GAD, supporting the premise that the contextual factors of stress and anxiety should be considered when studying the causes of psychologically debilitating conditions. From this, Baer et al. (2012) suggest that the origin of anxiety in the poor is not psychiatric but environmental.

### **Anxiety Symptomology in Individuals with Disabilities**

**Students Enrolled in Postsecondary Institutions.** Understanding the impact of learning disabilities in the postsecondary arena is essential to providing more efficient academic and vocational support to students. Verhoof, Maurice-Stam, Heymans, and Grootenhuis (2013) found that young adults with disabilities generally report higher levels of anxiety than those from the

general population. Gregg, Hoy, King, Moreland, and Jagota (1992) found that university students with disabilities reported significant stress levels, both short-term and long term, which can lead to anxiety disorders. Also, it was found that behaviors identified with general anxiety are found in the personality traits of students with learning disabilities (Gregg et al., 1992). Lastly, Gregg et al. (1992) suggested that the social isolation students experience while in the university setting may result in generalized anxiety in subsequent years.

Students with learning disabilities represent the largest group of students with disabilities in postsecondary institutions, and the number of students entering postsecondary institutions with learning disabilities is steadily increasing (Trainin & Swanson, 2005). It has been found that higher education improves employment opportunities for individuals with disabilities (Ontario Coalition for Inclusive Education, 2002), yet students with learning disabilities are particularly disadvantaged in the university setting (Reed, Lewis, & Lund-Lucas 2006). Manglitz, Hoy, Gregg, King, and Moreland (1995) found that college students with learning disabilities are highly affected by their anxiety symptomology in academic settings. It has been suggested that when college students are anxious about performing academically, they may lack the ability to effectively demonstrate their actual level of knowledge and skills (Weinstein & Palmer, 1990). Specifically, Connelly, Hasher, and Zacks (1991), found that anxiety related to academic performance may result in the reduction of memory capacity. Even after accommodations in the academic setting were made, Fuller, Healey, Bradley, and Hall (2004) found that students with learning disabilities still had academic disadvantages. For reasons such as these, it is imperative that colleges and universities support students with learning disabilities not only academically, but also psychosocially.

## **Student Support Services in Higher Education**

The role of environmental social conditions in the manifestation of psychological distress is often disregarded and underestimated (Baer et al., 2012). Anxiety is matter of concern in social work because it brings significant distress to those affected by it (Baer et al., 2012), specifically for individuals with disadvantaged life conditions, and in this case, the populations of study (FGCS, low-SES, and individuals with disabilities). According to Kuh (2008), university initiatives designed specifically for disadvantaged student populations promote academic enhancement and social engagement, therefore supporting student retention. For example, a study by Pancer, Pratt, Hunsberger, and Alisat (2004) found that university freshmen who took part in a university preparation course reported higher levels of university adjustment and had lower drop-out rates.

Through Student Support Services (SSS) programs, the U.S. federal government awards funding to institutions of higher education to assist students with academic, social, and financial disadvantages. SSS is one of eight federally funded grant programs that are administered as part of the Federal TRIO Programs (TRIO) within the U.S. Department of Education SSS provides opportunities for academic development to students of low-income status, those who are of FGCS status, and students with registered disabilities. SSS also provides aid to students receiving Federal Pell Grants. Support is provided by assisting students with fulfilling basic college requirements and motivating students toward the successful completion of postsecondary education. Specifically, SSS programs offer academic tutoring (instruction in reading, writing, study skills, mathematics, science, and other subjects), advising in postsecondary course selection, assistance regarding financial aid programs, aid with locating public and private scholarships, and assistance in completing financial aid applications. Beyond assistance with

factors of students' current academic setting, SSS programs provide education regarding financial and economic literacy and guidance with the graduate and professional school application process. Also, SSS provides students with opportunities for individualized counseling sessions with SSS counselors regarding personal problems as well as academic and career counseling. Last, SSS provides students with access to cultural events, academic programs, and mentoring programs not available to the general student population, as well as housing support during to students with no home to go to during breaks in the academic year. The goal of SSS programs is to increase college retention and ultimately, graduation rates of its participants. (U.S. Department of Education, 2014)

Several empirical studies have supported the success of SSS programs throughout the U.S. When evaluating SSS programs across the nation, the U.S. Department of Education (2010) found that participation in SSS counseling and programming during students' freshman year was associated with increases in student retention and degree completion. Also, supplemental services to students (e.g. educational and cultural seminars) were also positively associated with students' retention and degree completion (U.S. Department of Education, 2010). U.S. Department of Education (1997) found that best practices for SSS programs includes programming and activities specifically geared toward students' freshman year experience, academic support for common freshman courses, extensive student contacts with SSS counselors, participant recruitment and incentives, and a genuine and dedicated nature of SSS staff. The evaluation of an SSS program at a community college showed that the most effective practices of SSS include helping students gain career clarity, providing intensive academic planning and monitoring, offering learning enhancements, recognizing student achievements, and identifying resources that contribute to students' success (Walsh & Kankakee Community

College, 2000). The academic, social, and psychosocial support provided to students of FGCS status, low-SES backgrounds, and those with registered disabilities in SSS programs nation-wide is essential to the overall academic and vocational success of these disadvantaged student populations.

### **CHAPTER 3: METHODOLOGY**

The current cross-sectional descriptive study examined stress and anxiety symptomology in Louisiana State University's (LSU) SSS freshman population. The participants in the study were operationalized as university-recognized students of FGCS status, students with low-SES status, and students with registered disabilities. The dependent variables (symptoms of stress and anxiety) were operationalized by The Perceived Stress Scale and the Overall Anxiety Severity And Impairment Scale. The study was approved by the LSU Institutional Review Board.

The study was guided by the following research questions:

1. What is the level of stress reported by SSS-enrolled freshman students as indicated by scores on the Perceived Stress Scale?
2. What is the level of anxiety reported by SSS-enrolled freshman students as indicated by scores on the Overall Anxiety Severity and Impairment Scale?
3. To what extent do stress and anxiety scores vary by demographic variables (race, gender, number of SSS classifications, low-income v. non-low-income, weekly work hours, and current major)?

It is hypothesized that the more of SSS classifications an SSS-enrolled freshman student qualifies for, the higher the stress and anxiety symptoms that students will report on the Perceived Stress Scale and the Overall Anxiety and Impairment Scale. It is also hypothesized that female SSS-enrolled freshmen students will report higher levels of stress and anxiety on the Perceived Stress Scale and the Overall Anxiety and Impairment Scale than male SSS-enrolled freshmen students.

## **Procedures**

Participants were recruited through e-mails and text alerts. These messages included information regarding eligibility requirements and the dates, times, and locations that the measurements would be accessible to the students. Also, the messages included information describing two participants' chances for being randomly selected to receive one of two \$20 VISA gift cards, as an incentive for students to participate in the study. The anonymous survey was available to students via an e-mailed Survey Monkey link and was accessible for students to complete online at their leisure for two consecutive weeks.

## **Sample**

The procedures resulted in 55 students completing the online survey. This sample was drawn from 96 first-year students enrolled in LSU's SSS program. These students were of FGCS status, low-SES status, are registered with disability, or have with two or more of these classifications. Thus, this study's sample included 59.29% of freshmen students utilizing SSS for the 2014-2015 academic year. The researcher's relationship with the participants was that of a Master's level social work intern assigned by the LSU School of Social Work. The researcher served as a counselor to LSU's SSS student population and holds the role of academic advisor, individual appointment counselor, college success educator, and study skills course instructor. The researcher began her placement as an intern in LSU's SSS program at the beginning of the 2014-2015 academic year. In her capacity as SSS counselor, advisor, and instructor, she also had personal acquaintances with all 96 freshmen students enrolled in SSS, and communicates with them via email and office visits on a regular basis.

**Sample Demographics.** Four-fifths (80%) of participants were female (n=44), and one-fifth (20%) of participants were male (n=11). Over two-fifths (43.63%) of participants identified

as White, followed by Black or African-American (32.72%), from multiple races (10.90%), Asian (9.09%), and American Indian or Alaskan Native (3.63%). The mean age of participants was 18.49, as nearly one-half of participants (50.90%) were 18 years old, and the other one-half of participants (49.09%) were 19 years old. Of the three SSS classifications (FGCSs, low-SES students, and students registered with disabilities), 80% reported FGCS status, 69.09% reported low-SES, and 3.63% reported being registered with a disability. Almost half (47.27%) of participants reported possessing only one SSS classification, while 50.90% reported possessing two SSS classifications, and only one person reported possessing three SSS classifications. Participants' majors were grouped according to discipline; reported majors were as follows: (Chemistry, Astronomy, Pre-Veterinary, Renewable Natural Resources, & Animal Science: 21.81%; Psychology, Anthropology, History, Child & Family Studies, Education, & Human Resources: 16.36%; Pre-Nursing, Pre-Dental Hygiene, & Nutrition and Dietetics: 12.72%; Engineering, Computer Science, & Construction Management: 12.72%; Business, Accounting, Marketing, & Finance: 10.90%; Mass Communications & Graphic Design: 10.90%; Kinesiology: 10.90%; Undecided: 3.63%). Lastly, 32.72% of participants reported that they do not have either an on-campus or off-campus job, while 23.63% reported working 10 hours per week or less, 38.18% reported working 11-20 hours per week, 3.63% reported working 21-30 hours per week, and one person reported working 31-40 hours per week.

## **Instruments**

**Perceived Stress Scale.** The Perceived Stress Scale (PSS) was used to measure levels of stress among participants. The PSS is a psychometrically sound global measure of perceived stress, designed by Cohen (1988). It includes 10 Likert-type scale items (*0=Never, 1=Almost Never, 2=Sometimes, 3=Fairly Often, 4=Very Often*) that assess the degree to which individuals

appraise their situations as stressful (i.e., unpredictable, uncontrollable, and overloaded in nature). This instrument was designed for use in community samples; therefore, the items are simple and easy to comprehend. The PSS assesses feelings and thoughts experienced during the past month (Cohen, 1988). Total scores will range from 0-40, and higher scores indicate increased stress. The normed score for individuals ages 18-29 is 14.2. Generally, scores 16-20 indicate stress that is moderately higher than average, and scores of 21-40 indicate stress that is much higher than average (Cohen, Kamarck, & Mermelstein, 1983). For the PSS, Andreou et al. (2011) found a satisfactory Cronbach's alpha of 0.82.

**Overall Anxiety Severity And Impairment Scale.** The Overall Anxiety Severity And Impairment Scale (OASIS) was used to measure levels of anxiety among participants. The OASIS was designed by Norman and colleagues (2006). It is a brief, five-item continuous measure used to assess anxiety disorders as well as the threshold of anxiety symptoms. Specifically, the OASIS measures anxiety severity and related impairment. Respondents are asked to answer items based on their experiences in the past week. Responses are measured using a 5-point Likert scale (*0=No anxiety in the past week; 1=Infrequent anxiety. Felt anxious a few times; 2=Occasional anxiety. Felt anxious as much of the time as not. It was hard to relax; 3=Frequent anxiety. Felt anxious most of the time. It was very difficult to relax; 4=Constant anxiety. Felt anxious all of the time and never really relaxed.*) OASIS scores can range from 0-20, and higher scores indicate greater anxiety-related severity and impairment. The first population to be assessed by the OASIS was a group of U.S. undergraduate students, for which the Cronbach's alpha was 0.80. (Norman, Cissell, Means-Christensen, & Stein, 2006). A study by Campbell-Sills et al. (2009) examined 1,036 patients with clinical anxiety and found that a cut-score of 8 correctly identified the anxiety disorder status of 87% of the sample.

## **Data Analysis**

Univariate analyses were performed to determine the mean scores on the PSS and the OASIS. Participants' mean scores from both instruments were compared to that of the normed and cut-off scores for problematic stress and anxiety as reported for the respective instruments. Bi-variate analyses were also performed to examine differences in stress and anxiety scores among SSS classifications and demographic characteristics. To examine stress and anxiety within the sample's races, genders, number of SSS classifications, and low-income v. non-low-income status, t-tests were used. A Pearson correlation was used to examine stress and anxiety among participants' weekly work hours, and an ANOVA was used to examine stress and anxiety among participants' majors.

## CHAPTER 4: RESULTS

This study examined stress and anxiety levels among university freshmen of first generation college student status, low-income status, and students registered with disabilities. Descriptive statistics were used to examine the study's research questions.

Question 1: What is the level of stress reported by SSS-enrolled freshman students as indicated by scores on the Perceived Stress Scale?

The properties of the PSS were examined with respect to internal reliability and normality of the distribution. The alpha coefficient obtained for the scale was .80. The PSS was found to be normally distributed. To answer question 1, the mean and standard deviation of the PSS was calculated. The PSS mean for the sample is 20 (sd, 6.09).

Question 2: What is the level of anxiety reported by SSS-enrolled freshman students as indicated by scores on the Overall Anxiety Severity and Impairment Scale?

The properties of the OASIS were examined with respect to internal reliability and normality of the distribution. The obtained alpha coefficient was .83. The OASIS was found to be normally distributed. To answer question 2, the mean and standard deviation of the PSS was calculated. The OASIS mean for the sample is 6.61 (sd, 3.90).

Question 3: To what extent do stress and anxiety scores vary by demographic variables (race, gender, number of SSS classifications, low-income v. non-low-income, weekly work hours, and current major)?

The demographic variables were analyzed in relation to both PSS and OASIS scores (see Tables 1 and 2).

Table 1. Associations of Demographic Variables and PSS (T-Tests)

| Demographic variable       | Mean Score               | Mean Score             |
|----------------------------|--------------------------|------------------------|
| Gender                     | Male (14.36)             | Female (21.41) ***     |
| Race                       | African-American (19.83) | White (19.75)          |
| Income                     | Low income (19.26)       | Non-low-income (21.81) |
| Age                        | 18 (20.79)               | 19 (19.19)             |
| Number SSS classifications | One (20.00)              | Two (20.00)            |

\*\*\*  $p < .001$

Table 2. Associations of Demographic Variables and OASIS (T-Tests)

| Demographic variable       | Mean Score              | Mean Score            |
|----------------------------|-------------------------|-----------------------|
| Gender                     | Male (3.64)             | Female (7.35)***      |
| Race                       | African-American (7.00) | White (7.17)          |
| Income                     | Low income (6.50)       | Non-low-income (6.81) |
| Age                        | 18 (6.74)               | 19 (6.44)             |
| Number SSS classifications | One (6.35)              | Two (6.93)            |

\*\*\* $p < .01$

**Race.** The analysis of differences with respect to race was conducted by comparing Black/African American participants and White participants only. In the comparison of Black/African American and White participants ( $n=42$ ) no significant differences were found between the two groups for either the stress or anxiety scale.

**Gender.** The analysis of differences with respect to gender was conducted by comparing male and female participants. Women of the sample had significantly higher PSS scores than men ( $\bar{x} = 7.35$  v.  $3.64$ ;  $t=2.99$ ,  $p < .01$ ). Women reported a mean PSS score of 21.41, and men reported a mean PSS score of 14.36. Women also had significantly higher OASIS scores than men ( $\bar{x}=21.41$  v.  $14.36$ ;  $t=3.84$ ,  $p < .01$ ). Women reported a mean OASIS score of 7.35, and men reported a mean OASIS score of 3.64.

**Number of SSS classifications.** The analysis of differences with respect to students' number of SSS classifications was conducted by comparing students who qualify for only one SSS classification to students with any two SSS classifications. There was no significant difference in levels of anxiety or stress in students' numbers of SSS classifications. An analysis that compared the three SSS classifications to one another could not be conducted because a significant number of students shared multiple SSS classifications that overlapped.

**Low-income v. non-low-income.** The analysis of differences with respect to income level was conducted by comparing students that reported being from low-income households to students that did not report being from low-income households. No significant differences between the two groups were found on either the PSS or the OASIS.

**Work hours.** A Pearson correlation found that there was no significant difference between participants who reported working an on and/or off-campus job and participants who did not report working an on and/or off-campus job  $p < .1$ .

**Major.** Participants' majors were grouped into the following areas of similar disciplines: (Pre-Nursing/Pre-Dental Hygiene/Nutrition and Dietetics), (Engineering/Computer Science/Construction Management), (Business/Accounting/Marketing/Finance), (Psychology/Anthropology/History/Child & Family Studies/Education/Human Resources), (Mass Communications/Graphic Design), (Chemistry/Astronomy/Pre-vet/Renewable Natural Resources/Animal Science), (Kinesiology), and (Undecided); no significant differences between students' current majors were found.

## **CHAPTER 5: DISCUSSION AND CONCLUSION**

This descriptive study sought to explore stress and anxiety symptomology among historically disadvantaged populations within the university setting. It is well documented that students face significant levels of stress and anxiety during their first year in higher education settings (Hussain et al., 2013). It has also been established that young adults of low-SES and those with disabilities face disproportionately higher amounts of stress and anxiety than young adults in the general population (Moffitt et al., 2007; Verhoof, Maurice-Stam, Heymans, & Grootenhuis, 2013). There is a gap in the literature, however, when examining the extent to which stress and anxiety are prevalent in these populations among first-year students in the higher education setting.

University freshmen that experience high levels of stress prior to beginning their higher education studies exhibit poor levels of adjustment to university life (Pancer, Hunsberger, Pratt, & Alisat, 2000). FGCSs tend to come from low-income households and also have more non-academic responsibilities (Terenzini, Springer, Yaeger, Pascarella, & Nora, 1996), such as jobs and family obligations (Phinney & Haas, 2003). Low-SES students experience highly stressful living conditions (Wolff, Santiago, & Wadsworth, 2009); these individuals' tendency to cope poorly with stress can lead to severe anxiety (Palomar-Lever & Victorio-Estrada, 2012). Lastly, college students with disabilities report significant amounts of both long-term and short-term stress (Gregg, Hoy, King, Moreland, & Jagota, 1992). Given the inhibition that stress and anxiety can have on individuals' social, vocational, academic, and mental abilities, university students of FGCS status, low-SES status, and those with disabilities have a much greater risk of failure in higher education settings. For this reason, it is essential that colleges and universities offer academic advising, college success training, and support services to students within these

disadvantaged populations. Particularly, given the findings from the current study, colleges and universities should directly address the stress and anxiety experienced by these students.

Although researchers have examined risks to mental health within these populations (American College Counseling Association, 2011), the present study specifically examined the presence of stress and anxiety in first-year students of FGCS status, low-SES, and students with disabilities within a large, state university setting.

### **Stress Level**

Given that the PSS mean score of 20 found for this sample is just one point below the cut-point for scores considered to be of clinical concern, it can be concluded that participants, on average, experience high stress. This finding is clinically relevant because an overwhelming majority of participants reported high stress, and as found by Hammen, Kim, Eberhart, and Brennan (2009), chronic exposure to stress can lead to the development of physical and emotional problems, including anxiety disorders.

### **Anxiety Level**

Given that an OASIS global score of 8 or above is used to determine an anxiety diagnosis, and the current sample reported a mean score of 6.61, it can be concluded that participants, on average, experience anxiety symptoms. Of particular concern, 47.27% of the sample reported anxiety scores at or above the cut-score for an anxiety disorder diagnosis. As found by the American Psychiatric Association (2013), anxiety disorders can, minimally, negatively impact academic performance; anxiety also causes severe physical and emotional disturbances that may hinder individuals' ability to function at general developmental levels.

## **Stress and Anxiety in Demographic Variables**

Gender was the only demographic variable significantly associated with variation in stress and anxiety scores. As hypothesized, female participants reported significantly higher levels of both stress and anxiety symptoms than male participants. This finding is significant because it has been widely established that the children of low-income households carry much of the financial and caregiving burdens of their families, even from young ages (American Association of University Women Educational Foundation, 2001). Particularly, female household members of low-SES backgrounds bear the burden of significantly more household duties than males (Matthews & Powers, 2005). This could be an indication that the women in the sample experience these home-life burdens in addition to the stress and anxiety induced by their university life adjustments, resulting in significantly higher stress and anxiety than the male participants. This finding is consistent with a broad literature that has shown gender effects for psychological distress in diverse samples over time (Harryson, Novo, & Hammarström; Harryson, Strandh, & Hammarström, 2012).

## **Limitations of the Current Study**

The current study is an initial investigation to identify factors contributing to the stress and anxiety of first-year FCGSs, low-SES students, and students with disabilities in LSU's SSS program. Further research can expand upon these findings by addressing the limitations of this study. More specifically, this study relies on a convenience sample within one state university of the U.S., making it susceptible to bias. The current study did not use a random sample; therefore, the findings cannot be generalized to other populations, but only similar students at similar universities. Also, as a descriptive study, it has limited the researcher's ability to draw conclusions about the sample over students' matriculation through their undergraduate studies.

It is also important to note that it is possible that the participants' rapport with the researcher (participants' counselor intern) could affect the quality of data. Lastly, the relatively small sample size and low response rate warrants even further caution when drawing conclusions about this population of students.

The measures for the stress and anxiety symptoms in the sample also pose limitations for the results of the study. The PSS consists of 10 items that measured stress symptomology, and the OASIS consists of 5 items that measure anxiety symptomology. While these measures are reliable, more in-depth measures could allow for the identification of more specific types of stress and anxiety and also more precise severities of stress and anxiety.

### **Implications for Future Research**

The present study examines two widely researched aspects of mental health (stress and anxiety) within three widely researched populations (FGCSs, low-SES students, and students with disabilities). It has looked at the presence of reported stress and anxiety within several demographic factors of these disadvantaged student populations at only LSU, which is a large state university. Thus, further research that examines stress and anxiety among these student populations within a variety of higher education institutions, including private colleges and universities, and both 2-year and 4-year institutions, should be examined. Also, further research can examine the use of mental health resources within these student populations; plausibly, students that utilize mental health services would report less significant levels of stress and anxiety. Lastly, given the current finding that female participants reported significantly higher stress and anxiety than male participants, further research should examine differences between the stressors of male and female students from these disadvantaged student populations. It would be beneficial for future studies to examine the nature of stressors in female students; this

could lead to implications for addressing female students' stress in the form of practice and also access to helpful resources.

### **Implications for Policy**

In addition to this study prompting further research, there are implications that can be made for policy. Programs that provide education, social services, and mental health services to disadvantaged student populations are often funded through external entities. SSS, a Federal TRIO program, is a federally funded grant program designed to provide both academic and social support to university FGCSs, low-SES students, and students with disabilities (U.S. Department of Education, 2014). Currently in the U.S., there are over 7,000 post-secondary institutions (National Center for Education Statistics, 2013), yet the U.S. federal government has funded SSS programs at only 1,027 institutions this academic year (U.S. Department of Education, 2014). In 2012, there were 17.7 million students enrolled in U.S. institutions of higher education (National Center for Education Statistics, 2014), yet the U.S. federal government has allocated grant money (\$288,631,903) to serve only 202,492 students of FGCS status, low-SES status, and those with disabilities (U.S. Department of Education, 2014). SSS programs across the U.S. serve approximately 1.19% of the higher education student population, yet 50% of all post-secondary students are of FGCS status, 50.9% of all post-secondary students are of low-SES, and 11% of all post-secondary students have disabilities (American Council on Education, 2002; National Center for Education Statistics, 2012; U.S. Department of Education, National Center for Education Statistics, 2013). This extreme deficit in SSS program funding necessitates the U.S. Department of Education to closely evaluate the positive social, behavioral, and academic effects that SSS programs provide to students from these disadvantaged populations; it is consequently

warranted for the U.S. Department of Education to allocate significantly more funding programs which support students from these disadvantaged populations.

### **Implications for Practice**

While policy influences the widespread outcomes of groups, institutions, and systems, mental health and social service professionals provide direct practice to FGCSs, low-SES students, and students with disabilities within higher education settings. The clinically relevant levels of stress and anxiety reported by the current sample warrants that a large emphasis be placed on the mental health needs of university students of disadvantaged populations. It has been established that academic support is a key component of students' success in higher education, but as found by this study, it is equally as vital address stress, anxiety, and other mental health issues within these vulnerable populations. This practice can be implemented through regular evaluations and assessments of SSS students' mental health, mental health counseling, educational interventions regarding mental health, stress regulation, self-care, and organized support groups. Last, given that there is a consistent influx of female students within higher education (NCES, 2013), combined with the significant stress and anxiety levels reported in female participants of the current study, it may be beneficial to implement mental health services such as counseling, group therapy, and support groups for female students of these disadvantaged university populations.

### **Conclusion**

Gaining knowledge regarding the mental health of disadvantaged student populations is extremely useful in gauging and addressing students' needs. Specifically, examining university students' stress and anxiety levels can aid us in identifying to what degree stress and anxiety hinder academic performance and success. It is well known that stress and anxiety are key

predictors of poor academic performance and ultimately, college dropouts (Hussain, Guppy, Robertson, & Temple, 2013). It has also been established that the successful completion of a higher education degree increase chances of gaining stable employment and contributing back to society, both socially and economically (College Board, 2010). Since stress and anxiety are prevalent in such large disadvantaged post-secondary student populations, it is critical to acknowledge these threats to academic success. It is just as critical to implement programs, policies, and best practices to meet the mental health needs of these student populations, consequently promoting higher education retention, academic success, attainment of bachelors degrees, and widespread employment. It is vital, therefore, that programs such as SSS be funded at both state and federal levels and be provided to students in higher education that qualify as members of these disadvantaged, at-risk populations. The intimate academic and personal counseling provided through SSS is a significant aid in students' matriculation through the overwhelming academic and social aspects of large college and university settings.

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## APPENDIX A: RECRUITMENT EMAIL

SSS Freshmen,

I, your SSS Social Work Intern, need your assistance! I am conducting a survey for my Master's Thesis, and it would be very helpful for you to complete the survey. This survey is completely optional, and there are no penalties for not completing it. If you do complete the survey, however, you will be entered into a drawing for a chance at winning one of two \$20 VISA cards! The survey is short and will take no longer than 15 minutes to complete. To take the survey, simply click the link below and follow the prompts on the screen. Please take the survey only once. Contact Kelly with any questions regarding your participation in the study.

<https://www.surveymonkey.com/s/MSWallison>

Thanks in advance!

Kelly Allison  
Louisiana State University  
Student Support Services  
MSW Intern  
[kallis4@tigers.lsu.edu](mailto:kallis4@tigers.lsu.edu)

## APPENDIX B: THE PERCEIVED STRESS SCALE

The questions in this scale ask you about your feelings and thoughts during the last month. In each case, you will be asked to indicate by circling how often you felt or thought a certain way:

|   | Never | Almost<br>Never | Sometimes | Fairly<br>Often | Very<br>Often |
|---|-------|-----------------|-----------|-----------------|---------------|
| In the past month, how often have you been upset because of something that happened unexpectedly?                     | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you felt unable to control the important things in your life?                       | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you felt nervous or stressed?   | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you felt confident about your ability to handle personal problems?                  | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you felt that things were going your way?   | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you found that you could not cope with all the things you had to do?                | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you been able to control irritations in your life?                                  | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you felt that you were on top of things?  | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you been angry because of things that happened that were outside of your control?   | 0     | 1               | 2         | 3               | 4             |
| In the past month, how often have you felt that difficulties were piling up so high that you could not overcome them? | 0     | 1               | 2         | 3               | 4             |

## APPENDIX C: THE OVERALL ANXIETY SEVERITY AND IMPAIRMENT SCALE

The following items ask about anxiety and fear. These symptoms may include panic attacks, situational anxieties, worries, flashbacks, and hypervigilance of startle. Include all of your anxiety symptoms when answering these questions. For each item, circle the number for the answer that best describes your experience over the past week:

1. In the past week, how often have you felt anxious?
  - 0 = *No* anxiety in the past week.
  - 1 = *Infrequent* anxiety. Felt anxious a few times.
  - 2 = *Occasional* anxiety. Felt anxious as much of the time as not. It was hard to relax.
  - 3 = *Frequent* anxiety. Felt anxious most of the time. It was very difficult to relax.
  - 4 = *Constant* anxiety. Felt anxious all of the time and never really relaxed.
  
2. In the past week, when you have felt anxious, how intense or severe was your anxiety?
  - 0 = *Little or None*: Anxiety was absent or barely noticeable.
  - 1 = *Mild*: Anxiety was at a low level. It was possible to relax when I tried. Physical symptoms were only slightly uncomfortable.
  - 2 = *Moderate*: Anxiety was distressing at times. It was hard to relax or concentrate, but I could do it if I tried. Physical symptoms were uncomfortable.
  - 3 = *Severe*: Anxiety was intense much of the time. It was very difficult to relax or focus on anything else. Physical symptoms were extremely uncomfortable.
  - 4 = *Extreme*: Anxiety was overwhelming. It was impossible to relax at all. Physical symptoms were unbearable.
  
3. In the past week, how often did you avoid situations, places, objects, or activities because of anxiety or fear?
  - 0 = *None*: I do not avoid places, situations, activities, or things because of fear.
  - 1 = *Infrequent*: I avoid something once in a while, but will usually face the situation or confront the object. My lifestyle is not affected.
  - 2 = *Occasional*: I have some fear of certain situations, places, or objects, but it is still manageable. My lifestyle has only changed in minor ways. I always or almost always avoid the things I fear when I'm alone, but can handle them if someone comes with me.
  - 3 = *Frequent*: I have considerable fear and really try to avoid the things that frighten me. I have made significant changes in my life style to avoid the object, situation, activity, or place.
  - 4 = *All the Time*: Avoiding objects, situations, activities, or places has taken over my life. My lifestyle has been extensively affected and I no longer do things that I used to enjoy.
  
4. In the past week, how much did your anxiety interfere with your ability to do the things you needed to do at work, at school, or at home?
  - 0 = *None*: No interference at work/home/school from anxiety
  - 1 = *Mild*: My anxiety has caused some interference at work/home/school. Things are more difficult, but everything that needs to be done is still getting done.

- 2 = *Moderate*: My anxiety definitely interferes with tasks. Most things are still getting done, but few things are being done as well as in the past.
- 3 = *Severe*: My anxiety has really changed my ability to get things done. Some tasks are still being done, but many things are not. My performance has definitely suffered.
- 4 = *Extreme*: My anxiety has become incapacitating. I am unable to complete tasks and have had to leave school, have quit or been fired from my job, or have been unable to complete tasks at home and have faced consequences like bill collectors, eviction, etc.

5. In the past week, how much has anxiety interfered with your social life and relationships?

- 0 = *None*: My anxiety doesn't affect my relationships.
- 1 = *Mild*: My anxiety slightly interferes with my relationships. Some of my friendships and other relationships have suffered, but, overall, my social life is still fulfilling
- 2 = *Moderate*: I have experienced some interference with my social life, but I still have a few close relationships. I don't spend as much time with others as in the past, but I still socialize sometimes.
- 3 = *Severe*: My friendships and other relationships have suffered a lot because of anxiety. I do not enjoy social activities. I socialize very little.
- 4 = *Extreme*: My anxiety has completely disrupted my social activities. All of my relationships have suffered or ended. My family life is extremely strained.

APPENDIX D: LSU IRB APPROVAL



ACTION ON EXEMPTION APPROVAL REQUEST

TO: Kelly Allison
Social Work
FROM: Dennis Landin
Chair, Institutional Review Board
DATE: January 23, 2015
RE: IRB# E9151
TITLE: Stress, Anxiety Symptomology, and the Need for Student Support Services for University Freshmen of First-Generation Status, Low-SES backgrounds, and Those Registered with Disabilities

Institutional Review Board
Dr. Dennis Landin, Chair
130 David Boyd Hall
Baton Rouge, LA 70803
P: 225.578.6692
F: 225.578.5983
irb@lsu.edu | lsu.edu/irb

New Protocol/Modification/Continuation: New Protocol

Review Date: 1/23/2015

Approved X Disapproved

Approval Date: 1/23/2015 Approval Expiration Date: 1/22/2018

Exemption Category/Paragraph: 1, 2a

Signed Consent Waived?: Yes

Re-review frequency: (three years unless otherwise stated)

LSU Proposal Number (if applicable):

Protocol Matches Scope of Work in Grant proposal: (if applicable)

By: Dennis Landin, Chairman [Signature]

PRINCIPAL INVESTIGATOR: PLEASE READ THE FOLLOWING - Continuing approval is CONDITIONAL on:

- 1. Adherence to the approved protocol, familiarity with, and adherence to the ethical standards of the Belmont Report, and LSU's Assurance of Compliance with DHHS regulations for the protection of human subjects\*
2. Prior approval of a change in protocol, including revision of the consent documents or an increase in the number of subjects over that approved.
3. Obtaining renewed approval (or submittal of a termination report), prior to the approval expiration date, upon request by the IRB office (irrespective of when the project actually begins); notification of project termination.
4. Retention of documentation of informed consent and study records for at least 3 years after the study ends.
5. Continuing attention to the physical and psychological well-being and informed consent of the individual participants, including notification of new information that might affect consent.
6. A prompt report to the IRB of any adverse event affecting a participant potentially arising from the study.
7. Notification of the IRB of a serious compliance failure.

8. SPECIAL NOTE:

\*All investigators and support staff have access to copies of the Belmont Report, LSU's Assurance with DHHS, DHHS (45 CFR 46) and FDA regulations governing use of human subjects, and other relevant documents in print in this office or on our World Wide Web site at http://www.lsu.edu/irb

## VITA

Kelly Allison received her Bachelor of Science in Psychology from Xavier University of Louisiana and is currently a candidate for her Master of Social Work (MSW) degree from Louisiana State University. While pursuing her MSW for the past two years, Kelly interned at Discovery Family Resource Project, a child safety and well-being facility in the Department of Health and Human Sciences at Southeastern Louisiana University, and Louisiana State University's Student Support Services, a federal TRIO program. These internships have provided her with skills in the areas of educational interventions and goal-planning for adults that required parenting education and also university students facing personal, social, developmental, and economic disadvantages. Upon completion of her MSW, Kelly plans to pursue a career in Human Resources, particularly in the area of diversity and inclusion. She hopes to combine her knowledge and skills surrounding individuals and groups to promote diversity and favorable work climates in corporate settings.