

SANCTIFICATION OF WORK: A POTENTIAL MODERATOR
OF THE RELATIONSHIP BETWEEN WORK STRESS AND HEALTH

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ABSTRACT

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Work stress has long been a topic of interest in both the academic world and popular culture. Work stress has been linked to a number of negative outcomes, including both mental and physical health. Religiosity, on the other hand, has been shown to increase well being. Research has shown that the sanctification of work may be linked to higher levels of positive outcomes such as job satisfaction. However, links between work stress in human services work and health outcomes, and how the sanctification of work may affect this relationship, have not been directly examined.

The purpose of the current study was to address this gap in the research. This study examined links between work stress, health outcomes, and the sanctification of work. 104 employees living in either the Northeast or the Midwest and working in the human services field completed a series of measures designed to address these constructs. It was hypothesized that work stress would be linked to poor outcomes, sanctification would be linked to positive outcomes, and that sanctification would buffer the relationship between work stress and poor outcomes.

Results were mixed in regards to confirming current hypotheses. With some exceptions, main analyses revealed that work stress was linked to poorer health outcomes and sanctification was linked to positive outcomes. Moderation analyses provided mixed support regarding the role of sanctification as a moderator. These findings are discussed along with implications, limitations, and future directions.

This dissertation is dedicated to the amazing community of human services workers who devote so much of their lives to helping others. Thank you for all that you do.

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INTRODUCTION

Work is a salient and necessary part of the lives of all people. Many people, particularly Americans, define themselves by their work. One of the first questions that often arises in conversation is “What do you do?” A response to this question that does not concern the way in which one makes a living would generally be considered inappropriate or unusual. Even in the most satisfying jobs, stress at work is nearly inevitable. In an informal search of my private email account, I unearthed these words and phrases from communications with several friends who work in fields that they truly enjoy: unappreciated, inconsistent, insane, bored, worrying, trying to get through another day, and manic. The academic world has become aware of the importance of the stress experience to the daily lives of workers, and it has burgeoned into a field rich in theory and research.

How work stress may impact our physical and psychological health has gained much attention over the years in both the academic world and popular culture. It has become so important that the Centers for Disease Control and Prevention has devoted an entire program to work stress and its potential impact on health through the National Institute for Occupational Safety and Health (NIOSH). Empirical links to cardiovascular disease, musculoskeletal disorders, workplace injury, suicide, cancer, ulcers, impaired immune functioning, and psychological disorders are detailed on the NIOSH website (NIOSH Publication No. 99-101).

Given the multitude of potentially adverse outcomes, it is important to identify and understand potential buffers to this relationship. Research between general religiosity and health has shown trends toward positive links. Several small bodies of research have attempted to examine links between some religiously related constructs, work stress, and health. However, this research fails to directly address how religiosity may moderate the relationship between

work stress and health. The proposed study will attempt to fill this gap by examining the religious construct of sanctification of work, or the process of viewing one's work as having divine character and significance. Sanctification has been shown to increase positive aspects of the human experience and, through a process that will be later described, may serve to attenuate the relationship between work stress and poor health.

The literature review will begin with a discussion of work stress and health. This discussion will provide background on definitions and theories of work stress. Specific work stressors and associated adverse outcomes will then be reviewed. A brief review of the links between religion and health will follow. Sanctification will then be introduced, along with a discussion of religiously related constructs that have been examined with work stress and adverse outcomes. This will be followed by a discussion of the importance of examining these constructs in the human services field. The literature review will be followed by a research proposal for a study that will examine the potential of sanctification to act as a unique moderator between work stress and adverse outcomes. Participants, measures, procedure, and planned analyses will then be presented.

LITERATURE REVIEW

Work Stress: Definitions

When used in the context of work, stress has been defined in three ways (Jex, 1998). The first is a *stimulus-oriented* definition. This definition purports that stress is the external stimuli in the work environment that may require the worker to respond adaptively. The second is a *response-oriented* definition. In this definition, stress refers to the reaction on the part of the person when excess demands are perceived. For example, in the first definition workload would be the stress and in the second, the worker's experience of the workload is the stress.

A third definition, and the one that will be used in this study, combines the previous two to encapsulate stress as a process. This is the *stimulus-response* definition, which includes both environmental stimuli and individual response. That is, stressors represent outside stimuli or conditions that may elicit the need for adaptive responses on the part of employees. They may include stressors such as constraints, demands, and interpersonal conflict with coworkers or clients. The second half of the definition incorporates the negative ways that employees might appraise and respond to these stressors. If the response is neutral or positive, the outcome of the stressor will not likely lead to strain. Taken together, in order for "stress" to occur, there must be both an external stressor and a negative individual response, which in turn leads to strain. Strains, or outcomes, may be psychological, physical, or behavioral, and may be acute or chronic. Psychological strains may include burnout, depression, or anxiety. Physical strains may include headaches, heart disease, fatigue, and upset stomach. Behavioral strains may include lower job performance and absenteeism. This study will focus on psychological and physical strains, which will hereon be referred to as "strains", "health", or "outcomes". I now turn to a discussion of potential models for the relationship between stressors and strains.

Work Stress: Theoretical Models

There have been several models developed to aid in the exploration of the relationship between stress and strain. This section begins with two basic models that set the stage for this research, and moves on to discuss theories specific to work stress. It should be noted that these models serve to inform, not be directly tested by, the current study. The basic relationship between stress and strain was originally outlined in Hans Selye's "fight or flight" stress model (Cranwell-Ward & Abbey, 2005; Selye, 1956). That is, when a stressful trigger is experienced and is perceived to be too demanding on available resources, acute physical outcomes such as increased heart rate and breathing, muscle tension, and inhibition of the immune system occur. This occurs in the service of preparing the body to either fight or run from the stressor, and ends in the "exhaustion phase," which has also been described as burnout. Resulting chronic physical health outcomes from an excess of acute strains may include exhaustion, increased blood pressure and cholesterol levels, skin problems, damage to the heart, and problems with the digestive, immune, respiratory, and muscular systems (Cranwell-Ward & Abbey, 2005). This model works well to better understand the stress experience of our ancestors, as it is generally more useful for examining strain as a reaction to objective, acute, environmental stressors. A mountain lion is a much more objective and acute threat than a string of snide comments from a friend or supervisor, which is more subjective and may create a more chronic, albeit similar, stress response. When stressors, and individuals' responses to them, become chronic, they are more likely to lead to adverse health outcomes, making it critical to better understand individual perceptions of stressors in the service of improving our health.

In his transactional model of stress and coping, Lazarus (1966) further emphasized individual differences and perception as a significant aspect of his model of the experience of

stress. Lazarus described stress as a process that occurs in the context of the relationship between person and environment, and is based on the person's experience of what is considered stressful in that environment (Lazarus, 1990). The emphasis is on the transaction that occurs between this trigger and the person's appraisal of it. This model fits well with the more process-oriented stimulus-response definition of stress described above, and helped to create the context for more current models of stress in the workplace.

Three main theoretical models specific to work stress have become commonly used in this field of research. The first is the Person-Environment fit (P-E) model, which purports that if personal (e.g., skills) and environmental (e.g., demands) characteristics do not align, strain is likely to occur. This is not to say that characteristics must match exactly, but if there are enough differences perceived, and these differences affect the employee in some manner, strain is more likely to be experienced. The second model that is commonly used is the Demands-Control, or decision latitude, model (Karasek, 1979). This model states that if a job is high in demands but low in individual control, strain is likely to be experienced. Ganster and Schaubroeck (1991) emphasize that strain results from the psychological response to external demands, allowing this model to incorporate individual perceptions as well.

A more recent model is the Effort-Reward Imbalance model (Siegrist, 1996). Siegrist (1996) explains that this model is based on the concept of reciprocity, or "exchange in social life" (p. 29), and that, in general, when the individual worker puts effort into a job, societal rewards are expected in return. In this model, these rewards may come in the form of money, esteem, or status control. If individuals do not believe they are receiving what they consider to be high enough levels of reward based on the effort that is exerted, strain is likely to be experienced. For example, in a study examining 10,175 French workers, Niedhammer, Tek, Starke, and

Siegrist (2004) found that perceived effort-reward imbalance was related to higher levels of self-reported poor health, which they conceptualized to encapsulate physical, mental, and social health. Additional empirical studies have found links between this imbalance and other problems with health, including cardiovascular disease (Bosma, Peter, Siegrist, & Marmot, 1998; Siegrist, Peter, Junge, Cremer, & Seidel, 1990), absence from work due to sickness (Peter & Siegrist, 1997), and poor well-being (de Jonge, Bosma, Peter, & Siegrist, 2000).

It is this model that perhaps best contributes to the theory for the current study. It is important to note that this model calls upon the concept of individual cognitive appraisal. The experience of effort and reward, while likely often based on societal norms, can be highly subjective. So what happens when workers make the appraisal that they are putting too much effort into work that they believe provides low levels of money, esteem, or status control? There are certain types of work for which these extrinsic, societal rewards are more difficult to come by. For example, many human services jobs do not pay well and may offer little in the way of esteem or status control. In these kinds of jobs, are there other rewards that may make the effort worthwhile? The work orientation construct (see Yugo, *in progress*) asserts that people who see their work as a job work primarily for money, people who see their work as a career work primarily for status and esteem, and people who see their work as a calling find intrinsic meaning through the work itself. The Effort-Reward model addresses the extrinsic rewards in terms of money for a “job” and status and esteem for a “career”, but does not include the potential for intrinsic rewards in work that is seen as a “calling”, even though it has been found that an equal number of people place their work into each of these three categories (Wrzesniewski, McCauley, Rozin, & Schwartz, 1997). Based on their research, Wrzesniewski et al. (1997) propose, “Satisfaction with life and with work may be more dependent on how an employee sees his or

her work than on income or occupational prestige” (p. 31). Might it follow that these internal resources of reward may balance the relationship between effort and reward as well as external resources are purported to, leading to lower levels of or strain?

Specific Work Stressors

Prior to examining the potential of these internal resources, it is important to understand the specific external stressors that may be involved in these processes. Constraints, demands, and interpersonal conflict are commonly studied stressors that have been connected to various strains (Jex, 1998; Nixon, Mazzola, Bauer, Krueger, & Spector 2011; Spector, Dwyer, & Jex, 1988). Constructs that have been examined in relation to work stressors and outcomes, such as positive and negative affect and perceived organizational support, will also be briefly reviewed.

Constraints

Situational work constraints are aspects of the employee’s work environment that may inhibit or limit performance (Jex, 1998; Peters & O’Conner, 1980). Constraints may include a lack of finances, time, information, training, materials or supplies, transportation, or other kinds of support (Jex, 1998). Strain may occur when employees cannot perform their work tasks due to these outside forces.

In a meta-analytic review of 79 studies, Nixon et al. (2011) found that cross sectional analyses revealed significant relationships between constraints and all negative physical health symptoms examined, including backaches, headaches, eye strain, sleep disturbance, dizziness, fatigue, problems with appetite, and gastrointestinal problems. In a study of 156 female secretaries at University of South Florida, Spector et al. (1988) collected data on work stressors from both the secretaries and their supervisors. They collected data on outcomes only from the

secretaries, with the exception of job satisfaction, for which the supervisors were asked to report how they thought each secretary would respond. It was found that secretary-reported constraints were significantly associated with higher levels of anxiety, frustration on the job, physical symptoms, doctor visits, and intent to quit. Supervisor-reported constraints were also significantly associated with higher levels of secretarial anxiety, frustration on the job, and intent to quit, but not to physical symptoms or doctor visits, although this may simply be because supervisors are less aware of their subordinates' physical symptoms and frequency of doctor visits. Secretary-reported constraints were also significantly related to lower levels of both secretary- and supervisor-reported secretarial job satisfaction, and to lower levels of supervisor-reported secretarial job performance. Supervisor-reported constraints were significantly related to lower levels of supervisor-reported secretarial satisfaction. In a sample of 120 managers in the United States, Spector, Cooper, and Aguilar-Vafaie (2002) found that job constraints were related to lower levels of job satisfaction and higher intention to quit, along with higher levels of mental strain (e.g., feeling like "life is...too much effort") and physical strain (e.g., shortness of breath, muscle trembling).

Demand

Demand, or workload, has been defined as "the amount of work an employee has to do" (Jex, 1998, p. 15). An employee's perception of demand is important to recognize, as perceived demand may be different from actual demand. An employee who has a better developed skill set for the job may perceive less demand than an employee who does not have these skills. Following this, two main types of demand, subjective (e.g., perceived workload, working hard) and objective (e.g., number of hours worked) have been examined.

In the meta-analytic study described above, Nixon et al. (2011) found that demand (or “workload”) was significantly related to all negative physical health symptoms examined, including backaches, headaches, eye strain, sleep disturbance, dizziness, fatigue, problems with appetite, and gastrointestinal problems. Significant relationships between demand and composite physical symptoms held in both cross-sectional and longitudinal analyses. In a study of 24,486 French male and female workers, Niedhammer, Chastang, and David (2008) examined work stressors and their relationships to general health. Niedhammer et al. (2008) used subjective measures of demand (e.g., working fast and hard, having enough time, having tasks interrupted). It was found that higher levels of psychological demands increased risk of poor self-reported health, long absences due to sickness, and work injuries. In the study described above, Spector et al. (1988) looked at subjective and objective reports of workload. Significant associations were found between subjective secretary-reported workload and higher levels of anxiety, frustration on the job, physical symptoms, and intent to quit. Supervisor-reported workload was significantly associated with higher levels of frustration on the job, though it was also significantly associated with higher levels of supervisor-reported secretarial performance.

Regarding objective measures of workload, Nixon et al. (2011) found that number of hours worked was significantly related to negative physical health symptoms, including eye strain, sleep disturbance, fatigue, problems with appetite, and gastrointestinal problems, in cross-sectional analyses. In the Spector et al. (1988) study, secretary- and supervisor-reported hours worked and number of people the secretaries worked for were also collected. Secretaries also reported total number of hours worked in order to include hours worked in other jobs. Secretary- and supervisor-reported hours worked at the university were not significantly related to any outcome variables. Total hours worked was significantly related to higher levels of anxiety and

intent to quit, and lower levels of both secretary- and supervisor-reported secretarial satisfaction. Secretary-reported number of people worked for was significantly related to higher levels of anxiety, frustration on the job, and intent to quit.

Interpersonal Conflict

Finally, interpersonal conflict may be with either coworkers or clients, and research has found it to be a prevalent stressor (Keenan & Newton, 1985). Conflict with coworkers may occur due to circumstances such as competition, perceptions of unfair treatment, or individual differences. Interpersonal conflict with clients may occur due to circumstances surrounding symptoms of mental or physical illness, perceptions of unfair treatment on the part of the client, or individual differences between client and employee.

In the Nixon et al. (2011) meta-analysis, it was found that interpersonal conflict was significantly related to all negative physical health symptoms examined, including backaches, headaches, eye strain, sleep disturbance, dizziness, fatigue, problems with appetite, and gastrointestinal problems. Significant relationships between interpersonal conflict and composite physical symptoms held in both cross-sectional and longitudinal analyses. Spector et al. (1988) found significant correlations between secretary- and supervisor-reported interpersonal conflict and higher levels of secretary-reported anxiety, frustration on the job, physical symptoms, and intent to quit. Additionally, secretary-reported interpersonal conflict was related to lower levels of both secretary- and supervisor-reported secretarial job satisfaction, and supervisor-reported interpersonal conflict was significantly related to lower levels of supervisor-reported job satisfaction. In a meta-analysis of workplace harassment, Bowling and Beehr (2006) examined 90 research studies. They found that workplace harassment was related to higher levels of general strain, anxiety, depression, burnout, frustration, negative emotions at work, and physical

symptoms. It was also related to lower levels of positive emotions at work, self-esteem, life and job satisfaction, and commitment to work. On the other hand, Kim and Stoner (2008) found that higher levels of social support were related to lower levels of intent to quit.

So what happens when work stressors are not, or cannot be, addressed? Might these related constructs aid in alleviating the impact of these stressors? Are there other constructs that may help to buffer these relationships? We first turn to a brief discussion on potential confounding constructs that have been examined in the context of work stress and strain. We then turn to a discussion of constructs that may have a particular impact on these variables in human services work.

Potential Confounding Constructs

A number of constructs have been studied regarding their relationship with work stress and their potential impact on health outcomes. Personality-related constructs such as positive and negative affect have been examined. Salami (2011) found that personality attributes related to positive affect, such as extraversion, predicted higher feelings of personal accomplishment at work in a sample of 340 college lecturers in Nigeria. In a study of 329 Swedish technology consultants, Hallberg, Johansson, and Schaufeli (2007) found that workers who scored high on the “irritability/impatience” subscale of a Type A personality measure tended to report lower levels of work engagement and higher levels of burnout. Ganster and Schaubroeck (1991) call for the use of negative affect as a control variable in research on work stress and adverse outcomes due to studies that have shown its potential to inflate the relationship between self-report of stressors and strain (e.g., Brief, Burke, George, Robinson, & Webster, 1988).

Attitudes towards work such as work engagement and job satisfaction have also been examined. Hallberg et al. (2007) found that lower levels of work engagement were related to

higher levels of burnout. In a study of 754 German and Norwegian physicians, Voltmer, Rosta, Siegrist, and Aasland (2012) found that physicians who reported lower levels of job satisfaction also reported higher levels of work stress. Finally, organizational constructs such as affective organizational commitment and perceived organizational support have been studied. Elangovan (2001) examined organizational commitment in a sample of 155 graduate business students, most of whom were part time students and employed when participating in the study. Links were found between lower levels of job satisfaction and lower organizational commitment, along with links between lower commitment with higher intention to quit. In a study of 359 child welfare workers, Travis and Mor Barak (2010) found that workers reported higher levels of psychological well being and were less likely to leave their jobs if they experienced organizational support.

These constructs have the ability to shed some light into the relationship between work stress and strain. However, human services work often carries with it many of the stressors outlined above, but does not often result in external societal rewards such as money or status. This leaves room for constructs that may explain how and why workers choose this type of employment. Sanctification may offer a unique pathway to cognitively reappraise the stress and effort that is so often experienced in this work and allow the worker to appreciate more intrinsic rewards. We now turn to an overview of the research between religion and health prior to introducing the specific construct of sanctification.

Religion and Health

General trends in the research indicate positive links between religion and health. In their *Handbook of Religion and Health*, Koenig, McCullough, and Larson (2001) review the vast body

of research done on the links between religion and various health outcomes. In their review, religion is defined as “an organized system of beliefs, practices, rituals, and symbols designed (a) to facilitate closeness to the sacred or transcendent (God, higher power, or ultimate truth/reality) and (b) to foster an understanding of one’s relationship and responsibility to others in living together in a community” (Koenig et al., 2001, p. 18).

Regarding mental health, positive links were reported between religion and higher levels of well being, along with specific constructs that have been shown to relate to well being. These constructs include better physical health and positive health behaviors, more engagement in activities, more intact marriages and families, higher levels of social support, feelings of meaning and purpose in life, and personality characteristics such as higher levels of optimism, hope, and internal locus of control and lower levels of hostility. Religion has also been linked to lower levels of depression and anxiety, higher levels of comfort, hope, and functioning in those experiencing schizophrenia and psychotic symptoms, lower levels of alcohol and drug use, and lower levels of delinquency in youth (Koenig et al., 2001).

In a study of 989 adults in an Australian community, it was found that personal prayer, belief in God, and church attendance were all positively correlated with positive affect (Francis & Kaldor, 2002). Pargament, Tarakeshwar, Ellison, and Wulff (2001) conducted a study on positive and negative religious coping and well being (measured by positive affect, depressive affect, and religious satisfaction) in a sample of 1,260 clergy, 823 church leaders (or “elders”), and 735 members of the Presbyterian Church. It was found that positive coping was significantly related to higher levels of positive affect and religious satisfaction. Negative coping was significantly related to lower levels of positive affect and higher levels of depressive affect. These relationships were also examined in the context of religious salience. It was found that

religious salience was related to greater levels of positive religious coping, meaning that clergy reported the most positive coping, leaders reported lower levels of positive coping, and members reported the least amount of positive coping. Furthermore, positive religious coping had greater effects on those with higher levels of religious salience. That is, positive coping was related to lower levels of depressive affect and higher religious satisfaction in clergy as opposed to church members. Using data drawn from a United States national cross-sectional sample (the 1988 General Social Survey), Ellison (1991) examined links between religion and subjective well-being. Results indicate that those with firm religious beliefs report higher levels of life quality. Ellison proposes that those who draw on religious beliefs to form an interpretive framework of the world may be able to view everyday events with increased significance and meaning. Using the language of the current study, perhaps those who look at the world through this sacred lens, or who “sanctify” the world around them, are able to enjoy a higher quality of life. Ellison reports that even measures of religiosity that have previously been found to relate to higher levels of well-being, such as religious attendance and prayer, were found to do so indirectly through the strengthening of religious beliefs and world views. That is, those who attend church and pray more regularly hold stronger beliefs, which are in turn connected to higher levels of self-perceived well-being. Finally, Ellison reports that religious faith was shown to buffer the negative effects of trauma on well-being. He suggests that “Religious symbols and values may shape 1) the appraisal of these potentially stressful life events which occur as less threatening and 2) the assessment of individual capacities to cope successfully” (p. 90).

Regarding physical health, positive trends have been found between religion and lowered risk of cardiovascular disease (specifically, coronary artery disease) and cancer, slightly lower risk of stroke, lower levels of hypertension, better immune system functioning, less pain and

other somatic symptoms, and increased longevity (Koenig et al., 2001). In a study of over 90,000 women, Schnall et al. (2010) found that increased religious service attendance was related to reduced all-cause mortality. Green and Elliot (2010) examined data from a 2006 study of over 1,000 respondents published by the General Social Survey (GSS) of The National Opinion Research Center (NORC). They found that religious identity (measured by self-report of: strength of identity as a religious person; strength of identity with one's religious affiliation; and if one carries over their religious beliefs into one's everyday life) was significantly related to self-reported happiness and health. In a study of 61 individuals with traumatic brain injury (TBI), Johnstone, Yoon, Rupright, and Reid-Arndt (2009) found that those who reported a higher sense of meaning in life and stronger religious values and beliefs reported more positive levels of general health perceptions (as measured by the Medical Outcomes Study Short Form (SF-36)). Sense of meaning was measured with items such as "the events in my life unfold according to a divine or greater plan" and "I have a sense of mission or calling in my own life" (Johnstone et al., 2009, p. 417). Stronger religious values and beliefs were measured with items such as "I believe in a higher power who watches over me" and "I feel a deep sense of responsibility for reducing pain and suffering in the world" (Johnstone et al., 2009, p. 417). Furthermore, it was found that stronger religious values and beliefs together with higher levels of forgiveness (e.g., "I have forgiven those who hurt me"; "I know that I am forgiven by a higher power," Johnstone et al., 2009, p. 414) explained 16% of the variance in general health perception (SF-36) scores above the variance explained by demographic variables. Together with the Ellison (1991) study discussed above, it appears that those who look at the world through a sacred lens tend to report more positive perceptions of their health, whether mental or physical.

Despite the empirical evidence presented above, research regarding the relationship between religion and health outcomes continues to be mixed (Koenig et al., 2001). Additionally, while not all, much of the research is correlational in nature, and therefore caution must be exercised to avoid drawing causal conclusions. At this time, it is difficult to tell exactly what it is about religious people (e.g., better health habits, social support, personality traits, perceptions of stressors, a particular outlook on or experience of the world) that results in these trends towards better health. Given the importance of health to one's overall well being, and the generally positive but mixed nature of the relationship between religion and health, there is much room for further research on links between these constructs. Given the research done by Ellison (1991) and Johnstone et al. (2009), which suggests that those who view the world through a sacred lens often report higher levels of well-being and physical health, sanctification may offer a more detailed explanation. In fact, in a study of sanctification of the body in 289 college students, Mahoney, Carels, et al. (2005) found that higher levels of sanctification of one's body were related to higher levels of health-protective behaviors and exercise. Further research into specific aspects of religion, such as the construct of sanctification, needs to be done in order to tease apart these links. We now turn to a discussion of sanctification and why it is likely to be involved in the relationship between religion and health.

Sanctification

Religion serves as a pathway to fulfill basic human strivings such as understanding the world, seeking meaning and significance, and creating structure. Perhaps the most important aspect of religion that separates it from other potential pathways is the sacred dimension of these strivings (Pargament, Magyar-Russell, & Murray-Swank, 2005; Pargament & Mahoney, 2005).

A construct that embodies this dimension, this search for the sacred, is sanctification.

Sanctification has been defined as “a process through which aspects of life are perceived as having divine character and significance” (Pargament & Mahoney, 2005; p. 183). Sanctification may be either theistic or nontheistic. Theistic sanctification involves the perception of the direct manifestation of God (Allah, Yaweh, etc.) in the sacred. Aspects of life may be seen as imbued with God’s presence, as a reflection of God’s will or handiwork, or as creating a sense of connection with God. Nontheistic sanctification involves language that is not directly tied to a divine being. Aspects of life may be seen as sacred, holy, a miracle, a deeply spiritual experience, or as creating a connection to something greater than oneself.

Pargament and Mahoney (2005) propose, “...sanctification has several implications for human functioning: (a) people invest a great deal of time and energy in sacred matters; (b) people go to great lengths to preserve and protect whatever they perceive to be sacred; (c) sacred aspects of life are likely to elicit spiritual emotions of attraction (e.g., love, adoration, gratitude) and trepidation (e.g., awe, fear, humility); (d) the sacred represents a powerful personal and social resource that people can tap throughout their lives; and (e) the loss of the sacred can have devastating effects.” (p. 180). Pargament and Mahoney go on to state that “Several classes of objects can be viewed, represented, or experienced as sacred: material objects (crucifix, drugs), time and space (the Sabbath, churches), events and transitions (Bar Mitzvah, suffering, death), cultural products (music, literature), people (saints, cult leaders), psychological attributes (the self, meaning), social attributes (caste, patriotism), and roles (marriage, parenting, work)” (p. 181).

In a study of 150 adults from a community sample, Mahoney, Pargament, et al. (2005) examined participants’ strivings in life. “Strivings” were defined using Emmons’ (1986)

definition of personal strivings as “the characteristic types of goals that individuals try to achieve through their everyday behavior” (p. 1058). In a literature review on religion, goals, and well being, Emmons, Cheung, and Tehrani (1998) reported that those who experienced spiritual strivings (e.g., self-transcendence) viewed them to be more important, less difficult to sustain, and pursued for more intrinsic reasons than non-spiritual strivings. Mahoney, Pargament, et al. wanted to examine if even “non-spiritual” strivings could become spiritual through the process of sanctification, allowing people who engage in this process to experience the same benefits from so-called non-spiritual strivings as they did from more overtly spiritual strivings. It was found that most of the adults in their sample did sanctify their top ten strivings in life, whether they were overtly spiritual (e.g., religion/spiritual) or not (e.g., physical health). These strivings included several variables related to work, such as career achievement, career relationships, and financial strivings. Higher levels of sanctification were related to a higher sense of life purpose and meaning, along with greater importance of, commitment to, confidence in, social support for, longevity of, and internal locus of control over their strivings.

These effects of sanctification on human functioning and behavior have been empirically supported across several domains thus far (e.g., see Mahoney, Carels, et al., 2005 for sanctification of the body; Mahoney, Pargament et al., 2005 for sanctification of strivings; Mahoney et al., 1999 for sanctification of marriage; Murray-Swank, Pargament, & Mahoney, 2005 for sanctification of sex; and Walker, Jones, Wuensch, Aziz, & Cope, 2008 for sanctification of work). Given this evidence, it would follow that people who do sanctify their work would likely invest a good deal of time and energy in, go to great lengths to preserve and protect, and feel spiritual emotions related to their work. Furthermore, work that is sanctified may actually serve as a personal and social resource, rather than a source of stress or strain. If

work is sanctified, and these forces are present, it may be that people are more likely to appraise stressors in a more positive manner, as suggested by Ellison (1991) in the study described above. They may view stressors as a challenge rather than a threat, or as a necessary part of work that is ultimately going to lead to internal rewards, be a source of meaning and fulfillment, or contribute to the greater good. This type of response would then likely result in lowered levels of adverse outcomes. Furthermore, given the research on sanctified strivings, it is possible that feelings associated with these strivings may serve to balance out the work stressors described above. For example, increased locus of control over sanctified strivings may balance out feelings of lack of control or autonomy in the workplace. Increased confidence related to strivings may balance out high levels of demand. Higher levels of commitment to and longevity of strivings may balance out frustration with constraints and issues related to role conflict and ambiguity. And increased social support may balance out problems related to interpersonal conflict.

Although many positive outcomes have been connected to sanctification, a discussion of this construct would not be complete without acknowledging its potential darker side. In his chapter reviewing religion and spirituality in the workplace, Carroll (2013) emphasizes the importance of studying both the potential positive and negative effects of viewing work through a sacred lens due to both theory and previous research. Included in sanctification theory is the idea that those who sanctify an aspect of life may be more vulnerable when this aspect of life is lost or violated in some way. This may be experienced as a sacred loss or a desecration, which has been defined as *“a perceived violation of a sanctified aspect of life”* (Mahoney, Rye, & Pargament, 2005, p. 59). A loss or violation of the sacred has been linked to increased levels of both adverse mental (Magyar, 2001; Pargament, Magyar, Benore, & Mahoney, 2005) and physical (Magyar, 2001) health outcomes. In a study of 117 adults, Pargament, Magyar, et al.

(2005) found those who experienced a loss or violation of the sacred also experienced increased levels of emotional distress, including intrusive thoughts, avoidant behaviors, anxiety, and depression. Desecration was also related to higher levels of anger. While this study did not find links to physical health, Magyar (2001) conducted a cross-sectional study on desecration within romantic relationships with 360 college students in a Midwestern university. Magyar found links between desecration and both mental and physical health outcomes, including negative affect, intrusive thoughts, avoidant thoughts and behaviors, and adverse physical health outcomes. Desecration has yet to be studied in the context of work, though it would follow theoretically that a desecration experienced at work may be related to increased work stress and decreased levels of well being.

Sanctification and Work Stress

The sanctification of work has been examined empirically in only one published study and one dissertation thus far. Historically, however, the sanctification of work is not a new idea. The Bible reads, “God has given each of us the ability to do certain things well. So if God has given you the ability to prophesy, speak out when you have faith that God is speaking through you. If your gift is that of serving others, serve them well. If you are a teacher, do a good job of teaching...Never be lazy in your work, but serve the Lord enthusiastically” (Romans 12:6-11). Discussing the fifth “fold” of the Buddhist Noble Eightfold Path, Thich Nhat Hanh writes: “To practice Right Livelihood (*samyag ajiva*), you have to find a way to earn your living without transgressing your ideals of love and compassion. The way you support yourself can be an expression of your deepest self, or it can be a source of suffering for you and others...Our vocation can nourish our understanding and compassion, or erode them. We should be awake to

the consequences, far and near, of the way we earn our living." (Thich Nhat Hanh, 1998, p. 113). The idea of invoking God through one's work truly spans cultures and centuries.

Stemming from this integration of religion and work, and responding to the rise of capitalism, the concept of the *Protestant Work Ethic* (PWE) was introduced by Max Weber in his 1905 essay *The Protestant Ethic and the Spirit of Capitalism* (Weber, trans. 1958). Since then, it has elicited research and debate across a variety of disciplines, including aspects of life both in and out of the workplace. Certain aspects of PWE sound similar in nature to sanctification. PWE has been described to have four basic elements (Furnham, 1984): The Doctrine of Calling, The Doctrine of Predestination, strong asceticism, and the Doctrine of Sanctification. The Doctrine of Calling relates to workers being called to their work by God, making it necessary that the work itself was done for His glory in a virtuous and honest manner. The Doctrine of Predestination explained that God's grace could be seen on Earth through a successful occupation. If people were successful in their occupations, they could view themselves as among the elite. Therefore, all possible time and energy must be put into career advancement rather than leisure. The theme of strong asceticism suggested that people must save and invest rather than indulge in luxuries. The Doctrine of Sanctification stressed the importance of rational action and explained that all people must make their own moral decisions and accept the ethical consequences (Furnham, 1984). Of these four elements, the Doctrine of Calling actually offers a more similar conceptualization to sanctification than the Doctrine of Sanctification.

Some empirical studies have found links between PWE and positive outcomes, though others have found mixed results. In a study of 448 officers in the United States Air Force, Blood (1969) found that the more a worker agreed with PWE values, the more satisfied they were with work and with life in general. In a study of 115 blue collar workers in the Netherlands,

Gorgievski-Duijvesteijn, Steensma, and te Brake (1998) examined PWE as a moderator between adverse work conditions and mental and physical well being. It was found that those high in PWE reported being more satisfied with their jobs. However, they did not report significantly fewer health complaints once other variables such as age and physical working conditions were taken into account.

Given the similarity between the idea of PWE “calling” and sanctification, we now turn to the construct of calling itself. Wrzesniewski et al. (1997) explain that seeing work as a *job* consists of work as a means to gain material resources to enjoy other things in life, rather than enjoying the work itself. They state that viewing work as a *career* suggests a deeper personal investment in advancing through work not only for financial gain but also for increases in areas such as power, self-esteem, and social standing. They state that viewing work as a *calling* means that work is inseparable from life; seeing work as a calling leads one to work not for financial or occupational gain, but for self-fulfillment and the greater good.

The construct of calling has been defined as arising “from some force outside the person and is thought to pertain to careers that an individual sees as meaningful and that promote the greater good in some way” (Duffy & Sedlacek, 2007, p. 591-2). According to the research, this force may be either directly connected to God or to other external forces such as the greater social good (Wrzesniewski et al., 1997). Wrzesniewski et al. (1997) conducted a study to examine the prevalence of people identifying their work as a job, a career, or a calling, and to see if these identifications were associated with work and life satisfaction. This study included a population of 196 workers from a major state university health service and a small liberal arts college. Respondents represented a range of occupations, including physicians, nurses, librarians, supervisors, computer programmers, medical technicians, and clerical employees. It was found

that an equal number of people categorized their work into job, career, or calling. Furthermore, those who saw their work as a calling reported higher levels of satisfaction with work and with life in general. In a study of 179 nurses working at hospitals in Helsinki, Finland, Raatikainen (1997) found that nurses who viewed their work as a calling engaged in behaviors that suggested a higher commitment to and investment in their work.

Work motivation, which can be viewed as what drives one to commit to and invest in work, is a construct that has been a subject of myriad work-related research. Though this has been researched mainly as a secular construct, aspects of it, particularly intrinsic motivation, correspond with some features of sanctification. Amabile, Hill, Hennessey, and Tighe (1994) assert that extrinsic motivation tends to orient people towards “money, recognition, competition, and the dictates of other people” (p. 951), while intrinsic motivation is characterized more by “challenge, enjoyment, personal enrichment, interest, and self-determination” (p. 951). Amabile et al. (1994) suggest that intrinsic motivation is driven by a desire to “engage in work...because the work itself is interesting, engaging, or in some way satisfying” (p. 950). Tremblay, Blanchard, Taylor, Pelletier, and Velleneuve (2009) surveyed 260 members of the Regular Force military of Canada. It was found that higher levels of intrinsic motivation were linked to higher levels of job satisfaction and organizational commitment and lower levels of turnover, whereas external regulation (a construct similar to external motivation) was not significantly related to any of these constructs. In a study of 408 employees, Saleh and Hyde (1969) found that those who reported higher levels of intrinsic motivation for work also reported higher levels of job satisfaction than those who reported higher levels of extrinsic motivation, even when their reported salaries were lower than those with extrinsic motivation. Byrd, Hageman, and Belle Isle (2007) looked at both intrinsic work motivation and intrinsic religiousness in a sample of 161

college students. Both were linked to higher levels of satisfaction with and purpose in life. Intrinsic work motivation was also linked to lower levels of negative affect. However, intrinsic work motivation and intrinsic religiousness were not significantly linked to each other, suggesting that each may act as its own independent construct. This is in opposition to theories that intrinsic religiousness is simply a reflection of a broader state of intrinsic motivation (e.g., Hunt & King, 1971). We therefore move to examine research conducted on religion and work along with the more specific construct of sanctification, which is directly tied to religiousness and spirituality.

There have been some studies conducted on links between religiosity and work-related outcomes. In a study of 317 employees working in an assisted living setting, Sikorska-Simmons (2005) found that religiosity significantly correlated with organizational commitment, though this significance did not hold up in regression analyses. Dlugos and Friedlander (2001) interviewed and surveyed twelve psychologists who had been peer-nominated due to their “passionate” commitment to their work. One of the common themes found in this study of passionately committed workers was a strong sense of spirituality in relation to their work. Mittal, Rosen, and Leana (2009) conducted focus groups with 47 health care workers (e.g., CNAs) to examine retention and turnover. It was found that one of the main factors promoting retention (staying three years or longer in one job) was an active faith life (e.g., strong faith, prayer). As many of these studies are either qualitative or produce small, though significant, correlations, it will be important to expand the research in this field to include more quantitative studies that examine religious constructs in more detail.

Moving on to the sanctification of work specifically, Walker et al. (2008) collected data on 103 full-time employees who had been in their current position for at least 6 months.

Occupations varied, but the main groups (defined as consisting of greater than 10% of participants) worked in “management,” “education, training, and library,” “office and administrative support,” “business and financial operations,” and “sales and related” (Walker et al., 2008, p. 137). Data were collected through online surveys that measured sanctification of work, general religiosity, affective commitment [to work], job satisfaction, and intent to leave [the job]. Sanctification of work was related to higher levels of affective commitment and job satisfaction and lower levels of intent to leave. In hierarchical regression analyses, at least one sanctification of work subscale accounted for 14% of the variance in job satisfaction, 16% of affective commitment, and 7% of intent to leave.¹ All analyses controlled for demographics and general religiosity, indicating that sanctification of work contributed to this variance above and beyond that explained by these potentially confounding factors.

Carroll (2008) also examined the sanctification of work in a study of 827 employees (faculty, administration, support staff, and maintenance staff) from 65 Catholic secondary and middle schools across the United States. Data on demographics, sanctification of work, spirituality, religiosity, personality traits, psychological safety, job satisfaction, turnover intention, organizational commitment, and psychological distress were collected through 20-30 minute online or paper surveys. Carroll found that higher levels of sanctification of work were significantly related to increased job satisfaction and organizational commitment and decreased turnover intent, even after controlling for personality traits. Furthermore, the sanctification of work was the largest predictor of variance in job satisfaction, compared to the other two outcomes measures of organizational commitment and turnover intention. Of note, this study was conducted only with those working in religiously affiliated institutions, and it would likely be

¹ The manifestation of God subscale of the sanctification measure did not significantly contribute to the variance found in intent to leave.

beneficial to examine these constructs in a sample that is more generalizable to the general population.

While the results from this research point to potential links between sanctification and lower levels of adverse outcomes, sanctification was not explicitly examined as a potential stress moderator in either study. Additionally, health outcomes were not studied, though links have been found between sanctification and physical health factors (Mahoney, Carels, et al., 2005). Examining these constructs in future research is vital to gaining a more comprehensive understanding of the full work experience.

Stress and Sanctification in Human Services Work

Prior to the introduction of the current study, it is important to address the unique attributes of the population included in this study. Many people enter jobs in human services not for external rewards such as money or status, but due to a passion for helping people. In fact, Davidson and Caddell (1994) found that those who worked more directly with people were two times as likely to see their work as a calling. At the same time, this population may deserve particular attention due to the potentially increased risk of imbalance between effort and reward. Employees attempt to accommodate significant patient needs within a system filled with seemingly constantly increasing financial constraints. This combination of high levels of need along with a lack of resources to fill these needs often leads to increased demands and long work hours for the individual employee. Roles can easily become blurred, autonomy stripped, and interpersonal conflict heightened in those who refuse (or are unable) to leave the office just because the time is 5pm. These employees often find themselves putting high levels of effort into work that does not provide high levels of income, esteem, or status in return. Furthermore, these

employees are often required to do emotional work (e.g., emotional suppression, provision of empathy), which has been shown to provide a unique contribution to levels of burnout (Maslach, Schaufeli, & Leiter, 2001; Zapf, Seifert, Schmutte, Mertini, & Holz, 2001).

It has been shown that employees who hold human services jobs and have frequent contact with clients may be particularly prone to adverse outcomes stemming from work stress. In a study of 1,008 mental health care workers in the Netherlands, van Daalen, Willemson, Sanders, and van Veldhoven (2009) examined those who were high in direct patient interaction versus those who had low levels of direct contact. Those high in direct patient contact reported higher levels of emotional demands, lower levels of autonomy, and more emotional exhaustion and mental health problems such as depression, anxiety, distress, and somatization. However, Mutkins, Brown, and Thorsteinson (2011) found support staff in an agency serving clients with “intellectual disabilities” experienced slightly lower to similar levels of burnout when compared to norms for other human services employees, suggesting that those who have some, albeit less, direct patient contact may also experience adverse effects.

Burnout is one of the most studied adverse outcomes in human services research - the research on this construct was in fact originated to examine the effects of chronic stressors in human service occupations (Maslach, Schaufeli, & Leiter, 2001). Though the research has since expanded to include other kinds of work, it has been suggested that it continues to be particularly prominent in human services work, especially given the demand for emotional work mentioned above (Maslach et al., 2001; Zapf et al., 2001). Burnout has been conceptualized as a reaction to chronic occupational stress (Le Blanc, Bakker, Peeters, van Heesch, & Schaufeli, 2001; Maslach et al., 2001), and includes increased emotional exhaustion, depersonalization (characterized by cynicism and detachment), and feelings of inefficacy, or decreased feelings of personal

accomplishment (Maslach et al., 2001). In a study of 211 human services practitioners (either working in child protection or as in-home caregivers) in Spain, it was found that 19.4% of them showed high levels of emotional exhaustion, 22.7% showed high levels of depersonalization, and 43.6% showed low levels of personal accomplishment. Combining these three elements, 20.4% of participants were at risk for or already showing burnout (Jenaro, Flores, & Arias 2007). In a study of 204 nurses in Germany, Bakker, Killmer, Siegrist, and Schaeferli (2000) found that nurses experiencing high levels of effort and low levels of reward were indeed more likely to score high on the emotional exhaustion and depersonalization aspects of burnout. In their study of 346 Californian social workers, Kim and Stoner (2008) found that those with high levels of role stress, particularly when combined with lower levels of job autonomy, were more likely to experience burnout. In their review of burnout research, Maslach et al. (2001) report that burnout has in fact been connected to many work stressors including increased demands, interpersonal issues, constraints, and lack of control.

These findings reflect an entire body of research that emphasizes the imperativeness of examining constructs that may ultimately result in lower levels of adverse outcomes. Those who sanctify their work may hold a resource that allows them to reappraise stressors and draw on internal rewards for their work even when external rewards are low. Sanctified work may elicit strong feelings of meaning and purpose and may be viewed as something worthy of investment, protection, and preservation, even in the face of stress. Perhaps those who sanctify their work tend to respond to work stress in a more adaptive manner than those who do not, due to their ability to reframe these stressors and draw on internal rewards to help them regain balance between effort and reward.

Conclusions

In this literature review, work stress and religion have been examined, along with their potential links to health outcomes. It has been shown that when people experience work stress, poor health outcomes occur, while research on religiosity points towards more positive health outcomes. However, the nature of these links is unclear. It is here asserted that studying more specific aspects of the religious experience, such as sanctification, may serve to clarify these links. The process of sanctification has been shown to elicit greater investment in and protection of sanctified aspects of life. Theoretically, it would follow that this particular kind of perception – of work as sacred and worthy of investment and protection – may well act as a buffer between perceived work stress and strain, particularly due to the potential for increased perception of internal rewards. The links between sanctification of work and outcomes have been examined in one published article (Walker et al., 2008) and one dissertation (Carroll, 2008). Both studies found those who sanctified their work were less likely to have intentions to leave and more likely to be satisfied with and committed to their work and organization. However, these studies did not examine sanctification of work as a moderator or as it relates to health outcomes. This research is particularly salient in human services work, given the potentially high levels of stressors and low levels of external reward. It is here argued that sanctification may serve to attenuate the effects of the stressors on strain, given the potential for the intrinsic rewards elicited through sanctification to balance out increased efforts demanded by stressors.

METHOD

The Current Study

This study seeks to address gaps in the literature by examining sanctification as a stress moderator as it relates to health outcomes, specifically physical health, burnout, anxiety, and depression, in human services work. Hypotheses are as follows:

- 1) Sanctification will be linked to better physical health and lower levels of burnout, anxiety, and depression.
- 2) Higher levels of perceived work stress (constraints, demands, interpersonal conflict with coworkers and clients) will be linked to poorer physical health and greater burnout, anxiety, and depression.
- 3) Links between perceived work stress (constraints, demands, interpersonal conflict with coworkers and clients) and poorer health, and between perceived work stress and higher burnout, depression, and anxiety, will lessen as sanctification of work increases.

Participants

Nineteen agencies were contacted regarding possible participation. Seven of these agencies participated in the project. One agency in Ohio and two in Connecticut serve children, adults, and families with a wide variety of psychological needs. One Ohio agency serves a population of developmentally delayed adults and their families. One agency in Connecticut serves children and adults who have experienced significant trauma. One agency in Maine is a private practice serving adults and children with a variety of presenting problems. One hospital in Wisconsin serves a population of children with various medical and mental health problems.

Of approximately 250 employees across these agencies, 123 began surveys and 104 completed them, resulting in a 42% response rate.

Measures

Demographics were collected as potential control variables and included name of agency, gender, age, ethnicity, education, job tenure, income, and religious affiliation. Religiousness and spirituality were also measured as potential control variables. Four items were used to assess this: external religiousness (“How often do you attend religious services?”), internal religiousness (“How often do you pray privately in places other than church or synagogue or temple?”), general religiousness (“To what extent do you consider yourself to be a religious person?”) and spirituality (“To what extent to you consider yourself to be a spiritual person?”). These items are widely used in psychology of religion research (Mahoney et al., 1999). In a study conducted using these items within married couples, the alpha coefficient for these 4 items was .85 for wives and .78 for husbands (Mahoney et al. 1999). See Appendix A.

Specific work stressors were measured using a variety of scales. The first three were developed by Spector and Jex (1998). Items on all three scales are answered on a Likert scale ranging from 1 (“less than once per month or never”) to 5 (“several times per day”). *Constraints* were measured using the Organizational Constraints Scale (OCS; $\alpha = .85$). This is an 11-item scale assessing job constraints such as “poor equipment or supplies,” “other employees,” “inadequate training,” and “conflicting job demands.” *Demands*, or workload, was measured using the Quantitative Workload Inventory (QWI; $\alpha = .82$), which is a five-item scale including questions such as “How often does your job require you to work very fast?,” “How often does your job leave you with little time to get things done?,” and “How often do you have to do more

work than you can do well?” Number of hours worked was also collected to gain an objective measure of demand. *Interpersonal conflict with coworkers* was measured using the Interpersonal Conflict at Work Scale (ICAWS; $\alpha = .74$). This is a four-item measure assessing interpersonal difficulties with people encountered at work, and includes items such as “How often do you get into arguments with others at work?” and “How often are people rude to you at work?” A 15-item subscale from a second measure, the Workplace Incivility Scale (Burnfield, Clark, Devendorf, & Jex, 2004) was used to examine *interpersonal conflict with clients*. Participants were asked to rate items such as “Clients take their anger out on employees” and “Clients show that they are irritated or impatient” on a 5-point scale (“strongly disagree” to “strongly agree”). See Appendix G.

Sanctification of Work was measured using the sanctification scale developed by Mahoney et al. (1999) and modified for work by Walker et al. (2008). This scale contains two subscales. The Manifestation of God Subscale contains twelve items designed to measure theistic sanctification and contains items such as include “God is present in my work” and “My actions surrounding my job follow the teachings of my church.” This subscale has been found to have an alpha of .97 (Walker et al., 2008). The Sacred Qualities Subscale contains ten items designed to measure nontheistic sanctification. Participants are asked to “Please indicate the degree to which each adjective describes your job,” and adjectives include “Holy,” “Blessed,” and “Spiritual.” This subscale has been found to have an alpha of .95 (Walker et al., 2008). All items were answered using a Likert scale that ranges from 1 (“strongly disagree”) to 7 (“strongly agree”). See Appendix K.

Health Outcomes was measured using the Physical Symptoms Inventory developed by Spector and Jex (1997). This is an 18-item scale that asks “During the past 30 days did you have

any of the following symptoms? If you did have the symptom, did you see a doctor about it?"

Examples of included symptoms are "An upset stomach or nausea," "trouble sleeping," "headache," "fever," and "dizziness." Possible responses were collected on a Likert scale of "No (1)," "Yes, but I didn't see a doctor (2)," and "Yes, and I saw a doctor (3)." Given that higher scores indicate more and likely worse symptoms, scores were added together and the mean score was used in analyses. Following this survey is the question "How many days have you been absent from work in the past 6 months due to your physical or mental health?" with a line on which to fill out the number of days. Spector and Jex (1998) contend that this scale is a casual indicator scale rather than an effect indicator scale. That is, each item is not intended to parallel each other, but to combine to create a construct. That is, having a headache and an upset stomach are not meant to be equivalent, but do combine to create the construct of physical health. Due to this, Spector and Jex (1998) assert that internal consistency reliability is inapplicable to this scale. See Appendix L.

Burnout was measured using the Oldenburg Burnout Inventory. This is a 16-item scale containing items such as "I feel more and more engaged in my work," "There are days when I feel tired before I arrive at work" (reverse scored), and "Over time, one can become disconnected from this type of work" (reverse scored). Items are answered on a 4-point Likert scale ranging from "Strongly Agree" to "Strongly Disagree." Given that the Likert scale anchors connect higher numbers with more disagreement, negatively worded items (items more indicative of burnout) were reverse scored so that higher scores equal higher levels of burnout. This was done in order to provide consistency in the interpretation of health outcome scores. Demerouti, Mostert, and Bakker (2010) reported an alpha of .74 for the exhaustion subscale and .79 for the disengagement subscale. See Appendix M.

Depression was measured using the Center for Epidemiological Studies – Depression Scale (CES-D; Radloff, 1977). This is a 20-item measure directing participants to respond to statements as they apply over the past week, such as “I felt bothered by things that usually don’t bother me”, “I was happy”, and “I could not ‘get going’”. Responses range from “Rarely or none of the time (less than 1 day)” to “Most or all of the time (5-7 days).” Positively worded items were reverse scored so that higher scores equal higher levels of depression. Radloff (1977) reported alphas of .85 in a general population and .90 in a patient population. See Appendix N.

Anxiety was measured using the Generalized Anxiety Disorder 7-item Scale (GAD-7). This is a 7-item scale with items such as “feeling nervous, anxious, or on edge”, “trouble relaxing”, and “feeling afraid as if something awful might happen”, which are responded to on a Likert scale of 0 (not at all) to 3 (nearly every day). This measure has been reported to have an alpha of .92 (Spitzer, Kroenke, Williams, & Lowe, 2006). See Appendix O.

Negative Affectivity was collected as a potential control variable using the Positive and Negative Affect Schedule (PANAS; Watson, Clark, & Tellegen, 1988), which is a 20-item measure asking participants to rate various feelings and emotions (e.g., “hostile”, “excited”, “irritable”), according to how they generally feel, on a Likert scale of 1 (“very slightly or not at all”) to 5 (“extremely”). This scale has been found to be reliable and valid, including scores on test-retest reliability of .68 on the PA (positive affectivity) scale and .71 on the NA (negative affectivity) scale, and alphas of .88 for PA and .87 for NA (Watson et al., 1988). See Appendix B.

Perceived Organizational Support was measured as another potential control variable. This is a 16-item scale that was shortened by Eisenberger, Huntington, Hutchison, and Sowa (1986) from the original 36-item scale based on factor loadings. This scale contains items such as

“The organization values my contributions to its well-being,” “The organization cares about my general satisfaction at work,” and “The organization shows very little concern for me” (reverse scored). Items are answered on a 7-point scale ranging from “Strongly disagree” to “Strongly agree.” Eisenberger et al. (1986) reported an alpha of .93 for the 16-item scale. See Appendix E.

Job Satisfaction was measured as another potential control variable. This scale contains 5 items such as “I feel fairly well satisfied with my present job,” “I find real enjoyment in my work,” and “I consider my job rather unpleasant.” Items were answered on a Likert scale of 1 (Strongly agree) to 7 (Strongly disagree), so positively worded items were reverse scored so that higher scores indicate higher levels of job satisfaction. Judge, Locke, Durham, and Kluger (1998) reported a reliability score of .88 for this scale. See Appendix F.

Desecration was measured using a 4-item scale that was adapted by the author from the scale developed by Pargament, Magyar, et al. (2005). Although it is not hypothesized that desecration will be linked to work stress in the current study, the two constructs have yet to be studied in connection with each other, and desecration will therefore be included in order to examine potential links. The scale includes items such as “This event was an immoral act against something I value” and “Something sacred that came from God was dishonored.” Participants are instructed to “Please identify one or more stressors you have experienced at work, and answer the following items accordingly, as they relate to your work. If you have not experienced any of the above-described stressors, or feel these questions do not apply to you, you may mark “N/A””. Items are answered on a 5-point Likert scale ranging from “Strongly disagree” to “Strongly agree.” While this four item scale has not been used as of yet, the full-item scale has been reported to have an alpha of .92 (Pargament, Magyar, et al., 2005). See Appendix I.

Procedure

Participants were recruited from human services agencies across the country. Nineteen agencies were contacted regarding participation. Of these, three Midwest and four Northeast agencies agreed to participate. Flyers, emails, and announcements in the workplace were used for recruitment. Surveys were given in an online format using the Qualtrics website. Informed consent was reviewed at the beginning of the online session and participants were allowed to quit the session at any time. Surveys generally took about 20-30 minutes to complete. Participants were provided contact information to address any questions or concerns. Confidentiality was ensured through randomly assigned participant numbers and anonymity was assured. Upon completion of the surveys, participants who chose to provide contact information (in a separate format that was not connected with the survey itself) were entered into a drawing for four \$50 incentives. A “thank you” pizza luncheon was offered to all participating agencies.

RESULTS

Descriptive Statistics and Preliminary Analyses

Data was analyzed using SPSS (IBM SPSS Statistics, Version 20). As presented in Table 1, of the 104 participants, 83.7% were female and ages fell between 21 and 69 years of age, with the majority (56.7%) falling between 21 and 39 years. 3.8% identified as Hispanic or Latino and the majority of the sample identified as White and/or Euro-American (82.7%). Of the remaining participants, 8.7% identified as Black and/or African American, 4.5% identified as two or more ethnicities, 1% identified as Asian American, 1% identified as Native Hawaiian/other Pacific Islander, 1% identified as Mexican American, and 1% did not report. The majority (63.5%) of participants reported having earned a graduate or professional degree, with the rest falling between high school and college graduation, and the majority of participants (58.7%) reporting an annual household income between \$25,000 and \$75,000. Regarding reports of religiosity, the majority of participants identified as Christian (60.6%), with the second largest group reporting no affiliation (13.5%). Other religious affiliations reported were: Jewish (6.7%), Baptist (1.9%), Buddhist (1.9%), Pagan (1.9%), Jehovah's Witness (1%), Spiritual (1%), and Traditional African Religion (1;1%). 7.7% participants identified as agnostic and 1.9% identified as atheist. The reported religiosity of the current sample is lower than that of reported national averages. In recent Gallup polls (2012), 42% of those surveyed reported attending religious services about once a week or more, as opposed to 19.2% of the current sample. According to the religiosity index of the Gallup poll (December 4, 2012), 40% of Americans are "very" religious, as opposed to 9.6% of the current sample. Bar graphs were created in order to analyze potential differences between means of main variables across groups (e.g., gender, age, income). No significant differences were found.

As presented in Table 2, preliminary analyses were run in order to determine internal consistency reliability for all measures. Reliability was found to be adequate for all measures ($\alpha = .60-.97$), with all but one falling between .81 and .97. The internal consistency reliability of the conflict with coworkers scale was .60, though this scale was only four items long and therefore internal reliability may be more difficult to achieve; when combined with the conflict with clients scale, the alpha score was 0.90. Additionally, ranges, means, and standard deviations were calculated and histograms were created in order to aid in visually assessing normality. Though anxiety, depression, physical health problems, work stress constraints, and conflict with coworkers variables were slightly positively skewed, no significant problems with range restriction or normality were found. Analyses were run in order to examine potential mean differences in data between geographic locations (Northeast and Midwest) and no significant differences were found.

Regarding religiosity, analyses were used to explore whether or not the four main religiosity items (frequency of church attendance and prayer, religiousness, and spirituality) should be analyzed separately or as one construct. Given that two of the four items had a Likert scale of 1-8 and two had a scale of 1-5, scales were normed using z-scores. Reliability was determined using Chronbach's alpha and the four items were determined to have good reliability ($\alpha = 0.83$). A Principal Components factor analyses was run and all four items fell onto only one component. It was therefore determined that these four items would be analyzed together as one construct.

Regarding the sanctification of work scale, the two subscales, Manifestation of God (MOG) and Sacred Qualities (SQ) were significantly correlated ($r = .55$; $p < .01$). As presented in Table 3, a Principal Components factor analysis was done in order to determine if the two

subscales should be used together as one measure of sanctification or as separate scales in further analyses. Based on the eigenvalue greater than one criterion, four components were extracted. All Manifestation of God items fell onto component 1. The Sacred Qualities items loaded on the three remaining components, with a few items cross-loading on two or more components. This analysis therefore indicated that the Manifestation of God and Sacred qualities scales should be used separately in the analyses.

As presented in Table 4, correlations between main variables and potential control variables were calculated in order to help determine if any of these demographics would be controlled for in further analyses. Negative affect, job satisfaction, organizational support, and desecration were significantly correlated with over half of independent and dependent variables, and were utilized as needed in subsequent analyses. Of note, neither desecration nor calling was significantly related to either sanctification variable, and social support was not significantly related to any independent or dependent variables. Religiosity was correlated only with the two sanctification scales. Burnout and depression were significantly related to all control variables in patterns that align with above-proposed theory, and work constraints was significantly correlated with all control variables except positive affect.

Main Effects Analyses

As presented in Table 4, bivariate correlations were run to test the hypothesis that sanctification of work would be linked to positive health outcomes. Neither sanctification scale was significantly related to physical health or anxiety. The Sacred Qualities (SQ) Scale was related to lower levels of burnout ($r = -.39$; $p < .01$) and depression ($r = -.24$; $p < .05$), and the Manifestation of God (MOG) scale was related to less burnout ($r = -.22$; $p < .05$) but not

significantly related to depression. Though significant correlations do correspond with trends in previously reported research, the fact that links were not found between sanctification and other variables, particularly physical health, is not in line with previous research, which links religiosity with higher levels of physical and mental health (e.g., Pargament et al., 2001; Ellison, 1991; Green & Elliot, 2010; Schnall et al., 2010).

As presented in Tables 5a-5d, main effects were also tested using linear regression analyses. Controls (negative affect, job satisfaction, perceived organizational support, and desecration) were added in Step 1, followed by independent variables in Step 2. No significant links were found between sanctification SQ and physical health or between either sanctification scale and burnout, anxiety, or depression. Higher sanctification MOG was linked to worse physical health ($\beta = .22, p < .05$). The links found between sanctification and worse physical health are not consistent with previous research or the current hypothesis. This will be further explored in the discussion section below.

Also presented in Table 4, bivariate correlations were run to test the hypothesis that work stress would be related to poor health outcomes. For all relationships, positive correlations indicate worse outcomes. All four work stressors were related to depression, three were related to burnout, two were related to anxiety, and one was related to physical health. Work constraints was correlated significantly with all health outcomes: physical health ($r = .35; p < .01$); burnout ($r = .52, p < .01$); anxiety ($r = .31; p < .01$); and depression ($r = .42; p < .01$). Work demands was not significantly correlated with physical health but was correlated significantly with burnout ($r = .41; p < .01$), anxiety ($r = .26; p < .01$), and depression ($r = .35; p < .01$). Conflict with coworkers was significantly related only to greater depression ($r = .25; p < .05$) but not significantly related to physical health, burnout, or anxiety. Conflict with clients was

significantly related to greater burnout ($r = .29$; $p < .01$) and depression ($r = .23$; $p < .05$) but not significantly related to physical health or anxiety. Significant results are consistent with links reported in previous research, in that work stress is linked to lower levels of well being (e.g., Bowling & Beehr, 2006; Niedhammer et al., 2008; Nixon et al., 2011).

As presented in Tables 5e-5h, main effects were also tested using linear regression analyses. Controls (negative affect, job satisfaction, perceived organizational support, and desecration) were added in Step 1, followed by independent variables in Step 2. No significant links were found between constraints or conflict with clients and any of the four health outcomes (physical health, burnout, anxiety, and depression). No significant links were found between demands and physical health, anxiety, or depression, or between conflict with coworkers and physical health, burnout, or depression. Higher demands was linked to higher levels of burnout ($\beta = .20$, $p < .01$), which is consistent with previous research and the second hypothesis. Higher levels of conflict with coworkers was linked to less anxiety ($\beta = -.16$, $p < .05$), which is not consistent with previous research or with the second hypothesis. These relationships will be further explored in the discussion below.

Moderation Analyses

As presented in Tables 6a-6p, linear regression was used to examine interactions and determine the potential moderating effects of sanctification of work on the relationship between work stressors and health. In Step 1, controls (negative affect, job satisfaction, perceived organizational support, and desecration) were entered, in Step 2 independent variables were entered, and in Step 3 the cross-product terms were entered. Given that this study is the first of its kind to explore relationships between main variables (work stressors, sanctification, and

adverse outcomes) through moderation analyses, the rationale presented for the controls used was based only on theory and research in areas related to these constructs. Therefore, regressions were also run to explore relationships between main variables without using controls. In Step 1, independent variables were entered and in Step 2 the cross-product terms were entered. Given the relatively low sample size of the study ($n = 104$) and research regarding the influence of this on the already-low statistical power of regression analyses (Aguinis & Stone-Romero, 1997), interaction tests resulting in a significance level of $p < .10$ will be reported. As presented in Tables 2-9, interactions graphs were created using an excel program retrieved online (Dawson, 2013) based on Aiken and West (1991). Interactions were plotted using one standard deviation above and below the means of each variable.

Five moderated regressions with controls and three moderated regressions without controls produced significant results, and will be presented below. Sanctification MOG only acted as a significant moderator in one regression without controls. In regressions with controls Sanctification MOG did not act as a significant moderator between all four work stressors (constraints, demands, conflict with coworkers, and conflict with clients) and all four outcomes (physical health, burnout, anxiety, and depression). Sanctification SQ did not significantly moderate the relationships between constraints and burnout or depression, between demands and all four outcomes (physical health, burnout, anxiety, and depression), between conflict with coworkers and burnout or depression, or between conflict with clients and burnout, anxiety, or depression.

As presented in Table 6a and Figure 2, sanctification SQ moderated the relationship between constraints and physical health ($\beta = .81, p < .05$). Consistent with hypotheses, low sanctifiers report of physical health became slightly worse as levels of constraints increased.

Inconsistent with hypotheses, high sanctifiers report of physical health also became worse as levels of constraints increased, and the relationship between constraints and health was stronger for high sanctifiers than for low. As presented in Table 7a and Figure 7, when run without controls, sanctification SQ also moderated the relationship between constraints and physical health ($\beta = .89$ $p < .05$). As in the case of the interaction with controls, as constraints increased, reports of physical health symptoms also increased for both low and high sanctifiers. However, high sanctifiers consistently reported higher levels of symptoms than low sanctifiers.

As presented in Table 6c and Figure 3, sanctification SQ moderated the relationship between constraints and anxiety ($\beta = -.57$, $p < .10$). Consistent with hypotheses, low sanctifiers report of anxiety became higher as constraints increased. The relationship between constraints and anxiety was opposite for high sanctifiers, in that their levels of anxiety became lower as constraints increased, resulting in even better outcomes than were hypothesized. This relationship did not hold when run without controls.

As presented in Table 6i and Figure 4, sanctification SQ moderated the relationship between conflict with coworkers and physical health ($\beta = 1.26$, $p < .05$). Inconsistent with hypotheses, low sanctifiers report of physical health became more positive as conflict increased. The relationship between conflict and health was the opposite for high sanctifiers, in that reports of physical health became worse as conflict increased. This is also inconsistent with hypotheses. As presented in Table 7b and Figure 8, when run without controls, sanctification SQ also moderated the relationship between conflict with coworkers and physical health ($\beta = 1.4$ $p < .05$). For high sanctifiers, as conflict with coworkers increased, report of physical symptoms also increased. Low sanctifiers also reported more physical symptoms as conflict with coworkers increased, though the relationship was not as strong.

As presented in Table 6k and Figure 5, sanctification SQ moderated the relationship between conflict with coworkers and anxiety ($\beta = -.74, p < .05$). Inconsistent with hypotheses, low sanctifiers' levels of anxiety lowered as conflict increased. The relationship between conflict and anxiety was stronger for high sanctifiers, and levels of anxiety lowered even more as conflict increased, resulting in even better outcomes than were hypothesized. This relationship did not hold when run without controls.

As presented in Table 6m and Figure 6, sanctification SQ moderated the relationship between conflict with clients and physical health ($\beta = .81, p < .10$). Inconsistent with hypotheses, low sanctifiers' report of physical health became slightly better as report of conflict increased. The relationship between conflict and health was the opposite for high sanctifiers, and reports of physical health became slightly worse as conflict increased. This is also inconsistent with hypotheses. This relationship did not hold when run without controls.

As presented in Table 7c and Figure 9, sanctification MOG moderated the relationship between conflict with coworkers and depression when regressions were run without controls ($\beta = -1.24, p < .10$). Consistent with hypotheses, for high sanctifiers, reports of depression decreased as conflict with coworkers increased. The relationship was the opposite for low sanctifiers, in that reports of depression increased as conflict with coworkers increased. These results are clearly mixed in regards to previous research and alignment with both main effect and moderation hypotheses. We now turn to a discussion to explore the possible meaning behind these results.

DISCUSSION

The present study was designed to explore the relationships between work stress, health, and the sanctification of work. Theoretical postulation and empirical evidence point to links between work stress and worse physical and mental health and sanctification and more positive physical and mental health. The sanctification of work specifically has been linked to positive outcomes such as increased levels of job satisfaction and organizational commitment, and lower turnover. It has therefore been hypothesized that the sanctification of work will act as a buffer between work stress and poor physical and mental health outcomes.

The first hypothesis predicted that sanctification would be linked to better physical health and lower levels of burnout, anxiety, and depression. Analyses revealed mixed results. Though significant relationships were not as prevalent as predicted, correlational analyses that were significant were in line with the first hypothesis. Neither sanctification manifestation of God (MOG) or sacred qualities (SQ) were significantly related to physical health or anxiety, but higher levels of sanctification MOG and SQ were related to lower levels of burnout. The sacred qualities scale was also related to lower levels of depression. The main effects regressions did not reveal significant relationships in line with the hypotheses. The only significant relationship was between higher levels on the manifestation of God scale and worse physical health. Though this goes against Hypothesis 1, it is possible that when health is poor, people start turning more to religion and God. That is, the use of this kind of language may become more prevalent during times of poor health. A similar finding was reported by Pargament, Smith, Koenig, and Perez (1998). This study included a total of 1,387 participants (296 who had been in Oklahoma at the time of the Oklahoma City bombing, 540 college students who had experienced a serious negative life event, and 551 hospital patients coping with medical illness). It was found that

several constructs related to poor physical health, such as medical diagnoses or PTSD, were actually related to increased levels of both positive and negative religious coping. Pargament et al. assert that it is possible that poor physical health may act as a catalyst for participants turning to religion as a coping resource.

The second hypothesis predicted that higher levels of perceived work stress (constraints, demands, interpersonal conflict with coworkers and clients) would be linked to poorer physical health and greater burnout, anxiety, and depression. Correlational and main effects analyses showed significant relationships between all four work stressors and outcomes. Greater depression was related to work constraints, demands, conflict with coworkers, and conflict with clients. Higher levels of burnout were related to work constraints, demands*, and conflict with clients. Higher levels of anxiety was related to work constraints and demands. Worse physical health was related to work constraints*. Main effects analyses also showed that higher levels of conflict with coworkers was linked to less anxiety. With the exception of the relationship between conflict and anxiety, these results are consistent with the second hypothesis and with previous research (e.g., Bowling & Beehr, 2006; Niedhammer et al., 2008; Nixon et al., 2011). The seemingly contradictory relationship between conflict and anxiety will be explored further within the context of the third hypothesis.

The third hypothesis predicted that links between perceived work stress (constraints, demands, interpersonal conflict with coworkers and clients) and poorer health and higher levels of burnout, depression, and anxiety, would lessen as sanctification of work increases. Six total significant relationships were revealed involving the sanctification sacred qualities (SQ) scale, three work stressors (constraints and both conflict scales), and three outcomes (physical health,

* Links found in both correlational and main effects regression analyses

anxiety, and depression). Again, results were mixed in regard to their consistency with the hypothesis.

Sanctification SQ moderated the relationship between three stressors (constraints, conflict with coworkers, conflict with clients) and physical health. Inconsistent with the third hypothesis, with all three stressors, the relationship between physical health and stressors was negative. That is, physical health got worse in high sanctifiers as levels of stressors increased. Interestingly, as levels of conflict with both coworkers and clients increased, low sanctifiers' reports of health became more positive than their reports at low levels of stressors. That is, for low sanctifiers, physical health got better as stressors increased, which was opposite from the relationship between high stressors and worse physical health for high sanctifiers.

Sanctification SQ also moderated the relationship between two stressors (constraints and conflict with coworkers) and anxiety. For low sanctifiers, the relationship between anxiety and constraints was positive, in that reports of anxiety increased as constraints increased. The relationship was negative for high sanctifiers, in that anxiety decreased as constraints rose, which is generally consistent with hypotheses, though this will be discussed further below. Regarding conflict with coworkers, the relationship was negative for both high and low sanctifiers. That is, anxiety decreased for both high and low sanctifiers as reports of this stressor increased, though the relationship was stronger for high sanctifiers. Again, this is generally consistent with hypotheses.

Sanctification MOG moderated the relationship between conflict with coworkers and depression when run without controls. For high sanctifiers, the relationship between depression and conflict with coworkers was negative. Reports of depression decreased as reports of conflict with coworkers increased. The relationship was positive for low sanctifiers, in that reports of

depression increased as conflict with coworkers increased. This is generally consistent with hypotheses.

Of note, all but one of the significant moderations occurred with the sanctification SQ scale rather than the MOG scale. That is, the scale that makes direct reference to God did not act as a significant moderator. There are a couple of reasons as to why this might be. Though the sample size was not large enough to test this, about half of survey data came from participants living in states (Connecticut and Maine) in which overall religiosity has been reported to be lower than the national average (Gallup Poll, March 27, 2012). Furthermore, historically, the integration of religion into human services work is a relatively newly accepted idea, and one with which many continue to experience discomfort. Additionally, general trends indicate that people are beginning to identify more with spirituality than religion. Geographic differences, lack of integration of religion into social services work, and identification with spirituality rather than religion may lead workers to use more spiritually-oriented language rather than God-oriented language in their everyday lives and particularly in their work. They may feel it is not acceptable to bring God into their work given the sensitive nature of the topic and the general separation by society of religion from the aspects of life that have been defined as more secular. Therefore, even if they do identify with doing God's work, this particular language may not be utilized as much as non-theistic language, leading the sacred qualities language to have more of an impact on the stress-strain relationship at work.

Turning to specific moderation analyses, high sanctifiers reported worse physical health as levels of work stressors increased, whereas low sanctifiers' report of physical health actually got better as levels of stressors increased. This was not in line with the third hypothesis, which predicted that higher sanctification would act as a buffer between work stress and poor health.

However, this relationship may be explained by examining the more negative side of sanctification, which was discussed in the literature review above. When an aspect of life is sanctified, there may be an increased likelihood of negative reactions when this aspect of life is in some way violated. This may be referred to as a desecration if it is perceived to be a serious enough violation. Those who feel that something or someone is getting in the way of their sacred work may actually experience greater negative reactions to stressors than those who do not sanctify their work. Desecration has been linked to poor outcomes in previous research. In their study of 117 adults, Pargament, Magyar, et al. (2005) found that an experience of sacred loss was linked to greater depression and desecration was linked to greater anger, while both were linked to higher levels of intrusive thoughts.

Turning to the theory of sanctification in general (Pargament and Mahoney, 2005), another potential explanation for these results is that people who sanctify their work may be investing more of their time and energy into their work and go to great lengths to preserve and protect it. If this is true, perhaps those who sanctify their work are putting so much time into their work that other areas of life are not as well attended to. If self care is one of these areas, physical health may worsen, as seen in the current sample. This also fits in with theory of recovery from work, in which it is maintained that it is important to be able to detach from work, relax, invest time and energy into other areas of life, and feel a sense of control over how time away from work is spent (Sonnentag & Fritz, 2007). If it is chronically difficult to recover from the work day, well being is likely to decrease. Again, if high sanctifiers are so invested in their work that they spend the majority of their time and energy on work and have difficulty detaching from it, self care may lessen and physical health may worsen.

Analyses between high stressors and lower levels of anxiety and depression also revealed mixed results. High sanctifiers' report of anxiety went down the higher the constraints and the conflict with coworkers, whereas low sanctifiers' report of anxiety went up the higher the constraints and went down with higher conflict with coworkers. High sanctifiers' report of depression also went down the higher the conflict with coworkers, whereas low sanctifiers' report of depression went up. Although the study's hypothesis did predict that sanctification would act as a buffer and result in better outcomes for high than for low sanctifiers, high sanctifiers' anxiety and depression actually went down the higher the level of stressors they reported, rather than remaining relatively steady. It may be that high sanctifiers tend to utilize more religious coping when experiencing higher levels of stressors, which leads to either actually experiencing less, or feeling as though they should be experiencing less, anxiety and depression. Consistent with the third hypothesis, sanctification may be acting as a resource in times of high stress, allowing workers to reframe their experience of the stressors, remind themselves of the meaning behind their work, and lessen levels of anxiety and depression. They may see stressors as "trials" or challenges to embrace and overcome in the name of sacred work. However, given the reported decreases in physical health, it is difficult to assert how much sanctification is actually buffering these relationships.

Taken together, high sanctifiers tend to report lower levels of anxiety and depression and worse physical health at high levels of work stress. As discussed above, perhaps those who sanctify their work tend to turn to religion more as they experience more stress, using religion as a resource to cope and placing their anxiety and depression into the "hands" of an external force. Therefore, at least in the short term, they experience less anxiety and depression. Additionally, high sanctifiers may feel as though they should not be experiencing anxiety or depression in

relation to work they feel is sacred or blessed, and so they choose not to acknowledge it to themselves or to report it to others. Anxiety and depression are more subjective and easier to misreport (both to oneself and to others) than more objective physical symptoms, which high sanctifiers report worse levels of at higher levels of stressors. It may be that if high sanctifiers who are experiencing high levels of stressors do not deal with the source of the stressors or the anxiety itself, and are not detaching from work in ways that allow them to invest in other areas of life such as self care, the anxiety and depression may be manifested in physical symptoms (Kirmayer, Groleau, Looper, & Dao, 2004). Links between chronic and unaddressed stressors and physical health problems have been purported in theory spanning back to Selye's (1956) fight or flight model. Possible ways to address this dissonance are discussed below.

Limitations

There are several limitations to this study that must be noted. The sample size in this study was relatively low and, given this, it is possible that the lack of significant results is partially due to the effect of a low n on statistical power (Aguinis & Stone-Romero, 1997). Additionally, the study was cross-sectional, which does not allow for causal attributions. All data collected was that of self-report. No objective (e.g., time cards to determine number of hours worked) or other-report (e.g., that of managers) was collected. While there were a number of constructs examined in this study, it may be beneficial to include measures that would allow for the further teasing apart of links between constructs.

One possible discrepancy in reporting that may exist, and which was unable to be examined due to low sample size, is in East coast versus Midwest levels of religiosity. According to recent polls, Connecticut and Maine fall below the national average in religiosity and Ohio

and Wisconsin fall within the average range of religiosity (Gallup Poll, March 27, 2012). It is possible that those on the East coast do not identify with religious or “God” language as much as other Americans, which may have affected the significance of results. Statistical tests did not show significant differences in reporting, but this may be due to low sample size affecting statistical power. Furthermore, the majority of the sample in this study identified as Christian, and it would be interesting to examine any potential differences in results not only across geographic location, but across religions as well.

Finally, it is possible that results were affected by the self-selection nature of participation in this study. At the first level, each site needed approval by a director or manager in order to participate. It is possible that some managers were hesitant to participate due to the nature of the study. Managers who did not participate may have been worried about employees providing poor reports of their work environment or high levels of work stress. On the other hand, the type of site that did participate may not have as many issues related to work stress, or may reflect the willingness of managers to address the needs of their employees, which may have contributed to the lack of results regarding stressors and other constructs such as organizational commitment. At the second level, participation by employees at sites that did opt into the study was completely voluntary. Although anonymity was assured and participants were informed that their participation and responses would not affect their standing at the agency, it is possible that employees were hesitant to identify with certain constructs (e.g., high stressors, low organizational support, or high burnout) or use certain language (e.g., language connected to God), in anticipation of negative repercussions at work.

Future Directions

There are a number of ways in which this research can be expanded to increase our understanding of the relationships between work stress, sanctification, and health outcomes. It would be beneficial to replicate this research using a larger sample size in order to examine the possibility of this improving the statistical power of analyses. It would also be beneficial to collect data beyond that of self-report. For example, utilizing manager reports of constructs such as observed job satisfaction, commitment, anxiety, and absence due to sickness would add to the richness of the data. Data collection that would allow for daily tracking of constructs such as sanctification, stressors, anxiety, and physical health problems, may also aid in teasing apart many of the links found in this study. Additionally, collecting information on self-care habits and recovery from work would help to explore links between sanctifiers who perhaps invest too much time and energy into their work, in turn sacrificing their health.

Expanding the type of data and the sample size would also allow for investigation into various subgroups' potential differences in reporting. For example, measuring how sanctifiers utilize this framework may help to tease apart varying results. Examining potential differences in high sanctifiers who utilize this framework in their daily work and those who identify with this language on one measure on one particular day may provide further insight into the relationships between stressors, sanctification, and health. It would also be interesting to compare links between stress and health across the varying ways people view their work - as a job, a career, or a calling - as outlined by Wrzesniewski et al. (1997). Furthermore, research designed to explore these links while controlling for external rewards such as money or status would likely be beneficial. Collecting data from populations both across the country and from different countries would be helpful in exploring if results vary according to geographic location. It would

be interesting to see if less religious populations provided different results than more religious populations, and to examine potential differences (or similarities), across varying religions. It would also be interesting to examine these constructs in countries in which citizens do not have as much individualized choice in career, such as Eastern, more community- and family-oriented societies. All of these relationships would also be more meaningful and informative in longitudinal studies, given that cross-sectional studies are unable to reveal causality within significant relationships.

Limitations and possible structural improvements aside, this study did replicate prior research in that sanctification was related to higher levels of well being and work stress was related to lower levels of well being. Companies can use this information as motivation to decrease stressors and boost job satisfaction, work engagement, and overall morale. Further intervention to decrease work stressors is clearly important, given the replication of work stressors' relationships to poor health outcomes. It is also likely, given the link between sanctification and improved outcomes, that increased activities at work to remind employees of the meaning behind the work - whether it is viewed it as sanctified, a calling, or in whatever context that provides a "why" for the work - may increase positive outcomes. This may increase the feeling of internal rewards that are likely a part of the process that allows concepts such as sanctification to act as a buffer between stressors and poor health. Increased support in the form of acknowledgment of the difficult nature of the work being done, managerial efforts to reduce stressors such as constraints, staff support meetings, and encouragement of self-care are just a few of the many opportunities agencies have to decrease the impact of stressors and provide an atmosphere in which workers feel supported in incorporating constructs, such as sanctification, that provide internal resources and rewards for daily work.

This study also revealed seemingly conflictual relationships that would be interesting to explore further. Interaction effects revealed that in some circumstances sanctification decreased reactions to stressors, and in some situations sanctification increased reactions to stressors. It would be interesting to further explore the possibility of individual differences affecting high sanctifiers' reactions to stressors. A former coworker recently expressed a decrease in burnout and an increase in work engagement after working with children affected by the Sandy Hook tragedy and experiencing the increase in support within her own agency following this event. She was able to use these experiences as a reminder that she views her work as a calling, and of the internal reward she gains from being able to participate in work she finds so personally meaningful. She described feeling more energized when returning to her normal line of work, which had recently been severely impacting her levels of burnout. However, other former coworkers who also view their work as a calling have reported feeling higher levels of burnout following their work related to the same tragedy. Individual differences may help to account for these varying reactions. For example, in the current study, positive affect was linked to more positive outcomes such as lower levels of burnout and depression, while negative affect was linked to myriad negative outcomes including worse physical health and higher levels of burnout, depression, and anxiety. One's general approach to life, be it generally negative or generally positive, may have an effect on how they react to stressors and therefore on health outcomes. One example of individual differences specific to religion can be seen in the findings of Pargament et al. (1998), who report that those who use positive religious coping to deal with stressors tend to experience better outcomes, whereas those who use negative religious coping tend to experience more negative outcomes. If we can better understand how people utilize individual differences, including religious views and resources, we can better understand how to

implement appropriate interventions that will help people reframe their work and the stressors associated with it, and cope with stressors in a more adaptive manner.

Finally, high sanctifiers tended to report less anxiety but worse physical problems. It is possible that high sanctifiers feel as though they should not acknowledge anxiety in a context related to their sanctified work, and that this may result in increased somatization of stress.

Qualitative and quantitative studies designed to assess these relationships through interviews and measures would aid in exploring this hypothesis. If this is indeed the case, it will be important to address reasons for high sanctifiers' hesitations in expressing anxiety, and provide interventions related to this. For example, perhaps the agency culture is one in which it is taboo to acknowledge the difficulties that are so prevalent in human services work. Perhaps individual employees are expected to deal with the difficulties of this work on their own time. Many human services agencies struggle financially, and it is therefore possible that time used at work to address stress or anxiety is frowned upon due to managers' beliefs that this impacts the utilization of work time for productivity. Further research designed to tease apart the specific ways in which sanctification may increase or decrease positive outcomes would aid in developing positive modifications to the workplace. Managers may feel more motivated to make these modifications to the workplace if they are provided with empirical evidence that addressing stressors at work and incorporating religious and spiritual constructs such as sanctification of work into daily routines may actually improve both worker and organizational well being. Given the amount of time that many people spend at work and the potential impact work stress can have on their overall well being, future research in these areas is imperative to increasing the well being of individuals, organizations, and the societies in which they exist.

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APPENDIX A: DEMOGRAPHICS

Please provide the name of your agency: _____

Gender

Your gender: ___ Male ___ Female ___ Other: _____

Age

Which category below includes your age?

___ 18-20

___ 21-29

___ 30-39

___ 40-49

___ 50-59

___ 60-69

___ 70-79

Do you consider yourself to be Hispanic or Latino?

___ Yes

___ No

Ethnicity

What is your ethnicity?

____ White and/or Euro-American ____ Asian American ____ Black and/or African American
____ Native American/Native Alaskan ____ Native Hawaiian/other Pacific Islander
____ Two or more ethnicities
____ Other: _____

Education

What is your highest educational background?

____ Less than 7 years
____ Junior high school
____ Partial high school (10th-11th grade)
____ High school graduation
____ Partial college/post high school training (1 year or more)
____ Standard college graduation
____ Graduate/professional degree

Job tenure

How long have you been at your current job? _____ years _____ months

Annual gross household income

What is your approximate annual gross household income?

____ less than \$25,000	____ \$50,001-75,000	____ \$100,001-130,000
____ \$25,001-50,000	____ \$75,001-100,000	____ more than \$130,000

Religious orientation

What is your religious preference?

- | | |
|---|-----------------------------------|
| <input type="checkbox"/> Christian/Protestant | <input type="checkbox"/> Muslim |
| <input type="checkbox"/> Christian/Catholic | <input type="checkbox"/> Jewish |
| <input type="checkbox"/> Christian/Non-denominational | <input type="checkbox"/> Agnostic |
| <input type="checkbox"/> Atheist | <input type="checkbox"/> None |
| <input type="checkbox"/> Other (specify): _____ | |

Religiousness and spirituality

How often do you attend religious services?

- | | | |
|---|---|--|
| <input type="checkbox"/> Several times a week | <input type="checkbox"/> About once per month | <input type="checkbox"/> Less than once per year |
| <input type="checkbox"/> About once a week | <input type="checkbox"/> Several times a year | <input type="checkbox"/> Never |
| <input type="checkbox"/> 2-3 times per month | <input type="checkbox"/> About once or twice a year | |

How often do you pray privately in places other than church or synagogue or temple?

- | | | |
|---|--|---|
| <input type="checkbox"/> More than once per day | <input type="checkbox"/> Once a week | <input type="checkbox"/> Less than once a month |
| <input type="checkbox"/> Once a day | <input type="checkbox"/> A few times a month | <input type="checkbox"/> Never |
| <input type="checkbox"/> A few times a week | <input type="checkbox"/> Once a month | |

To what extent do you consider yourself to be a religious person?

- | | | | | |
|----------------------|---|---|----------------|---|
| 1 | 2 | 3 | 4 | 5 |
| Not at all religious | | | Very religious | |

To what extend to you consider yourself to be a spiritual person?

1	2	3	4	5
Not at all spiritual			Very spiritual	

APPENDIX B: POSITIVE AND NEGATIVE AFFECT SCHEDULE (PANAS)
Watson, Clark, and Tellegen (1988)

very slightly or not at all	a little	moderately	quite a bit	extremely
1	2	3	4	5
__ interested			__ irritable	
__ distressed			__ alert	
__ excited			__ ashamed	
__ upset			__ inspired	
__ strong			__ nervous	
__ guilty			__ determined	
__ scared			__ attentive	
__ hostile			__ jittery	
__ enthusiastic			__ active	
__ proud			__ afraid	

APPENDIX C: WORK ENGAGEMENT
Schaufeli, Bakker, and Salanova (2006)

Never	Almost never (A few times a year or less)	Rarely (Once a month or less)	Sometimes (A few times a month)	Often (Once a week)	Very often (A few times a week)	Always (Every day)
-------	---	-------------------------------------	---------------------------------------	---------------------------	---------------------------------------	--------------------------

1. At my work, I feel bursting with energy.
4. At my job, I feel strong and vigorous.
5. I am enthusiastic about my job.
7. My job inspires me.
8. When I get up in the morning, I feel like going to work.
9. I feel happy when I am working intensely.
10. I am proud of the work that I do.
11. I am immersed in my work.
14. I get carried away when I am working.

APPENDIX D: AFFECTIVE ORGANIZATIONAL COMMITMENT
Allen and Meyer (1990)

1 = Strongly disagree 5 = Slightly agree

2 = Disagree 6 = Agree

3 = Slightly disagree 7 = Strongly agree

4 = Neutral

1. I would be very happy to spend the rest of my career with this organization
2. I enjoy discussing my organization with people outside it
3. I really feel as if this organization's problems are my own
4. I think that I could easily become as attached to another organization as I am to this one (R)
5. I do not feel like 'part of the family' at my organization (R)
6. I do not feel 'emotionally attached' to this organization (R)
7. This organization has a great deal of personal meaning for me
8. I do not feel a *strong* sense of belonging to *my* organization (R)

APPENDIX E: PERCEIVED ORGANIZATIONAL SUPPORT
Eisenberger, Huntington, Hutchison, and Sowa (1986)

Listed below and on the next several pages are a series of statements that represent possible feelings that individuals might have about the company or organization for which they work.

With respect to your own feelings about the particular organization for which you are now working--[name of organization]--please indicate the degree of your agreement or disagreement with each statement by checking one of the seven alternatives below each statement.

- | | |
|-----------------------|--------------------|
| 1 = Strongly disagree | 5 = Slightly agree |
| 2 = Disagree | 6 = Agree |
| 3 = Slightly disagree | 7 = Strongly agree |
| 4 = Neutral | |

1. The organization values my contribution to its well-being.
2. If the organization could hire someone to replace me at a lower salary it would do so. (R)
3. The organization fails to appreciate any extra effort from me. (R)
4. The organization strongly considers my goals and values.
6. The organization would ignore any complaint from me. (R)
7. The organization disregards my best interests when it makes decisions that affect me. (R)
8. Help is available from the organization when I have a problem•
9. The organization really cares about my well-being.
17. Even if I did the best job possible, the organization would fail to notice. (R)
20. The organization is willing to help me when I need a special favor
21. The organization cares about my general satisfaction at work
22. If given the opportunity, the organization would take advantage of me. (R)

- 23. The organization shows very little concern for me. (R)
- 25. The organization cares about my opinions.
- 27. The organization takes pride in my accomplishments at work
- 35. The organization tries to make my job as interesting as possible.

APPENDIX F: JOB SATISFACTION
Judge, Locke, Durham, and Kluger (1998)

Please indicate the degree to which you agree with each of these statements:

Strongly agree Agree Undecided Disagree Strongly disagree

"I feel fairly well satisfied with my present job" (reverse scored)

"Most days I am enthusiastic about my work" (reverse scored)

"Each day of work seems like it will never end"

"I find real enjoyment in my work" (reverse scored)

"I consider my job rather unpleasant"

APPENDIX G: WORK STRESSORS

Organizational Constraints Scale (OCS)

Spector and Jex (1998)

1 = Less than once per month 4 = Once or twice per day

2 = Once or twice per month 5 = Several times per day

3 = Once or twice per week

How often do you find it difficult or impossible to do your job because of...?

1. Poor equipment or supplies.
2. Organizational rules and procedures.
3. Other employees.
4. Your supervisor.
5. Lack of equipment or supplies.
6. Inadequate training.
7. Interruptions by other people.
8. Lack of necessary information about what to do or how to do it.
9. Conflicting job demands.
10. Inadequate help from others.
11. Incorrect instructions.

Quantitative Workload Inventory (QWI)

Spector and Jex (1998)

1 = Less than once per month 4 = Once or twice per day

2 = Once or twice per month 5 = Several times per day

3 = Once or twice per week

1. How often does your job require you to work very fast?
2. How often does your job require you to work very hard?
3. How often does your job leave you with little time to get things done?
4. How often is there a great deal to be done?
5. How often do you have to do more work than you can do well?

How many hours a week do you typically work?

____ Less than 20

____ Between 20 and 30

____ 40

____ Between 40 and 50

____ Between 50 and 60

____ Over 60

Interpersonal Conflict at Work Scale (ICAWS)

Spector and Jex (1998)

1 = Less than once per month

4 = Once or twice per day

2 = Once or twice per month

5 = Several times per day

3 = Once or twice per week

1. How often do you get into arguments with others at work?
2. How often do other people yell at you at work?
3. How often are people rude to you at work?

4. How often do other people do nasty things to you at work?

Client Incivility Scale

Burnfield, Clark, Devendorf, and Jex (2004)

- | | |
|--------------------------------|--------------------|
| 1 = Strongly disagree | 4 = Agree |
| 2 = Disagree | 5 = Strongly agree |
| 3 = Neither disagree nor agree | |

1. Clients take their anger out on employees
2. Clients have taken out their frustrations on employees at my organization
3. Clients make insulting comments to employees
4. Clients treat employees as if they were inferior or stupid
5. Clients show that they are irritated or impatient
6. Clients do not trust the information I give them and ask to speak with someone of higher authority
7. Clients are condescending to me
8. Clients make comments that question the competence of the employees
9. Clients make comments about my job performance
10. My clients make personal verbal attacks against me
11. Clients pose unreasonable demands
12. My clients make rude comments about employees physical appearance
13. Clients make offensive sexual comments to employees
14. Clients make insulting comments to other clients
15. My coworkers make insensitive comments to clients

APPENDIX H: SOCIAL SUPPORT
Carver, Scheier, and Weintraub (1989)

Please answer the following items regarding how you may cope with the above-described stressors. If you have not experienced any of the above-described stressors, or feel these questions do not apply to you, you may mark “N/A”.

N/A Strongly disagree Disagree Neither Agree nor Disagree Agree Strongly Agree

Instrumental support subscale:

I try to get advice from someone at work about what to do.

I talk to someone at work to find out more about the situation.

I talk to someone at work who could do something concrete about the problem.

I ask people at work who have had similar experiences what they did.

Emotional support subscale:

I discuss my feelings with someone at work.

I try to get emotional support from coworkers.

I get sympathy and understanding from someone at work.

I talk to someone at work about how I feel.

APPENDIX I: DESECRATION
Pargament, Magyar, Benore, and Mahoney (2005)

Please identify one or more stressors you have experienced at work, and answer the following items accordingly, *as they relate to your work*. If you have not experienced any of the above-described stressors, or feel these questions do not apply to you, you may mark "N/A".

N/A Strongly disagree Disagree Neither Agree nor Disagree Agree Strongly Agree

This event was an immoral act against something I value.

The event was a sinful act involving something meaningful in my life.

This event was both an offense against me and against God.

Something sacred that came from God was dishonored.

APPENDIX J: LIVING ONE'S CALLING SCALE
Duffy, Bott, Allan, Torrey, & Dik (2012)

Please answer the following items if you currently feel a calling to a particular job or line of work. Please answer using the following scale:

1 = Strongly Disagree

2 = Moderately Disagree

3 = Slightly Disagree

4 = Neutral

5 = Slightly Agree

6 = Moderately Agree

7 = Strongly Agree

8 = Not applicable – I don't have a calling

1. I have regular opportunities to live out my calling

2. I am currently working in a job that closely aligns with my calling

3. I am consistently living out my calling.

4. I am currently engaging in activities that align with my calling.

5. I am living out my calling right now in my job

6. I am working in a job to which I feel called.

APPENDIX K: SANCTIFICATION OF WORK SCALE
Mahoney et al. (1999); modified for work by Walker et al. (2008)

Manifestation of God Subscale

The following questions use the term "God" when asking you about your job. We realize that different people use different terms to refer to "God" such as "Higher Power," "Divine Spirit," "Holy Spirit," "Yahweh," "Allah," "Buddha" etc. Please feel free to substitute your own word for God when answering these questions.

Please indicate the degree to which you agree or disagree with each of the following statements.

Strongly	Moderately	Slightly	Neutral	Slightly	Moderately	Strongly
disagree	disagree	disagree		agree	agree	agree

God played a role in the development of my job.

God is present in my work.

My job is a reflection of God's will.

My job is an expression of my spirituality or religiousness

My job is consistent with my spiritual or religious identity.

I experience God through my job.

My job reflects my image of what God wants for me.

My job is influenced by God's actions in my life.

My job represents the holy work of God.

My job represents God's presence in my life.

My actions surrounding my job following the Bible and what it teaches.

My actions surrounding my job follow the teachings of my church.

Sacred Qualities Subscale

The following questions use the term "God" when asking you about your job. We realize that different people use different terms to refer to "God" such as "Higher Power," "Divine Spirit," "Holy Spirit," "Yahweh," "Allah," "Buddha" etc. Please feel free to substitute your own word for God when answering these questions. Please indicate the degree to which each of the words below describes your current job.

Does not describe at all	Moderately disagree	Slightly disagree	Neutral	Slightly agree	Moderately agree	Very closely describes
Holy						
Inspiring						
Blessed						
Awesome						
Heavenly						
Spiritual						
Religious						
Mysterious						
Miraculous						
Sacred						

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APPENDIX L: PHYSICAL SYMPTOMS INVENTORY (PSI)
Spector and Jex (1997)

During the past 30 days did you have any of the following symptoms? If you did have the symptom, did you see a doctor about it? During the past 30 days did you have?	No	Yes, but I didn't see doctor	Yes, and I saw doctor
1. An upset stomach or nausea			
2. A backache			
3. Trouble sleeping			
4. A skin rash			
5. Shortness of breath			
6. Chest pain			
7. Headache			
8. Fever			
9. Acid indigestion or heartburn			
10. Eye strain			
11. Diarrhea			
12. Stomach cramps (Not menstrual)			
13. Constipation			
14. Heart pounding when not exercising			
15. An infection			
16. Loss of appetite			
17. Dizziness			
18. Tiredness or fatigue			

How many days have you been absent from work due to your physical or mental health? _____

APPENDIX M: OLDENBURG BURNOUT INVENTORY
Demerouti, Mostert, and Bakker (2010)

Instruction: Below you find a series of statements with which you may agree or disagree. Using the scale, please indicate the degree of your agreement by selecting the number that corresponds with each statement

Strongly agree	Agree	Disagree	Strongly disagree
1	2	3	4

1. I always find new and interesting aspects in my work.
2. There are days when I feel tired before I arrive at work.
3. It happens more and more often that I talk about my work in a negative way.
4. After work, I tend to need more time than in the past in order to relax and feel better.
5. I can tolerate the pressure of my work very well.
6. Lately, I tend to think less at work and do my job almost mechanically.
7. I find my work to be a positive challenge.
8. During my work, I often feel emotionally drained.
9. Over time, one can become disconnected from this type of work.
10. After working, I have enough energy for my leisure activities.
11. Sometimes I feel sickened by my work tasks.
12. After my work, I usually feel worn out and weary.
13. This is the only type of work that I can imagine myself doing.
14. Usually, I can manage the amount of my work well.
15. I feel more and more engaged in my work.
16. When I work, I usually feel energized.

Note. Disengagement items are 1, 3(R), 6(R), 7, 9(R), 11(R), 13, 15. Exhaustion items are 2(R), 4(R), 5, 8(R), 10, 12(R), 14, 16. (R) means reversed item when the scores should be such that higher scores indicate more burnout.

APPENDIX N: CENTER FOR EPIDEMIOLOGICAL STUDIES
DEPRESSION SCALE (CES-D)
Radloff, 1977

Rarely or none	Some or a	Occasionally or a moderate	Most or all of
of the time	little of the time	amount of the time the	time
(less than 1 day)	(1-2 days)	(3-4 days)	(5-7 days)

During the past week:

I was bothered by things that usually don't bother me.

I did not feel like eating; my appetite was poor.

I felt that I could not shake off the blues even with help from my family or friends.

I felt I was just as good as other people. (reverse scored)

I had trouble keeping my mind on what I was doing.

I felt depressed.

I felt that everything I did was an effort.

I felt hopeful about the future. (reverse scored)

I thought my life had been a failure.

I felt fearful.

My sleep was restless.

I was happy. (reverse scored)

I talked less than usual.

I felt lonely.

People were unfriendly.

I enjoyed life. (reverse scored)

I had crying spells.

I felt sad.

I felt that people dislike me.

I could not “get going”.

APPENDIX O: GENERALIZED ANXIETY DISORDER 7-ITEM SCALE (GAD-7)
Spitzer, Kroenke, Williams, & Lowe, 2006

Not at all	Several Days	More than half the days	Nearly every day
0	1	2	3
1. Feeling nervous, anxious or on edge			
2. Not being able to stop or control worrying			
3. Worrying too much about different things			
4. Trouble relaxing			
5. Being so restless that it is hard to sit still			
6. Becoming easily annoyed or irritable			
7. Feeling afraid as if something awful might happen			

If you checked off any problems, how difficult have these problems made it for you to do your work, take care of things at home, or get along with other people?

Not difficult at all	Somewhat difficult	Very difficult	Extremely difficult
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APPENDIX P: INFORMED CONSENT FORM



BOWLING GREEN STATE UNIVERSITY

Department of Psychology

Dear Participant,

I am a clinical psychology doctoral candidate at Bowling Green State University, and I am conducting a study to better understand how work stress may affect employee well-being. Your participation in this project is very important and I greatly appreciate your assistance.

You will be asked to complete one on-line survey, which is estimated to require about 20-25 minutes to complete. This survey will ask questions about your characteristics and views, work stressors, work environment, and physical and mental well-being.

The information you provide will be used for research purposes. This survey is anonymous, meaning no identifying information will be linked to your responses. In addition, data will be stored in password-protected computers and/or locked briefcases. As such, please answer all questions as honestly and accurately as possible. To ensure your privacy, please close your internet browser and clear your internet history upon completion of the surveys.

There are no foreseeable risks or discomforts in participating in this study. Your participation in this study will contribute to our understanding of how work stress affects employees. Following your participation in this study, you will be provided with the option to email me with contact information (e.g., email address) only if you choose to do so, to be entered into a raffle to win one of four \$50 (fifty dollar) prizes. Should you choose to do so, your name will not be connected to your data in any way.

Your participation in this study is voluntary, and you may discontinue participation at any time. Neither your participation nor your refusal to participate or your withdrawal from this study will have any impact on you in regards to this study or your relationship with the agency at which you are employed or Bowling Green State University. If you have any questions or concerns regarding the completion of this survey, please contact me, Lisa Backus at lbackus@bgsu.edu or 203-464-4033, or my advisor Steven Jex at sjex@bgsu.edu or 419-372-2132. You may also contact the Human Subjects Review Board (HSRB) of Bowling Green State University at (419) 372-7716 should you have any questions pertaining to your rights as a participant.

If you do not wish to participate in this study, you may close your browser window and your participation is complete. Thank you for your time.

If you choose to participate in this study, you may click on the button below to continue with the survey. By clicking this button, you are stating:

I have been informed that participation is voluntary. Refusal to participate will involve no penalty. I have been informed that I may discontinue participation at any time without penalty connected to either this study or the agency at which I am employed. I declare that I am at least 18 years of age. By clicking on this button, I am providing my informed consent to participate in this study.

APPENDIX Q: TABLES

Table 1
Participant Demographics (n = 104)

	<i>n</i>	Percent
Gender		
Male	17	16.3
Female	87	83.7
Age		
18-20	0	0
21-29	21	20.2
30-39	38	36.5
40-49	17	16.3
50-59	19	18.3
60-69	9	8.7
70-79	0	0
Ethnicity		
Hispanic or Latino?		
Yes	4	3.8
No	100	96.2
White and/or Euro-American	86	82.7
Black and/or African American	9	8.7
Asian American	1	1
Native American/Native Alaskan	0	0
Native Hawaiian/other Pacific Islander	1	1
Other: Mexican American	1	1

Two or more ethnicities	5	4.8
Missing	1	1

Education

Less than 7 years	0	0
Junior high school	0	0
Partial high school (10 th -11 th grade)	0	0
High school graduation	6	5.8
Partial college/post high school training (1 year or more)	5	4.8
Associates degree	7	6.7
Standard college graduation	19	18.3
Graduate/professional degree	66	63.5
Missing	1	1

Job Tenure**Annual gross household income**

Less than \$25,000	6	5.8
\$25,001-50,000	42	40.4
\$50,001-75,000	19	18.3
\$75,001-100,000	17	16.3
\$100,001-130,000	11	10.6
More than \$130,000	9	8.7

Religious Orientation

Christian/Protestant	23	22.1
Christian/Catholic	27	26
Christian/Non-denominational	13	12.5
Jewish	7	6.7
Muslim	0	0
Other (Total)	10	9.6
Buddhist	2	1.9
Baptist	2	1.9
Jehovah's Witness	1	1
Pagan	2	1.9
Spiritual	1	1
Traditional African Religion	1	1
Agnostic	8	7.7
Atheist	2	1.9
None	14	13.5

Frequency of attendance at religious services

Several times a week	8	7.7
About once a week	12	11.5
2-3 times per month	11	10.6
About once per month	5	4.8
Several times a year	16	15.4
About once or twice a year	25	24
Less than once per year	7	6.7
Never	19	18.3
Missing	1	1

Frequency of private prayer

More than once per day	25	24
Once a day	10	9.6
A few times a week	16	15.4
Once a week	2	1.9
A few times a month	12	11.5
Once a month	4	3.8
Less than once a month	12	11.5
Never	22	21.2
Missing	1	1

Table 2
Psychometric Properties of Measures (n = 104)

Measure (# of items)	Possible Range of Totals	Actual Range of Totals	Range of Means	M	SD	α
Religiosity Total (4)	4-26	9-21	-6.33-6.05 (normed)	0.00	3.26	0.83
Religiosity (1)	1-5	1-5	1-5	2.75	1.28	
Spirituality (1)	1-5	1-5	1-5	3.56	1.12	
Attendance of Religious Services (1)	1-8	1-8	1-8	3.99	2.23	
Frequency of Private Prayer (1)	1-8	1-8	1-8	4.68	2.73	
Sanctification MOG (12)	12-84	12-84	1-7	4.05	1.73	0.97
Sanctification SQ (10)	10-70	10-67	1-6.70	3.58	1.40	0.92
Sanctification (22)						0.96
Work stress constraints (11)	11-55	11-55	1-5	1.90	0.72	0.84
Work stress demands (5)	5-25	5-25	1-5	3.41	0.98	0.83
Work stress conflict with coworkers (4)	4-20	4-12	1-3	1.22	0.36	0.60
Work stress conflict with clients (15)	15-75	15-66	1-4.40	2.56	0.72	0.91
Work stress conflict combined						0.90
Physical Health (18)	18-54	18-46	1-2.56	1.37	0.24	0.81
Burnout (16)	16-64	23-58	1.40-3.63	2.33	0.43	0.87
Anxiety (7)	7-28	7-25	1-3.57	1.60	0.57	0.89
Depression (20)	20-80	20-65	1-3.25	1.56	0.45	0.90
Positive Affect (10)	10-50	19-47	1.90-4.70	3.51	0.57	0.85
Negative Affect (10)	10-50	10-41	1-4.10	1.94	0.62	0.88
Work Engagement (9)	9-63	23-60	2.56-6.67	5.12	0.96	0.89
Affective Organizational Commitment (8)	8-56	9-55	1.13-6.88	4.58	1.36	0.89
Perceived Organizational Support (16)	16-112	18-112	1.13-7	4.54	1.45	0.97
Job Satisfaction (5)	5-25	5-25	1-5	3.71	0.84	0.87
Social Support (8)	8-48	8-48	1-6	4.76	0.83	0.89
Desecration (4)	4-24	4-20	1-5	1.70	0.94	0.86
Calling (6)	6-48	10-48	1.67-8	5.91	1.58	0.97

Table 3
Sanctification of Work Scale Principal Components Factor Analysis
 Rotated Component Matrix

Rotated Component Matrix*				
	Component			
	1	2	3	4
God played a role in the development of my job	.899	.069	.044	.138
God is present in my work	.928	.051	.040	.068
My job is a reflection of God's will	.864	.155	.001	.176
My job is an expression of my spirituality or religiousness	.743	.139	.229	.269
My job is consistent with my spiritual or religious identity	.760	.047	.214	.198
I experience God through my job	.898	.175	.079	.040
My job reflects my image of what God wants for me	.912	.223	.114	.104
My job is influenced by God's actions in my life	.876	.194	.175	.046
My job represents the holy work of God	.830	.293	.238	.137
My job represents God's presence in my life	.883	.233	.197	.073
My actions surrounding my job follow the Bible and what it teaches	.784	.219	.077	.107
My actions surrounding my job follow the teachings of my church	.791	.230	.060	.127
Holy	.272	.817	.237	.110
Inspiring	.248	.203	.100	.882
Blessed	.440	.602	-.012	.443

Awesome	.165	.374	.251	.735
Heavenly	.118	.903	.140	.199
Spiritual	.078	.610	.303	.471
Religious	.228	.894	.152	.126
Mysterious	.099	.131	.911	.148
Miraculous	.251	.466	.633	.275
Sacred	.336	.471	.675	.065

Extraction Method: Principal Component Analysis.

Rotation Method: Varimax with Kaiser Normalization.

*Rotation converged in 5 iterations.

Table 4
Correlations ($n = 104$)

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
1	-																			
2	.65**	-																		
3	.37**	.55**	-																	
4	-.03	-.10	-.15	-																
5	.01	.04	-.08	.30**	-															
6	-.02	.05	.06	.37**	.14	-														
7	-.07	.08	-.05	.32**	.28**	.32**	-													
8	.09	.11	-.08	.35**	.16	.17	.10	-												
9	-.04	-.22*	-.39**	.52**	.41**	.15	.29**	.39**	-											
10	-.07	-.01	-.08	.31**	.26**	.13	.19	.44**	.37**	-										
11	.01	-.09	-.24*	.42**	.35**	.25*	.23*	.52**	.66**	.74**	-									
12	.14	.28**	.30**	-.13	.03	-.00	-.08	-.18	-.35**	-.16	-.30**	-								
13	-.13	.02	.05	.24**	.26**	.23*	.11	.43**	.24*	.76**	.60**	-.11	-							
14	.12	.33**	.45**	-.30**	-.12	-.07	-.08	-.12	-.66**	-.06	-.36**	.51**	-.06	-						
15	.11	.23*	.37**	-.41**	-.06	-.11	-.06	-.07	-.55**	-.13	-.29**	.28**	-.04	.58**	-					
16	.03	.13	.33**	-.66**	-.25*	-.26*	-.22*	-.17	-.62**	-.29**	-.43**	.23**	-.18	.48**	.72**	-				
17	.18	.21*	.29**	-.48**	-.20*	-.09	-.18	-.24*	-.63**	-.22*	-.42**	.39**	-.14	.53**	.48**	.47**	-			
18	-.02	.11	.07	-.09	.11	-.03	.11	-.07	-.12	.12	-.01	.03	.14	.07	.15	.22*	.11	-		
19	-.02	-.09	-.12	.29**	.24*	-.26**	.24*	.26*	.24*	.31**	.30**	.04	.23*	-.08	.08	-.14	-.08	.08	-	
20	-.05	.19	.18	-.22*	-.21*	-.14	-.08	-.18	-.42**	-.12	-.37**	.34**	-.13	.37**	.27**	.29**	.26**	.01	-.01	-

* $p < .05$, ** $p < .01$, *** $p < .001$, two-tailed.

1. RE = Religiosity 2. MG = Manifestation of God 3. SQ = Sacred Qualities 4. CN = Constraints 5. DM = Demands 6. CO = Conflict with Coworkers 7. CL = Conflict with Clients 8. HE = Health 9. BO = Burnout 10. AN = Anxiety 11. DE = Depression 12. PA = Positive Affect 13. NA = Negative Affect 14. EN = Engagement 15. OC = Affective Organizational Commitment 16. OS = Perceived Organizational Support 17. JS = Job Satisfaction 18. SS = Social Support 19. DE = Desecration 20. CA = Calling

Tables 5a-5h: Main Effects Regressions

Table 5a: *Sanctification and Physical Health*

	Physical Health <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.38***	.38***
Job Satisfaction	-.19	-.20*
Organizational Support	-.01	.02
Desecration	.16	.17
Sanctification MOG		.22*
Sanctification SQ		-.15
R^2	.23***	.25
ΔR^2	.26***	.03

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 5b: *Sanctification and Burnout*

	Burnout <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.10	.12
Job Satisfaction	-.43***	-.40***
Organizational Support	-.40***	-.36***
Desecration	-.12	.10
Sanctification MOG		-.02
Sanctification SQ		-.14
R^2	.55***	.56
ΔR^2	.57***	.02

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 5c: *Sanctification and Anxiety*

	Anxiety <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.71***	.71***
Job Satisfaction	-.06	-.05
Organizational Support	-.12	-.09
Desecration	.12	.12
Sanctification MOG		.06
Sanctification SQ		-.09
R^2	.60***	.60
ΔR^2	.62***	.01

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 5d: *Sanctification and Depression*

	Depression <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.50***	.51***
Job Satisfaction	-.25**	-.23**
Organizational Support	-.21*	-.18*
Desecration	.13	.12
Sanctification MOG		.05
Sanctification SQ		-.15
R^2	.51***	.51
ΔR^2	.53***	.01

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 5e: *Work Stress and Physical Health*

	Physical Health <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.38***	.36***
Job Satisfaction	-.19	-.14
Organizational Support	-.01	.11
Desecration	.16	.13
Constraints		.26
Demands		.00
Conflict Co		-.01
Conflict Cl		-.07
R^2	.23***	.23
ΔR^2	.26***	.03

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 5f: *Work Stress and Burnout*

	Burnout <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.09	.07
Job Satisfaction	-.43***	-.40***
Organizational Support	-.40***	-.38***
Desecration	.12	.09
Constraints		-.01
Demands		.20**
Conflict Co		-.08
Conflict Cl		.08
R^2	.55***	.58*
ΔR^2	.57***	.05*

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 5g: *Work Stress and Anxiety*

	Anxiety <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.71***	.73***
Job Satisfaction	-.06	-.03
Organizational Support	-.12	-.11
Desecration	.12	.11
Constraints		.06
Demands		-.01
Conflict Co		-.16*
Conflict Cl		.10
R^2	.60***	.61
ΔR^2	.62***	.02

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 5h: *Work Stress and Depression*

	Depression <i>n</i> = 104	
	Step 1	Step 2
	β	β
Negative Affect	.50***	.47***
Job Satisfaction	-.25**	-.25**
Organizational Support	-.21**	-.20*
Desecration	.13	.11
Constraints		-.03
Demands		.11
Conflict Co		.02
Conflict Cl		.03
R ²	.51***	.50
ΔR^2	.53***	.01

Note. Regression weights are standardized. * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Tables 6a-6p: Moderated Regressions

Table 6a: *Sanctification, Constraints, and Physical Health*

	Physical Health <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.38***	.36***	.34***
Job Satisfaction	-.19	-.14	-.19
Organizational Support	-.01	.17	.20
Desecration	.16	.11	.12
Sanctification MOG		.23*	.35
Sanctification SQ		-.18	-.81*
Constraints		.28*	-.21
Sanctification MOG x Constraints			-.13
Sanctification SQ x Constraints			.81*
R^2	.23***	.28***	.31***
ΔR^2	.26***	.07*	.04*

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6b: *Sanctification, Constraints, and Burnout*

	Burnout <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.10	.11	.11
Job Satisfaction	-.43***	-.40***	-.41***
Organizational Support	-.40***	-.34**	-.33**
Desecration	.12	.10	.10
Sanctification MOG		-.02	.04
Sanctification SQ		-.14	-.35
Constraints		.03	-.12
Sanctification MOG x Constraints			-.06
Sanctification SQ x Constraints			.27
R^2	.55***	.55***	.55***
ΔR^2	.57***	.02	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6c: *Sanctification, Constraints, and Anxiety*

	Anxiety <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.71***	.71***	.72***
Job Satisfaction	-.06	-.05	-.01
Organizational Support	-.12	-.09	-.10
Desecration	.12	.12	.11
Sanctification MOG		.06	-.03
Sanctification SQ		-.09	.35
Constraints		.01	.36
Sanctification MOG x Constraints			.09
Sanctification SQ x Constraints			-.57+
R^2	.60***	.60***	.61***
ΔR^2	.62***	.01	.02+

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6d: *Sanctification, Constraints, and Depression*

	Depression <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.50***	.51***	.51***
Job Satisfaction	-.25**	-.22**	-.22*
Organizational Support	-.21**	-.16	-.16
Desecration	.13	.12	.11
Sanctification MOG		.05	.21
Sanctification SQ		-.15	-.21
Constraints		.03	.11
Sanctification MOG x Constraints			-.21
Sanctification SQ x Constraints			.07
R^2	.51***	.51***	.50***
ΔR^2	.53***	.01	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6e: *Sanctification, Demands, and Physical Health*

	Physical Health <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.38***	.38***	.37***
Job Satisfaction	-.19	-.20*	-.21
Organizational Support	-.01	.02	.03
Desecration	.16	.17	.19
Sanctification MOG		.21	.43
Sanctification SQ		-.15	-.34
Demands		-.02	.01
Sanctification MOG x Demands			-.29
Sanctification SQ x Demands			.22
R^2	.23***	.24***	.23***
ΔR^2	.26***	.03	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6f: *Sanctification, Demands, and Burnout*

	Burnout <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.09	.08	.07
Job Satisfaction	-.43***	-.38***	-.38***
Organizational Support	-.40***	-.33***	-.33***
Desecration	.12	.07	.08
Sanctification MOG		-.06	.15
Sanctification SQ		-.12	-.19
Demands		.21	.30
Sanctification MOG x Demands			-.26
Sanctification SQ x Demands			.09
R^2	.55***	.60***	.59***
ΔR^2	.57***	.06**	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6g: *Sanctification, Demands, and Anxiety*

	Anxiety <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.71***	.71***	.71***
Job Satisfaction	-.06	-.05	-.08
Organizational Support	-.12	-.09	-.08
Desecration	.12	.12	.12
Sanctification MOG		.06	.13
Sanctification SQ		-.09	-.35
Demands		.01	-.12
Sanctification MOG x Demands			-.09
Sanctification SQ x Demands			.32
R^2	.61***	.60***	.59***
ΔR^2	.62***	.01	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6h: *Sanctification, Demands, and Depression*

	Depression <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.50***	.49***	.48***
Job Satisfaction	-.25**	-.22**	-.23**
Organizational Support	-.21**	-.16	-.15
Desecration	.13	.10	.12
Sanctification MOG		.03	.32
Sanctification SQ		-.14	-.38
Demands		-.11	.14
Sanctification MOG x Demands			-.37
Sanctification SQ x Demands			.29
R^2	.51***	.52***	.52***
ΔR^2	.53***	.03	.01

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6i: *Sanctification, Conflict with Coworkers, and Physical Health*

	Physical Health <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.38***	.38***	.40***
Job Satisfaction	-.19	-.20*	-.19
Organizational Support	-.01	.03	.03
Desecration	.16	.16	.15
Sanctification MOG		.22*	.38
Sanctification SQ		-.15	-1.08**
Conflict with Coworkers		.02	-.66
Sanctification MOG x ConflictCo			-.18
Sanctification SQ x ConflictCo			1.26*
R^2	.23***	.24***	.28***
ΔR^2	.26***	.03	.05*

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6j: *Sanctification, Conflict with Coworkers, and Burnout*

	Burnout <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.10	.12	.13
Job Satisfaction	-.43***	-.40***	-.40***
Organizational Support	-.40***	-.37***	-.37***
Desecration	.12	.11	.11
Sanctification MOG		-.02	-.18
Sanctification SQ		-.13	-.22
Conflict with Coworkers		-.03	-.24
Sanctification MOG x ConflictCo			.22
Sanctification SQ x ConflictCo			.12
R^2	.55***	.55***	.55***
ΔR^2	.57***	.02	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6k: *Sanctification, Conflict with Coworkers, and Anxiety*

	Anxiety <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.71***	.73***	.72***
Job Satisfaction	-.06	-.05	-.07
Organizational Support	-.12	-.12	-.13
Desecration	.12	.14	.15*
Sanctification MOG		.06	-.38
Sanctification SQ		-.07	.48+
Conflict with Coworkers		-.11	.02
Sanctification MOG x ConflictCo			.56
Sanctification SQ x ConflictCo			-.74*
R^2	.60***	.61***	.62***
ΔR^2	.62***	.01	.01

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 61: *Sanctification, Conflict with Coworkers, and Depression*

	Depression <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.50***	.51***	.51***
Job Satisfaction	-.25**	-.23**	-.23**
Organizational Support	-.21**	-.16	-.17
Desecration	.13	.11	.12
Sanctification MOG		.05	-.03
Sanctification SQ		-.15	-.09
Conflict with Coworkers		.04	.03
Sanctification MOG x ConflictCo			.11
Sanctification SQ x ConflictCo			-.09
R^2	.51***	.51***	.50***
ΔR^2	.53***	.01	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6m: *Sanctification, Conflict with Clients, and Physical Health*

	Physical Health <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.38***	.38***	.38***
Job Satisfaction	-.19	-.21*	-.23*
Organizational Support	-.01	.01	.02
Desecration	.16	.18	.18
Sanctification MOG		.23*	.40
Sanctification SQ		-.15	-.81*
Conflict with Clients		-.05	-.42
Sanctification MOG x ConflictCl			-.18
Sanctification SQ x ConflictCl			.81+
R^2	.23***	.24***	.26***
ΔR^2	.26***	.03	.03

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6n: *Sanctification, Conflict with Clients, and Burnout*

	Burnout <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.10	.11	.11
Job Satisfaction	-.43***	-.39***	-.40***
Organizational Support	-.40***	-.34***	-.36***
Desecration	.12	.08	.09
Sanctification MOG		-.03	-.38
Sanctification SQ		-.14	-.23
Conflict with Clients		.11	-.25
Sanctification MOG x ConflictCl			.49
Sanctification SQ x ConflictCl			.11
R^2	.55***	.56***	.57***
ΔR^2	.57***	.03+	.01

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6o: *Sanctification, Conflict with Clients, and Anxiety*

	Anxiety <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.71***	.71***	.71***
Job Satisfaction	-.06	-.05	-.04
Organizational Support	-.12	-.09	-.09
Desecration	.12	.11	.10
Sanctification MOG		-.05	.44
Sanctification SQ		-.10	-.21
Conflict with Clients		.04	.28
Sanctification MOG x ConflictCl			-.55
Sanctification SQ x ConflictCl			.16
R^2	.60***	.60***	.60***
ΔR^2	.62***	.01	.01

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 6p: *Sanctification, Conflict with Clients, and Depression*

	Depression <i>n</i> = 104		
	Step 1	Step 2	Step 3
	β	β	β
Negative Affect	.50***	.51***	.51***
Job Satisfaction	-.25**	-.23**	-.23**
Organizational Support	-.21**	-.17*	-.17
Desecration	.13	.11	.10
Sanctification MOG		.04	.24
Sanctification SQ		-.15	-.35
Conflict with Clients		.06	.07
Sanctification MOG x ConflictCl			-.26
Sanctification SQ x ConflictCl			.26
R^2	.51***	.51***	.50***
ΔR^2	.53***	.02	.00

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Tables 7a-7c: Significant Moderation Regressions – No Controls

Table 7a: *Sanctification, Constraints, and Physical Health*

	Physical Health <i>n</i> = 104	
	Step 1	Step 2
	β	β
Sanctification MOG	.23*	.51
Sanctification SQ	-.16	-.84*
Constraints	.34***	-.04
Sanctification MOG x Constraints		-.36
Sanctification SQ x Constraints		.89*
R^2	.13**	.16**
ΔR^2	.16**	.04

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

Table 7b: *Sanctification, Conflict with Coworkers, and Physical Health*

	Physical Health <i>n</i> = 104	
	Step 1	Step 2
	β	β
Sanctification MOG	.22	1.11
Sanctification SQ	-.21	-1.22**
Conflict with Coworkers	.17	-.04
Sanctification MOG x ConflictCo		-1.12
Sanctification SQ x ConflictCo		1.37*
R^2	.04	.08
ΔR^2	.07	.06

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

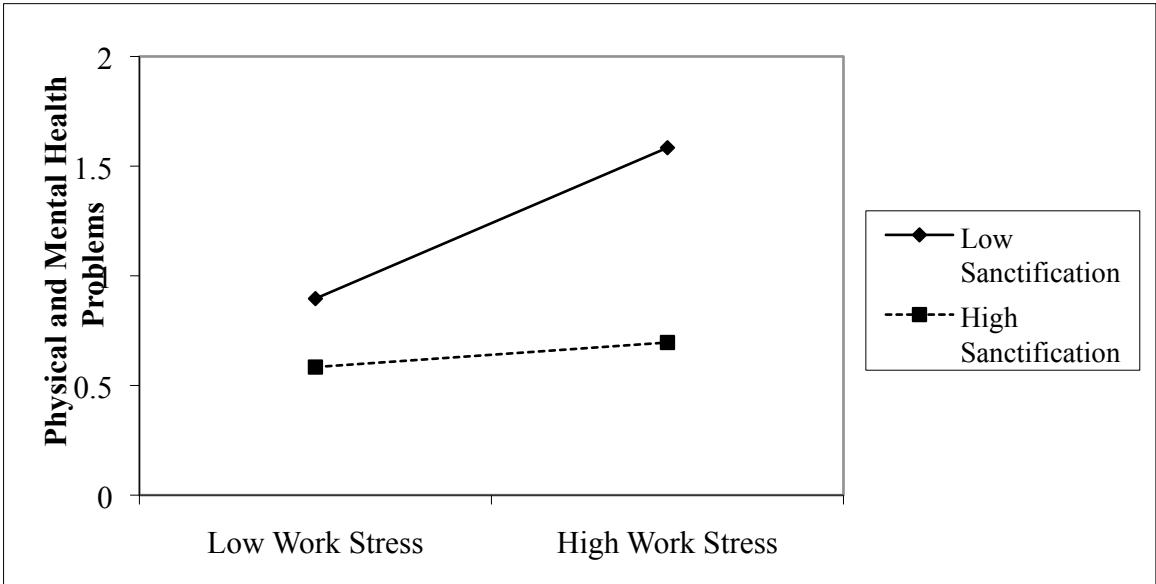
Table 7c: *Sanctification, Conflict with Coworkers, and Depression*

	Depression <i>n</i> = 104	
	Step 1	Step 2
	β	β
Sanctification MOG	.05	1.01
Sanctification SQ	-.28*	-.35
Conflict with Coworkers	.26**	.92*
Sanctification MOG x ConflictCo		-1.24+
Sanctification SQ x ConflictCo		.11
R^2	.10**	.11**
ΔR^2	.12**	.03

Note. Regression weights are standardized. + $p < .10$, * $p < .05$, ** $p < .01$, *** $p < .001$ two-tailed.

APPENDIX R: FIGURES

Figure 1: *Theoretical Model*



Figures 2-9: Interaction Graphs

Figure 2: Sanctification SQ, Constraints, and Physical Health

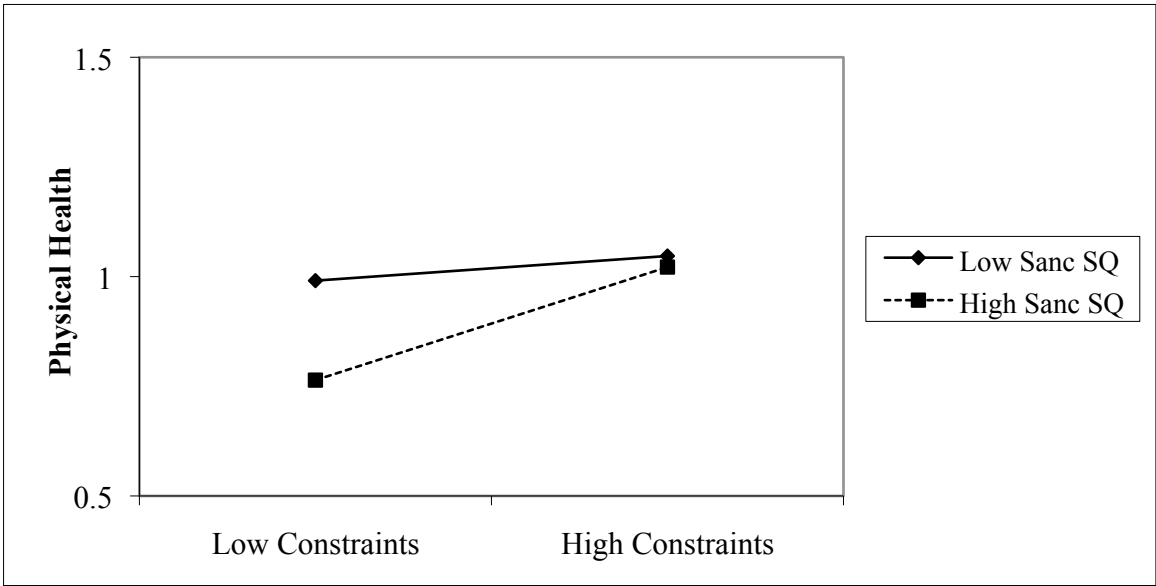


Figure 3: Sanctification SQ, Constraints, and Anxiety

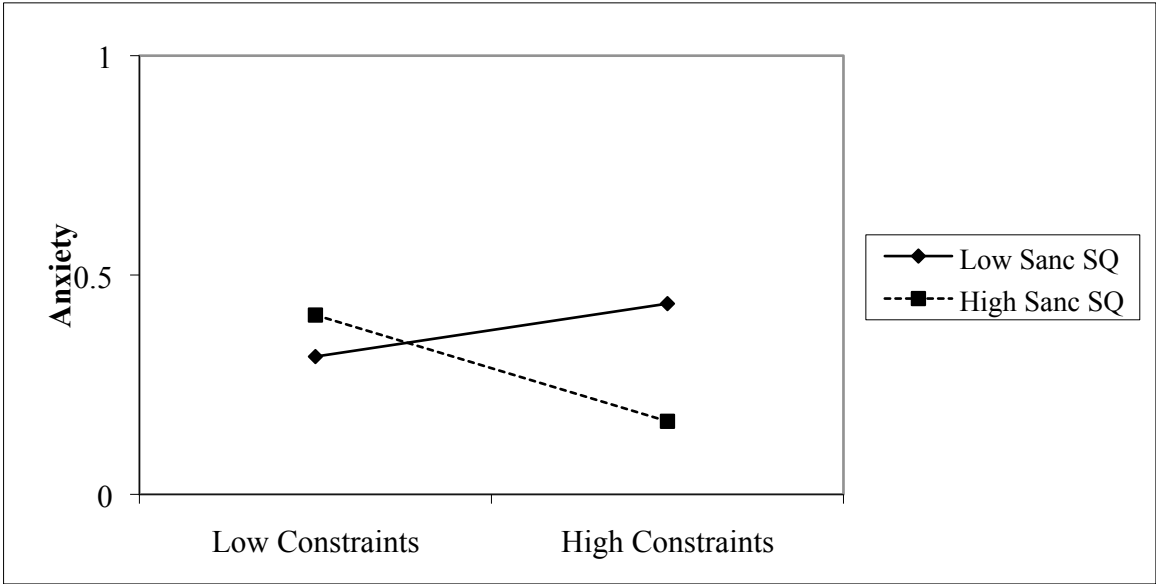


Figure 4: Sanctification SQ, Conflict with Coworkers, and Physical Health

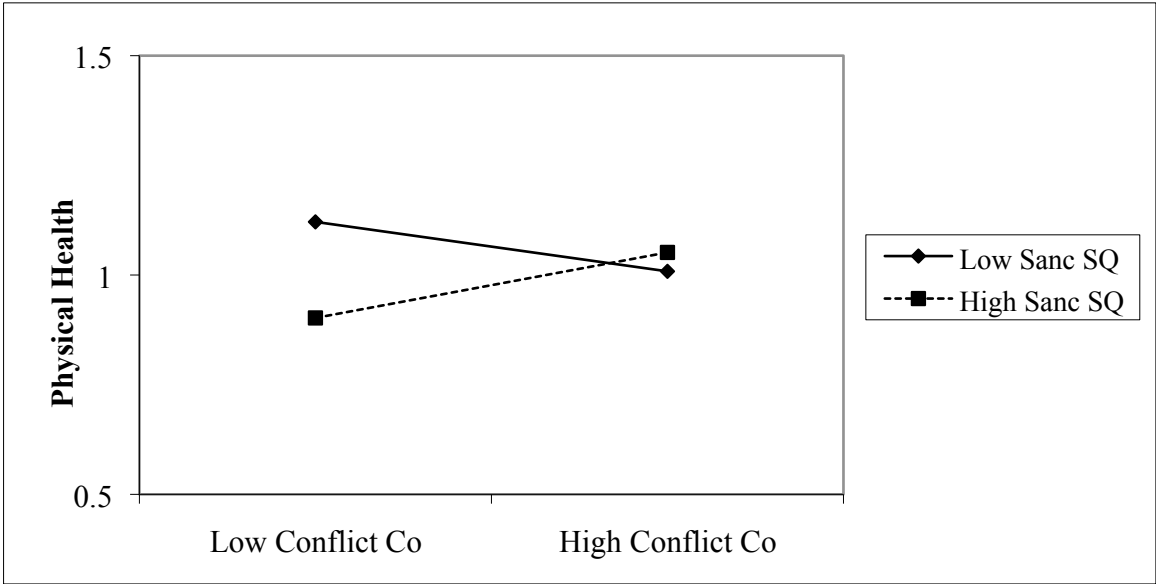


Figure 5: Sanctification SQ, Conflict with Coworkers, and Anxiety

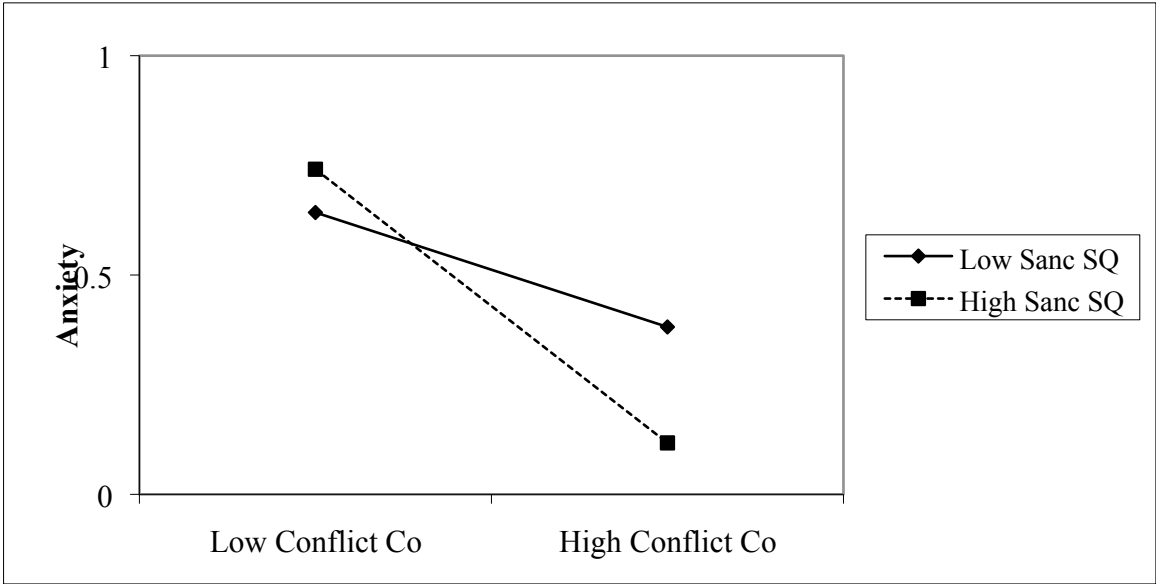


Figure 6: Sanctification SQ, Conflict with Clients, and Physical Health

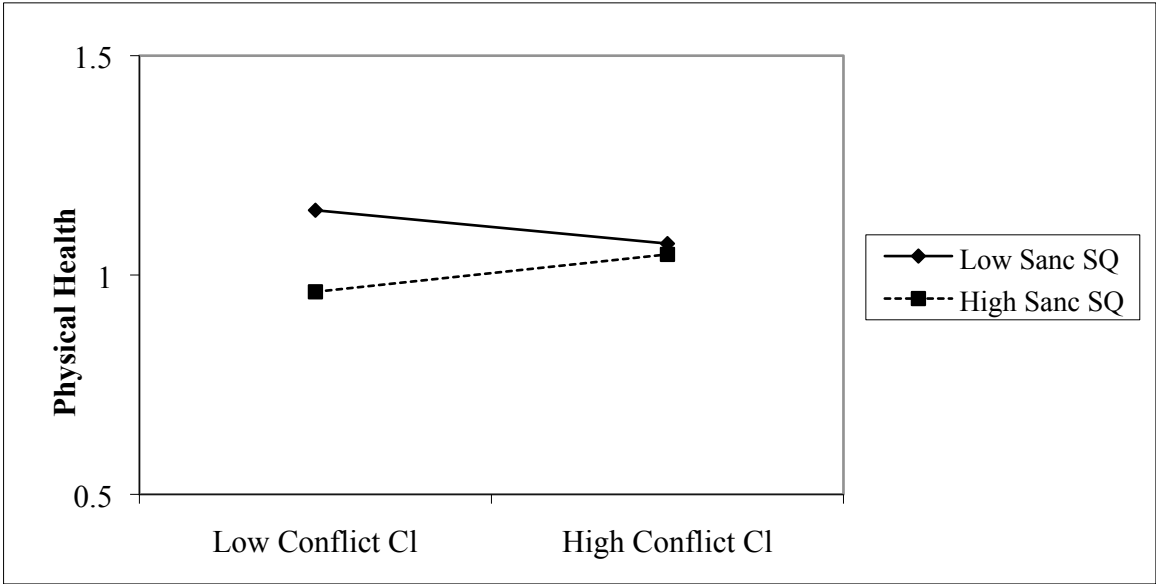


Figure 7: Sanctification SQ, Constraints, and Physical Health – No Controls

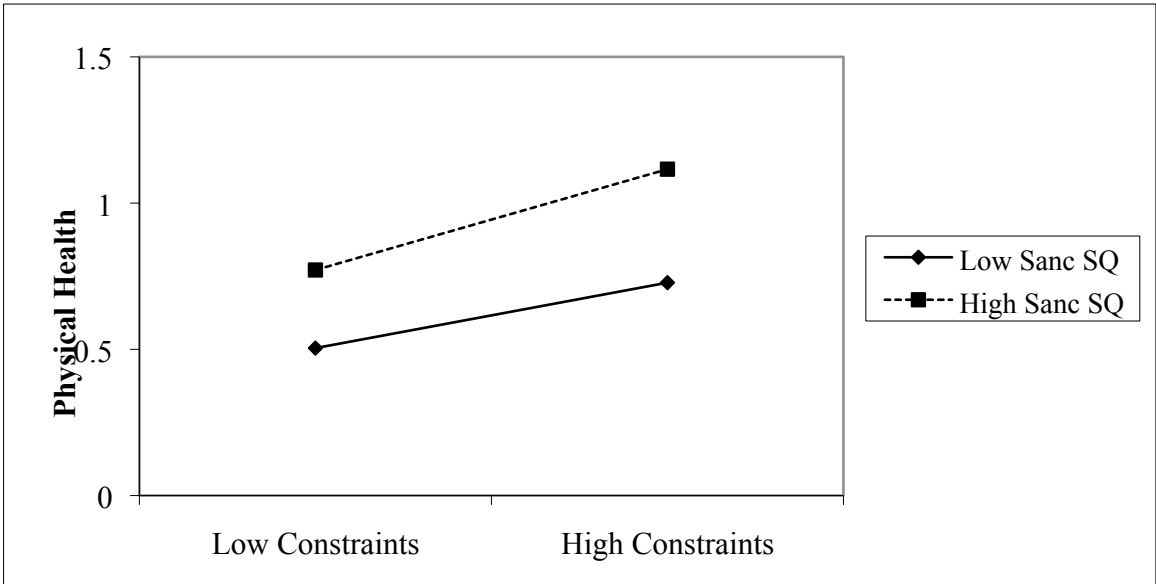


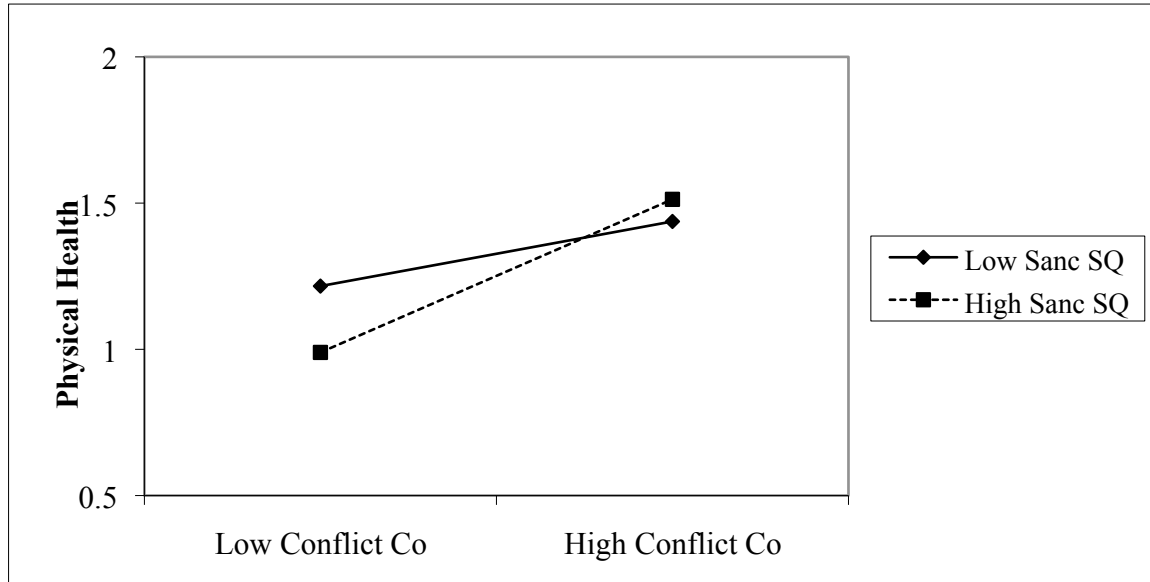
Figure 8: *Sanctification SQ, Conflict with Coworkers, and Physical Health – No Controls*

Figure 9: Sanctification MOG, Conflict with Coworkers, and Depression – No Controls

