ATTACHMENT TO PARENT AND PEERS AS A MODERATOR OF THE RELATION BETWEEN PARENT/PEER RELIGIOUS COPING AND ADOLESCENT RELIGIOUS COPING

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ABSTRACT

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The goal of this study was to advance the understanding of the role of parents’ and friends’ religious coping in predicting college students’ religious coping. The concordance hypothesis predicted a significant relation between student religious coping and parent/friend religious coping. The moderator hypothesis predicted that student attachment quality to parent/friend would moderate that relation, resulting in a stronger positive relation between parent/friend religious coping and student religious coping for those students with higher as opposed to lower levels of parent/friend attachments.

A sample of late adolescent college students was surveyed about their own and a selected parent’s and friend’s religious coping and about their attachment relationship with that selected parent and friend. In addition, the selected parent and friend were mailed surveys that assessed their own religious coping. Zero order correlations assessed the concordance hypothesis. Four sets of hierarchical regression analyses assessed the moderation hypothesis.

The concordance hypothesis was supported in regards to positive religious coping and partially supported in regards to negative religious coping. Specifically, the parent’s and friend’s actual positive religious coping was significantly related to the student’s actual coping, but concordance was between parent/friend actual negative religious coping and student negative religious coping was not significant. The student’s perceptions of their parent’s and friend’s positive and negative religious coping were significantly related to the student’s actual positive and negative religious coping, respectively. As predicted, concordance rates were higher for students’ perceptions of parent/friend religious coping than for actual parent/friend religious
coping. The attachment as moderator hypothesis was largely unsupported. It is speculated that because students generally reported higher as opposed to lower levels of attachment to parents and friends, it was difficult to test adequately the moderator hypothesis in this sample. The results are discussed in terms of Bandura’s concept of mental models and Bowlby’s attachment theory in the context of Pargament’s theory of the Psychology of Religion and Coping.
Courage

Last flower of summer
You raise your head proudly high
Ugly, ragged, pitted
Faded petals from insect feasts and summer’s sun

Crumpled, thirsty, shriveled
Fungus eaten leaves along your slim stem
Cold, windy, strong
Nature’s autumn elements against your fragile being

Gutted by life’s lessons
Factory fresh fakes replace your scented being
Last flower of summer
Who gave you a chance to be
The flower within the flower I see?

Yet, you raise your head proudly high
Even though your fate
Won’t be as flowers that decorate
Gracing the table or adorning the gate

Last flower of summer
You are courage
Raising your head proudly high
All the while knowing you are going to die
And no one will see the flower inside
You are courage
Acclaiming life, decrying fate
A destiny more glorious than to decorate

Ellen P. Cullman

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Dedicated to my children who are a gift of unqualified, nonjudgmental love.

Deborah Cullman Lambdin
For the Light in her teaching

and

Benjamin Philips Cullman
For the Strength of his heart
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CHAPTER I
INTRODUCTION

Late adolescence is a time of transition when parental rearing practices, familial ways of coping, and adjustments in family and peer relationships merge with the path of the adolescent’s trajectory into the growing independence of adulthood. It is a period of profound emotional, cognitive, and behavioral “transformations” (Allen & Land, 1999, p. 319) that depend on the use of judicious coping strategies to promote the best possible outcomes. Going to college is often a hallmark of this transitional time period. It can tend to elicit assorted ways of coping. In this vein, studies about religious coping—its prevalence, predictors, and outcomes—have become topics of interest for psychologists and social scientists (Harrison, Koenig, Hays, Eme-Akwari, & Pargament, 2001; Pargament, 1997). Studies indeed show that, among college students, various indices of adjustment are related to religious coping with stressors such as a close friend or loved one going to war (Pargament et al., 1994), the death of a friend (Park & Cohen, 1993), general stressful events (Cullman, 1995; Pargament, Koenig, & Perez, 2000), and the transition to college (Low & Handal, 1995; Maton, 1989).

Recent research has focused on the prevalence, measurement, and outcomes of religious coping in different populations such as medical patients, college students, and religious congregations, but few empirical studies have focused on the predictors of religious coping (Harrison et al., 2001). Religious coping involves the application of religious values and practices in order to manage stress as well as maintain one’s personal meaning and integrity during stress. Drawing from Spilka, Shaver, and Kirkpatrick’s (1985) theoretical paper about the constructs that underlie religious attributions, Pargament (1997) defined three levels of predictors for religious coping: personal, situational, and contextual. The personal level suggests who (p.
143) tends to religiously cope and reflects the nature of the person. For example, those who are more religiously committed are also more likely to religiously cope. The situational level suggests when (p. 143) one tends to cope religiously and points to the greater likelihood of religious coping in more intense and threatening circumstances that connote harm or personal loss. The contextual level suggests where (p. 143) one religiously copes and implicates the greater likelihood of religious coping depending on the social milieu of one’s living arrangements, culture, family, or work environment. The contextual level is the focus of the present study, the purpose of which is to explore late adolescents’ relational patterns (i.e., attachment quality or bond) to their parents and friends as a predictor of their own religious coping. In this way, attachment to parents and peers becomes a contextual or social predictor of religious coping.

The review of the literature will first present an overview of the research area of the Psychology of Religion and Coping and discuss why religious coping is important particularly in adolescence. Attachment as a contextual predictor of religious coping will be addressed and next, the origin and development of attachment theory, the mechanism of transition of attachment (the internal working model), and the measurement of attachment will be reviewed. Then, Social Cognitive Theory’s (Bandura, 1986) concepts of mental models will be related to the development of mental models for religious coping. After that, the recent literature linking attachment to religion and to the development of religious coping will be put forward before taking up the theoretical integration of attachment and religious coping. Studies relevant to the concordance between adolescent and parent or adolescent and friend will be presented, including the issue of the importance of measuring both the parent’s and friend’s actual coping as well as their coping as perceived by the adolescent. Finally, an overview of the present study will be
presented. Specifically, the study focuses on the predictability of college students’ religious coping from their parent’s and friend’s religious coping, and proposes that attachment to the parent/friend moderates the relation between parent/friend religious coping and college students’ religious coping.

Religious Coping in Adolescence

*Origin and Development of the Psychology of Religious Coping*

Pargament’s (1997) model of the psychology of religion and coping defines religion as “a search for significance in ways related to the sacred” (p. 32). Religious coping involves the application of religious values and practices to manage stress as well as to maintain one’s personal meaning and integrity during stress. A personal sense of significance or meaning within the problems and struggles that an adolescent might encounter in life can be a weighty issue particularly in light of their developmental stage and ultimate passage to adulthood. Moving from late adolescence to adulthood is a transformative process and during this transformation, a student may turn to religion. Thus, religious coping provides coping options that are among an assortment of nonreligious coping options and may set in motion a broader transformative experience as the adolescent progresses toward becoming an adult.

Religious coping (Pargament, 1997) is nested within Lazarus and Folkman’s (1984) transactional model of stress and coping. Lazarus and Folkman define coping as a dynamic interchange between a person and the environment as the individual endeavors to manage a difficult problem or situation. Religion enters the coping process when religious practices, beliefs, and rituals become ways of coping with the problem or situation as it takes place (Pargament).
Although the framework for religious coping is drawn from Lazarus and Folkman’s (1984) stress and coping theory (Pargament, 1997), Folkman and Lazarus, in turn, draw from Bandura’s (1977) social learning theory (which Bandura renamed social cognitive theory in 1986) for the theoretical underpinnings to the cognitive aspects of coping with stress. Thus, concepts from social cognitive theory (SCT) are involved in the development of religious coping. However, SCT also plays a role in the development of attachment in adolescence. The dual role of SCT in religious coping and attachment are discussed in a later section of this study.

Measuring Religious Coping

Pargament’s Work

Pargament (1997), through interviews with people, literature reviews, and collaborations with colleagues, has developed several measures to understand more about how people cope religiously. An early measure, the Religious Problem Solving Scales (Pargament et al., 1988) identifies three dispositional ways people respond using their faith to solve problems—collaborative, self-directing, and deferring. In general, two dimensions underlie these three approaches to religious coping: (a) the level of assigned responsibility to either self and/or God, and (b) the degree of personal control taken in managing the problem.

For instance, collaborative religious coping involves give-and-take interactions with God that provide a sense of mutually sharing the problem-solving process. The self-directing style refers to taking control through one’s actions and a heightened sense of personal responsibility provided by God. Finally, the deferring style describes coping by giving the problem, responsibility as well as action, to God. Later research with these scales has focused on understanding more about their implications for coping outcomes, personal adjustment, and
correlations with other scales (Bickel et al., 1998; Hathaway & Pargament, 1990; McIntosh & Spilka, 1990; Phillips, Pargament, Lynn, Crossley, & Craig, 2004; Wong-McDonald & Gorsuch, 2000).

Another scale is the Religious Coping Activities scales (Pargament, 1997; Pargament et al., 1990; Pargament et al., 1994). This scale assesses a diverse assortment of religious coping activities. Rather than disposition, this scale emphasizes the many ways people might think, behave, feel, and relate as they religiously cope. The development of the above two scales served a seminal role in prompting research in additional and more detailed areas of religion and coping (Belavich & Pargament, 2002; Freedman & Enright, 1996; Mahoney et al., 2005; Maton, 1989; Mickley, Pargament, Brant, & Hipp, 1998; Shahabi et al., 2002; Zinnbauer & Pargament, 1998).

The religious coping measure chosen for the present study is the Brief RCOPE (Pargament, Smith, Koenig, & Perez, 1998). The goal of developing the Brief RCOPE was to provide researchers with an efficient, comprehensive, and theoretically meaningful assessment tool that identifies both helpful and harmful ways of religious coping. Hence, the Brief RCOPE has two underlying factors—positive and negative patterns of religious coping that generalize to different groups of people, one group consisting of college students coping with a major life stressor.

The positive pattern consists of religious coping in ways that exhibit a sense of security in relation to God (Pargament, Smith, et al., 1998). These positive religious coping methods include seeking spiritual support, religious forgiveness, collaborative religious coping, spiritual connection, religious purification, benevolent religious reappraisal, and religious focus. The positive pattern is also associated with mental health outcomes that are consistent with adjustment for those with secure attachment. These outcomes include fewer symptoms of
psychological distress, psychological and spiritual growth, increased levels of cooperation with others, and in general, a more positive adjustment to the resolution of a problem.

The negative pattern depicts religious coping in ways that suggest a sense of insecurity in relation to God (Pargament, Smith, et al., 1998). The negative ways of religious coping are represented by spiritual discontent, punishing God reappraisals, interpersonal religious discontent, demonic reappraisal, and reappraisal of God’s powers. The negative pattern, alternatively, is associated with mental health outcomes that reflect adjustment patterns of those with insecure attachment. These outcomes in general involve increased levels of emotional distress such as depression, psychological symptoms, relationship problems, inferior quality of life, and in general, a poorer adjustment to the resolution of a problem.

Overall, the Brief RCOPE (Pargament, Smith, et al., 1998) is conceptually meaningful to studies about attachment and religious coping. The positive and negative religious coping scales tap behaviors and perceptions that, in theory, could be vicariously learned and incorporated into a person’s mental models and then, depending on the person’s internal working models that grew out of his or her parental attachment, efficaciously executed for coping with stress. This will be discussed in more detail later.

**Why Is Religious Coping Important In Adolescence**

The importance of religious coping in adolescence is based on two assumptions (Pargament, 1997). First, the adolescent time period, being a pivotal stage in the transition to adulthood, provides struggles that tend to elicit coping responses yet challenge coping capacities (Pargament, Murray-Swank, Magyar, & Ano, 2005; Pargament & Park, 1997). For example, living away from home for an extended period of time could begin a period of adjustment to assorted new responsibilities (e.g., time management, completing academic assignments
independently, financial responsibilities, considerations of drug and alcohol use, making new friends, etc.) that, considered altogether, test current coping reserves. Second, it is assumed that adolescents are proactive agents and able to choose how to cope from available options in the environment and/or within themselves (Harrison et al., 2001). Among these coping options is religious coping.

Religion could become involved in the coping process when an adolescent encounters problems that impinge on something that is important or significant to him or her (Pargament, 1997). Here religious coping could be a way that external problems are managed, such as making new friends within religious organizations, studying at a campus ministry located near one’s college, and practicing forgiveness when a problem arises with one’s roommate. Religious coping could also be a way of coping with internal anxieties about new situations in general. Examples might be to trust in God when commencing to take an important but difficult exam or praying when one’s schedule is too demanding. Although religious coping is an option among other nonreligious ways of coping, do adolescents engage in religious coping and why is religious coping important in its own right?

Studies do indeed corroborate that late adolescents engage in religious coping. One study found that 46% of a sample of 215 college students attended church from one to three times a month (Pargament et al., 1994). Another study selected 96 undergraduates from introductory psychology classes who reported that religion played a moderate role ($M = 3.87$, scale = 1–7) when coping with the death of a close friend (Park & Cohen, 1993). Zinnbauer and Pargament (1998) found that 214 (31%) of 695 college students reported a religious/spiritual conversion following a period of stress, and Maton found that 48% of a sample of 68 college students reported their faith helpful in coping during times of difficulty. Finally, Pargament and
colleagues (2000) found that 25.1% and 29.6% of a sample of 540 college students, respectively, reported moderate and considerable degrees of religious involvement when coping with a stressful event.

Religious coping among college students is used for coping with different types of stressful situations (Pargament et al., 2000). Of 540 college students, Pargament and colleagues found that religion was used in coping with the death of a family member (22.1%), death of a friend (14.1%), romantic relationship problems (12.2%), serious illness of a family member (9.3%), serious illness of self (8%), and separation, divorce, or other family conflict (7%). The students also rated the impact of the events from slightly negative (2.4%) to extremely negative (59.7%), suggesting that religious coping is an important option for coping with a range of negative events among late adolescents.

Pargament et al. (2000), exploring a comprehensive range of religious coping methods, found that when late adolescent college students religiously cope with a significant negative life event, their religious coping methods fall into categories of positive and negative religious coping methods (descriptive details in Chapter II) that influence adjustment outcomes. Greater use of all positive religious coping scales and three methods from the negative religious coping scales (Demonic Reappraisal, Passive Religious Deferral, and Pleading for Direct Intercessions) were significantly and positively ($r$’s range from .20 to .70, $p$’s range from $p < .01$ to $p < .05$) related to more positive religious outcomes (extent to which students experienced positive religious changes). Higher scores on four negative religious coping scales were related significantly but modestly to lower scores on measures of physical health ($r$’s range from $-.14$ to $-.18$, $p$’s < .01); and higher scores on three negative religious coping scales were related
significantly but modestly to higher levels of psychological distress (r’s range from .08 to .17, p’s range from $p < .01$ to $p < .05$).

Another study compared religious and nonreligious coping methods in a sample of 215 moderately (moderate = 3; scale: 1–5) religious college students who were coping with a friend or family member going to war (Pargament et al., 1994). It was found that methods of religious coping were modest to moderately associated with the initial distress of the friend or family member leaving for war on three measures of psychological distress (positive affect [high scores reflect the extent one feels energetic, active, and alert], negative affect [high scores reflect the extent one feels aversive mood states], and global psychological distress [higher scores reflect increased levels of distress such as loss of sleep due to worry]) and on two measures of psychological distress (positive affectivity and global psychological distress) 2 weeks later. For example, during the initial distress period (Pargament et al., 1994) Religious Support was significantly and positively associated with positive affectivity ($\beta = .17, p < .05$); Good Deeds, Religious Discontent, and Pleading were significantly and positively associated with negative affectivity ($\beta = .21, p < .01$; $\beta = .27, p < .001$; $\beta = .25, p < .001$; respectively); and Pleading, again, was significantly and positively associated with indices of global psychological distress ($\beta = .21, p < .05$). Thus, higher levels of religious coping were associated with higher levels of positive and negative affect and global psychological distress. The results showing positive relations between religious coping and distress could reflect that in times of distress, students turned to several forms of religious coping.

Two weeks later in the second phase of the study (Pargament et al., 1994), religious coping continued to be modest to moderately associated with levels of psychological distress. Pleading was significantly and positively associated with positive affectivity ($\beta = .20, p < .01$);
Religious Support and Religious Avoidance were significantly and negatively associated with global psychological distress ($\beta = -0.16, p < 0.05; \beta = -0.21, p < 0.05$). Thus, higher levels of Pleading were associated with higher levels of positive affect, and higher levels of Religious Support and Religious Avoidance were associated with lower levels of global psychological distress.

In sum, although both religious and nonreligious coping methods were related to variables of psychological distress, in this study the religious coping variables were better predictors of changes in distress across time even though the effects were modest in size (Pargament et al., 1994). Also, the Pargament et al. (1994) study points to the notion of the possible flux of beneficial and detrimental effects of religious coping across time in late adolescence. For example, higher levels of Pleading were significantly and positively associated with higher levels of negative affect ($r = 0.25, p < 0.001$) and global psychological distress ($r = 0.21, p < 0.05$) during the initial phase of the study, and then 2 weeks later it was significantly and positively associated with higher levels of positive affectivity ($r = 0.20, p < 0.01$).

In another study, Pargament, Zinnbauer, et al. (1998) used a process/integration model of efficacious coping to assess problematic religious coping. The authors surveyed two samples ($n = 98$ for each sample) of college students about their methods of religious coping in relation to a negative event. The research team found that two negative religious coping methods, specifically Self Neglect and Religious Denial, resulted in surprisingly positive outcomes for some students. Self Neglect was significantly and positively associated with the general resolution of an experienced event for one college student sample ($r = 0.27, p < 0.01$) and with an accompanying religious resolution (e.g., closer to God, spiritual growth) in both college student samples ($r = 0.56, p < 0.01; r = 0.53, p < 0.01$). Religious Denial was significantly and positively
associated with the general and religious resolution of the experienced event for both samples of college students (General Outcome: $r = .28, p < .01$; $r = .21, p < .01$; Religious Outcome: $r = .33, p < .01$; $r = .47, p < .01$). The authors noted that the unexpected finding (i.e., two methods of negative religious coping are significantly and positively associated with general and religious positive outcomes) suggests the importance of understanding positive and negative methods of religious coping and their relationship to both general and religious outcomes.

Overall, past studies show that college age adolescents select religious coping in times of stress and also use it in conjunction with nonreligious forms of coping. Also, studies suggest that there are harmful and helpful ways that college students religiously cope, yet just how and in what situations they are helpful or harmful is not clear. Finally, religious coping has been shown to be related to psychological, physical, and religious outcomes for negative events that are experienced by late adolescents. Given the prevalence of religious coping among late adolescent college students, and given that there are helpful and harmful ways of religious coping, learning more about what predicts religious coping is a worthwhile area of study and research.

*Attachment as a Social Predictor of Religious Coping in Adolescence*

Although it may be at home, at work, in class, or at a social gathering, the contextual level for predicting religious coping in adolescence involves, at least in part, the people to whom adolescents become emotionally attached or bonded (Pargament, 1997). The contextual-social milieu of adolescents is largely represented by their family and friends, and in particular, their parents and close friends. In this study it is hypothesized that adolescents’ religious coping is associated with the religious coping exhibited by those individuals to whom the adolescent feels a close bond – the parent and a close friend.
How might the quality of an adolescent’s relationship or attachment bond with a parent or friend predict the adolescent’s religious coping? First, empirical studies have shown (Cassidy & Shaver, 1999), as was theorized by Bowlby (1973, 1980, 1969/1982), that the quality of early parental relationships serve a survival function for the infant and young child (Ainsworth, 1973; Ainsworth, Blehar, Waters, & Wall, 1978) that, in turn, influence the child’s future relationship qualities (Allen & Land, 1999; Hazen & Shaver, 1987; Hazen & Zeifman, 1999; Kerns & Richardson, 2005; R. A. Thompson, 1999) and shape the child’s future coping responses and coping competencies (Grossman, Grossman, & Zimmerman, 1999; Mikulincer & Florian, 1998). Second, attachment theory has been empirically linked to cognitive conceptualizations of religious development (Granqvist, 1998; Granqvist & Kirkpatrick, 2004; Kirkpatrick, 1992, 2005) as well as the expressions of religious values and practices when experiencing stress (Belavich & Pargament, 2002). Thus, religious coping in adolescence might be predicted, in part, by an adolescent’s attachments relationships and the concomitant cognitive conceptualizations of those attachment experiences. The purpose of the present study is to investigate concordances (correlations) of religious coping between late adolescent college students and their parents and friends and to explore whether the quality of the students’ attachment to their parents and friends influences that concordance.

Attachment and Adolescence

Attachment Theory

Origin and Development

Attachment theory evolved from John Bowlby’s (1973, 1980, 1969/1982) observations and work with maladjusted children and their parents during the 1950s. Bowlby noticed that
many of the children he treated for severe behavior problems came from family backgrounds that included abandonment and loss. Unable to accept the then mainstream psychoanalytic explanations for behavior problems in children, Bowlby turned to other fields of study in search of theoretical explanations to apply to humans and, specifically, to the maladjusted children with whom he worked (Bretherton, 1992).

As a result, Bowlby’s (1973, 1980, 1969/1982) attachment theory is based on concepts from ethology, evolution, information processing, developmental psychology, and psychoanalytic theory. Bowlby’s theory (a) proposes that infants are hardwired to develop attachment bonds to their mother during critical periods in early infancy, (b) emphasizes the importance of the quality of that bond to the child’s future psychological health, (c) describes the relation of that bond to the child’s behavior with and apart from its mother, (d) posits the development of a cognitive map in the child’s mental milieu that serves as a pattern for future relationships, and (e) serves as a mechanism for the intergenerational transmission of attachment.

Internal Working Models

Bowlby (1969/1982) theorized that the attachment bond is born out of a complementary exchange between the child’s experiences of familiarity and novelty alongside his or her experiences of maternal availability and sensitivity. The mother, serving as a secure base, provides comfort and safety from which the child can explore and to which the child can return as needed. Bowlby suggested that owing to this mother–child interchange, the child develops mental models based on his or her psychological and physical experiences. Consequently, the child’s mental models, formed over time, contain relational information of how the world works in regard to the dialectics between safety and danger, between familiarity and novelty, and
between self and others. Bowlby called this self-defining and value-laden cognitive world an internal working model (IWM).

**Ainsworth’s Attachment Styles**

Whereas Bowlby (1969/1982) conceptualized attachment theory, Mary Ainsworth (1973) added depth and validity to it by empirically establishing three types of attachment bonds referred to as attachment styles. Ainsworth’s designations of the three styles are based on her observations of the relational interplay between a mother and her child that denote the quality of maternal caretaking when her child experiences an unfamiliar situation. Like Bowlby (1969/1982), Ainsworth viewed the behavioral development of the child as dependent on the mother’s sensitivity and response to her child’s emotional and physical needs.

Secure attachment style describes a bond where the maternal availability to the needs of the child is appropriately and sensitively managed in response to the child’s need for familiarity and novelty (Ainsworth et al., 1978). Attachment theory predicts that a secure attachment style increases the likelihood of healthy psychological development in the child (Bowlby, 1969/1982). Secure attachment equips the child to explore its environment yet seek and get help and comfort from its mother when distressed. Ainsworth’s empirical studies (Ainsworth et al.) also reveal that secure attachment style is a bond that provides both mother and child with the experience of warmth and joy in the relationship as the dialectics are managed.

Ainsworth et al. (1978) described ambivalent and avoidant attachment styles (often and herein subsumed under the term insecure attachment style) as bonds with a disequilibrium between the familiar versus novel needs of the child and the mother’s availability and sensitivity in response to those needs. Attachment theory predicts that an insecure attachment style increases the likelihood of maladjusted child behaviors (Bowlby, 1969/1982). When the mother
does not appropriately manage and/or express sensitivity to the child’s experiences, the child may develop (a) anxious behaviors involving clinging and crying, (b) avoidant behaviors such as seeming disinterest, or (c) ambivalent behaviors like wanting closeness yet expressing anger when it is offered. The insecure attachment styles are often difficult for the mother to manage, stressful for the child to experience, and result in a less rewarding relationship for both of them.

Applying Bowlby’s (1969/1982) IWM conception to Ainsworth’s (Ainsworth et al., 1978) attachment descriptions, the IWM for secure attachment would contain perceptions that tend to increase felt security when compared to the mental perceptions associated with insecurity (Bowlby, 1969/1982). The perceptions associated with secure attachment could include the self-esteem to seek help when distressed, the expectation that help is available, the ability to communicate with other people about the distress, the capacity to receive help, and the expectation of safety and comfort when under stress.

In contrast, the perceptions associated with insecure attachment involve levels of anxiety that tend to increase and, as a result, increase the person’s feelings of insecurity (Bowlby, 1969/1982). This anxiety could be coupled with personal doubt about getting help or comfort when needed, disinterest in and/or avoidance of seeking help, the expectation that help is not available or inadequate, and wanting help and comfort but being angry with those who can provide it. Hence, the insecurely attached child compared to the securely attached child is more likely to perceive the world as having higher levels of danger, increased difficulty perceiving the availability of help, and/or increased difficulty accepting help when it is offered.

Life-Span Stability of Attachment Through Internal Working Models

Bowlby (1969/1982) posited that future behavior and psychological well-being are shaped by IWMs, because they contain the patterned perceptions about one’s sense of self in
relation to anticipated outcomes between the self, others, and their environment. Bowlby also theorized that IWMs were most influenced by the early mother–child attachment processes and tended to remain stable throughout life. So, as one moves through later developmental stages, one’s patterned perceptions, although typically unconscious, are a mental map of how future significant relationship processes work.

Hazen and Shaver (1987) revealed a connection between infant attachment histories and adult romantic relationships that implicated the stability of one’s early attachment style into adulthood. In their large scale seminal study, the researchers investigated the relation between the affectional bonds formed in infancy and the affectional bonds formed later in adult romantic relationships. The study’s participants were invited to take a short “love quiz” (p. 513) with questions about their early childhood experiences, parental relationships, current social relationships, and current romantic relationship. The investigators, assuming that attachment style represents, in part, the content of IWMs, designed questions based on Ainsworth’s three attachment styles (Ainsworth et al., 1978; Bowlby, 1969/1982) that tapped the participants’ early childhood attachment relationships and current adult romantic relationship.

Hazen and Shaver (1987) found that the respondents’ perceptions (viewed as IWMs) of their early attachment history and their current romantic relationship varied as theoretically expected. For example, subjects reporting a secure adult attachment tended to report more warmth in their early relationships with their parents. Subjects reporting insecure attachment with their partner tended to report more cold and rejecting attachment histories. Again, the results were viewed as supporting a theoretical link between parent/child attachment qualities and the attachment characteristics of an adult romantic relationship with the mechanism of transfer being the IWM proposed by Bowlby (1969/1982).
Although there were limitations to Hazen and Shaver’s (1987) study, such as the use of brief forced-choice questions, a trait-like approach to measurement, and response bias due to a possible halo effect when romantically involved, the study generated intense interest among relationship researchers to replicate and extend Hazen and Shaver’s findings (W. A. Collins & Stroufe, 1999; Crowell, Treboux, & Waters, 2002; Feeney & Noller, 1990; Hazen & Shaver, 1994; K. N. Levy, Shaver, & Blatt, 1998; M. B. Levy & Davis, 1988; Waters, Merrick, Treboux, Crowell, & Albersheim, 2000).

Grossman et al. (1999), in an extensive review of the literature, discussed the stability of attachment styles from within the first 2 years of life to age 16. They found “convincing and sometimes strong developmental stability of attachment” (p. 780) for this age span. This was true whether attachment was assessed by self report or observational methods and included a longitudinal study. Inferences supporting the conception of IWMs were made based on the observed behavior, narratives, and self reports that more or less reflected the theorized attachment styles and subsequent behaviors. These findings are also supported by Rothbard and Shaver’s (1994) literature review corroborating the stability of attachment across the life span. Grossman et al. found a few studies suggesting that difficult life events and severe family stressors impinge on the stability of attachment qualities by possibly altering the consistency of childcare and the status of the caregiver–child attachment relationship. However, attachment qualities were found to be relatively stable when these factors were controlled statistically.
Different Ways of Measuring Attachment

Crowell, Fraley, and Shaver (1999) reviewed adolescent and adult attachment measures and divided them into two categories: interview and self-report. The characteristics of each measure are delineated in Appendix A. Of the two interview measures, Main, Kaplan, and Cassidy (1985) Adult attachment Interview (AAI) was the seminal study to retrospectively tap the mental representations (or perceptions) of an adult’s childhood attachment designation. The study by Main et al. showed that adult attachment types are consistent with their attachment category measured in childhood. The importance of Main and colleagues’ study is that it indicated that attachment representations, which are viewed as an IWMs, can be assessed retrospectively.

Because the interview method of assessing attachment in adults was costly and required time and training to conduct, there was a flurry among researchers to develop self-report measures. Hazen and Shaver’s (1987) seminal 3-item forced-choice self-report measure assessed romantic attachment in couple dyads. Because of psychometric issues in that study, N. L. Collins and Read (1990) developed the Adult Attachment Scale (AAS) by adapting Hazen and Shaver’s (1987) measure to an 18-item self-report Likert type questionnaire. Additional self-report measures (see Appendix A) were developed to study other types of populations (e.g., clinical samples, adults) and relationship dyads (e.g., parent–adolescent and peer–adolescent), as well as to better understand attachment’s role in personality and identity development.

To determine which self-report studies were the most reliable to date, Reese, Kieffer, and Briggs (2002) conducted a reliability and generalization meta-analytic study on attachment measures that they selected from measures developed between 1979 and 2001. The studies Reese
et al. considered superior among those they reviewed are represented in Appendix A. The subscales of the Inventory of Parent and Peer Attachment (IPPA) and the Parental Attachment Questionnaire (PAQ) generated the most reliable scores across the studies they analyzed.

Present Study’s Method of Measuring Attachment

Armsden and Greenberg’s (1987) IPPA is the measure of attachment selected for use in the present study for several reasons. First, as shown in Appendix A, the IPPA is the only Ainsworth-based (1973) self-report instrument that taps a late adolescent’s current perceptions’ of his or her parental and peer relationships. Although the adolescents may live away from home, the adolescents’ attachment to parents has been shown to remain reasonably stable while they develop new peer relationships (Armsden & Greenberg, 1987; W. A. Collins, 1997; Fraley & Davis, 1997). Second, the IPPA measures attachment perceptions. As noted earlier, attachment perceptions are a representation of the IWM from which attachment security or insecurity is assigned (Main et al., 1985). Thus, the IPPA is reflective of attachment theory’s constructs. Finally, the IPPA has minimal limitations, strong reliability and validity when compared to other measures, and is weakly correlated with socioeconomic status (SES) and parental education.

Social Cognitive Theory and Mental Models for Religious Coping

Social Cognitive Theory’s Concept of Reciprocal Determinism’s Relation to the Development of Mental Models for Religious Coping

Bandura (1986) explains behavior as having a similar dynamic interchange to that put forth by Pargament (1997) and Lazarus and Folkman (1984), but uses the term Reciprocal Determinism (Bandura, 1986, p. 22). Bandura defines reciprocal determinism as a triadic, bidirectional, and dynamic interaction between the environment, person factors, and one’s
behavior. In this process, symbols are patterned that serve as a mechanism for the development of cognitions in the form of thoughts, feelings, attitudes, perceptions, and beliefs. The development of these symbols and associated cognitions is heavily influenced by the ongoing reciprocating interactions between the behavior of a person and others (i.e., parents, peers) in his or her environment.

When cognitions are religious in nature, they are present as one of the person factors that could become part of the religious coping process (Pargament, 1997) by influencing behavior in response to a problem in the environment that requires coping. Hence, in the context of reciprocal determinism (Bandura, 1986), a person’s religious coping cognitions are present as a result of the triadic, bidirectional interactions among and between the behaviors (i.e., religious coping) of a person and others (i.e., parents and peers) in his or her environment. Because of the bidirectional nature of the triad of person, behavior, and environment, SCT would predict that a person’s religious coping cognitions would likely be influenced by their parents and peers, because the parents and peers are reciprocally interacting with the individual. There are two explanations for how this might occur.

Explanation 1: Social Cognitive Theory’s Concept of Vicarious Learning and Mental Models for Religious Coping

Vicarious learning occurs when cognitive skills and new behavior patterns are acquired by observing the behavior of others (Bandura, 1986). As applied to religious coping, when the observed behaviors are religious in nature, the observer forms religious cognitions and symbols that represent his or her developing repertoire of religious thoughts, beliefs, feelings, and judgments about the observed religious behavior, the situation, and the environment in which it occurred. These are cognitively stored as an option for religious coping at a later time.
Also vicariously encoded as symbols and cognitions (Bandura, 1986) related to religious coping are the observed risks and benefits of the behavior: the age, sex, race, and background of the model, similarities to the model, and the degree to which the model is admired. In general, the models most available to late adolescents are parents and close friends, because these are the people with whom adolescents typically spend the most time. Hence, it is the above characteristics that influence the likelihood that an adolescent, as an observer of religious coping, will perform the vicariously encoded religious coping behaviors at a later time, given his or her incentive and ability to perform such behavior.

**Explanation 2: Social Cognitive Theory’s Concept of Self-Efficacy and Mental Models for Religious Coping**

Self-efficacy is a perceived person factor of one’s impression of his or her capability to manage behavior vis-à-vis environmental stress in order to achieve desired results (Bandura, 1986, 1997). One source of self-efficacy is vicariously acquired symbols, thoughts, feelings, and beliefs (described above) that form throughout life as a result of a person’s social experiences with family and friends (Bandura, 1989b; Bugental & Johnston, 2000). These cognitions are subject to new interpretations as they fluctuate within the exchanges of a person’s bidirectional interactions with others (i.e., parents, peers) in the triadic person, behavior, and environment setting.

Bandura (1996) viewed “perceived self efficacy … as a central self-regulatory mechanism of human agency” (p. 51). Bandura (2001) further refers to self-efficacy as “a working model of the world that enables people to achieve desired outcomes and avoid untoward ones” (p. 3). So, perceived self-efficacy in a late adolescent’s working model of the world represents his or her degree of confidence to cope (Jerusalem & Schwarzer, 1999) with assorted
environmental threats and challenges associated with achievement, social and intimate relationships, adjustment to new environments and routines, and other developmental tasks (Allen & Land, 1999) that require the judicious execution of coping behaviors concomitantly with affect regulation (Lazarus & Folkman, 1984). As such, a person’s perceived self-efficacy (Bandura, 1996) is a mental representation of a person’s ability to cope and reflects aspects of Bowlby’s (1969/1982) concept of the IWM that develops in relationship with one’s primary caretaker.

Hence, SCT’s concept of self-efficacy suggests that high levels of self-efficacy would be consistent with high levels of confidence in coping (Bandura, 1989a; Bandura, 1992). Likewise, in relation to religious coping, SCT suggests that high levels of self-efficacy would predict higher levels of confidence to religiously cope, given the presence of religious coping cognitions and incentives to cope religiously. Finally, with respect to attachment theory, high levels of perceived self-efficacy suggest an IWM with mental representations consistent with that of secure attachment.

*The Integration of Attachment, SCT, and Religious Coping*

To draw comparisons, both Bandura’s (1986) SCT and Bowlby’s (1969/1982) attachment theory are based on socialization experiences. For example, Bandura’s SCT proposes triadic bidirectional processes that include parent–child interactions, and Bowlby’s attachment theory focuses on the reciprocal processes between mother and child. Additionally, Bandura’s SCT proposes the development of mental symbols and cognitions as a result of the triadic socialization experiences, and Bowlby proposes the formation of internal working models that result from the mother–child relational experiences. Finally, Bandura (2001) argues for mental models that affect self-efficacy levels and promote perceptions of coping abilities. Likewise,
Bowlby (1969/1982) puts forth internal working models that also promote perceptions of coping abilities. As discussed earlier, when these models contain cognitions and symbols of a religious nature, then perceptions of religious coping abilities are possible. Overall, both SCT (Bandura, 1986) and attachment theory (Bowlby, 1969/1982) posit the interplay of socialization processes that shape cognitions and mental models that later on could influence perceptions of coping abilities, both secular and religious.

Recently, Kirkpatrick (1992, 2005) has proposed two hypotheses linking attachment theory to the psychology of religion. One of the hypotheses, the correspondence hypothesis, proposes that because those with secure childhood attachments tend to maintain childhood mental models, they are more likely to develop a relationship with God that reflects those secure mental models. The secure mental models or IWMs are thought to serve as a mechanism for the correspondence between a person’s secure parental attachment and his or her attachment to God. In relation to religious coping, attachment theory would predict that if the attachment figure to whom the child is securely attached is religious and engages in religious coping, then the child’s internal working model for coping will also reflect the parents religious coping.

Later, Granqvist (2002a) expanded Kirkpatrick’s (1992) correspondence hypothesis creating a two-level hypothesis to account for findings related to both socialization and attachment processes. The first level, referred to as socialized correspondence, supports socialization as the primary mechanism for the transfer of parental standards involving religious symbols, cognitions, and beliefs (Granqvist, 2002a). It is consistent with Bandura’s (1986) principle of vicarious learning where through the child’s socialization experiences in the context of the parent’s religious coping the child develops a cognitive framework, in this case including the parents’ religious coping, to tap at a later time for his or her own religious coping.
The second level, described as the IWM level (Granqvist, 2002a), further supports the integration of socialization processes but from an attachment perspective similar to Kirkpatrick’s (1992) initial correspondence hypothesis. The second level proposes that a secure IWM, derived through a secure attachment to one’s parent, is the mechanism for developing a secure attachment to God later in life (Granqvist, 2002a). How might this second level of Granqvist’s correspondence hypothesis be applied to a religious coping correspondence between a parent and child?

A secure IWM (Bowlby, 1969/1982) or mental model (Bandura, 1986) includes the perception of one’s ability or sense of self-efficacy to carry out a coping strategy. This developing sense of self-efficacy is integrated into a person’s IWM through the reciprocal mother–child exchanges that distinguish a secure attachment relationship. It is here that one’s perceptions of self-efficacy, derived from the secure attachment relationship and rooted in the secure IWM reflecting that relationship, promote coping to meet future challenges. If one’s IWM (derived from secure attachment) includes vicariously learned religious coping components, then the stage is set for religious coping to occur as described in the first level of this hypothesis. At the second level, secure attachment serves as a mechanism to further enhance the likelihood of a correspondence between parent and child religious coping by promoting an increased sense of self-efficacy to cope religiously.

In sum, during socialization experiences, observations of parental religious coping may be integrated into a person’s IWM and then used later for religious coping. However, when there is a secure attachment to that parent, one’s increased sense of self-efficacy, due to the attachment relationship, may further enhance the likelihood and intensity of religious coping.
Evidence Implicating Adolescent–Parent and Adolescent–Friend Religious Coping Correspondence

By looking at the relationship of attachment and religious variables in previous studies, some implications can be made in regards to religious coping correspondences between attachment dyads (i.e., parent/adolescent, adolescent/friend) and IWMs (see Appendix B). Belavich and Pargament (2002) examined associations between attachment to God and spiritual coping when a loved one underwent surgery. The investigators found that higher levels of secure attachment to God were related to higher levels of collaboration with God and lower levels of distance from God. Collaborative interactions and experiencing less distance suggests secure attachment behaviors (Bowlby, 1969/1982) that could be part of the participant’s IWM for religious coping. However the study did not assess the parent’s coping as an influence on the adult’s coping, or the adult’s attachment to his or her parents, but the study does link attachment, in this case to God, with collaborative religious coping.

Granqvist (2005), in an attempt to link attachment and religious coping, found that those adults with more secure parental attachments tended to be associated with low levels of religious coping. This effect was even stronger if the parents were highly religious. Although, this may seem to go against attachment theory’s predictions, an earlier study (Granqvist, 2002b) revealed that adolescents with secure attachments to their parents tend to have smaller fluctuations of religious change over time. Granqvist’s explanation was that those with secure attachments may not need sweeping religious changes to cope, because they have adopted their parents’ religious and secular values and incorporated them into their IWMs. Indeed, smaller fluctuations for securely attached people could translate to fewer crises than experienced by people with IWMs that represent insecure attachment. People with secure attachment histories may have a more
diverse cognitive coping repertoire, religious and/or secular, when compared to that of people with insecure attachment histories. Furthermore, considering the higher levels of self-efficacy proposed by Bandura (1986), people who are securely attached may be able to more readily apply effective coping strategies to solve a problem before the problem reaches critical proportions. Measuring religious coping for people with secure attachment histories might be more effective vis-à-vis the more critical stressful situations that hold meaning for them.

Neither of the above two studies (Granqvist, 2002b, 2005) included a stress measure. When testing secure populations, using personally relevant stressors on which the participant reflects about the use of religious coping could help them to recall situations when he or she was highly stressed and may have coped religiously. For instance, Byrd and Boe (2001), studying two dimensions of insecurity and its relation to prayer in college students, had college students complete a student stress scale. The researchers found that the students with lower levels of avoidance in relationship to God engaged in prayer more often and that this effect was stronger during times of stress. Low levels of avoidance suggest higher levels of security (Bowlby, 1969/1982), although security was not measured in this study. The stress measure could have provided a personally relevant mental context in which to tap the students’ levels of religious coping in the form of prayer.

Finally, a clever study by Birgegard and Granqvist (2004) implicates a religious coping correspondence associated with attachment dyads. Birgegard and Granqvist activated the attachment system in three controlled experiments using subliminal stimulation. All three experiments found that individuals with a secure attachment history were more likely to turn to God when stressed, whereas individuals with an insecure attachment history were more likely to turn away from God. Although, this study supports the correspondence hypothesis that predicts a
correspondence between attachment to parents and to God, it also suggests possible
correspondences between parent and child for religious coping because turning to God could
provide a pathway for religious coping to be implemented. The authors also concluded that the
three experiments support the participants’ mental correspondence of an IWM of parents and
God. The IWM derived from the parental attachment relationship and that serves as a template
for attachment to God could be part of a broader template for religious coping.

Overall, the above studies do not focus specifically on correspondences of religious
coping in parent/adolescent and adolescent/friend attachment dyads. Only one study used college
students as participants, and that study suggests a link between attachment to God and prayer, a
form of religious coping. Also, studies comparing parent/adolescent and adolescent/friend
attachment dyads for their relationship to religious coping are limited. Late adolescence is a time
of adjustment, whether one enters the phase of life securely or insecurely attached. A relevant
question concerns whether there are correspondences between one’s own religious coping and
the religious coping of one’s parents and friends during this transitional developmental period.

Studies of the Concordance Between Parent and Adolescent Attitudes,
Including Religious Attitudes

Historically, the social climate of the 1960s spirited studies comparing adolescent’s
attitudes about social issues with the actual and perceived social attitudes of their parents and
their friends in an attempt to understand the then titled “generation gap” (Hunsberger, 1985;
Lerner, Karson, Meisels, & Knapp, 1975; Lerner & Knapp, 1975). Actual measurements involve
questioning a person (e.g., survey, questionnaire, and interview) about his or her own attitudes.
Perceived measurements involve questioning a person about his or her perceptions of another
person’s (e.g., friend or close relative) attitudes. Although researchers sampled different
populations and hypothesized different sorts of questions depending on the topic and theoretical approach, the purpose of such studies could be viewed as seeking to answer a classic question in social psychology: *to what extent does one person influence the behaviors or orientations of another* (Acock & Bengtson, 1980, p. 501)?

The general finding among the early studies was that other peoples’ *actual* attitudes have less affect on a target person’s attitudes than the target person’s *perceptions* of other peoples’ attitudes (Acock & Bengtson, 1980). Thus, early studies found higher correlations between a person’s own attitudes and his or her perceptions of another person’s attitudes (perceived/actual correlations) than for the correlations between the actual attitudes of the two people (actual/actual correlations).

For example, Lerner and Knapp (1975) reported nonsignificant actual/actual correlations for the actual attitudes about contemporary society (e.g., politics, morality, racial issues, gender roles) between adolescents and their mothers ($r = .13$) and fathers ($r = .07$), and significant perceived/actual correlations for the adolescents’ perceptions of their mothers and fathers attitudes with the adolescents’ actual attitudes (mother: $r = .33$; father: $r = .28$).

A later study (Breen, 1991) also found low levels of actual/actual agreement about childrearing attitudes between children and their mothers and fathers and moderate to high levels of perceived/actual agreement when correlating children’s perceptions of their mothers’ and fathers’ attitudes with the children’s actual attitudes (mother: $r$’s range from .20 to .64; father: $r$’s range from .22 to .51; $p$’s < .004 [with Bonferroni correction]).

Turning to studies involving perceived/actual and actual/actual correlations for topics that are religious in nature, Acock and Bengtson (1980) found higher perceived/actual correlations between children’s perceptions of their parents’ attitudes and the children’s own attitudes in
response to Biblical descriptions of God than for actual/actual parent and child correlations (child perceived mother/actual child: $\beta = .31^*$; child perceived father/actual child: $\beta = .18^*$; actual mother/actual child: $\beta = .22^*$; actual father/actual child: $\beta = -.02$; *coefficients are more than two times their own standard error).

Finally, Okagaki and Bevis’s (1999) study on the transmission of religious values between parents and daughters found higher perceived/actual correlations for daughters’ perceptions of parents’ beliefs and daughters’ own beliefs when compared to the actual beliefs of all dyads (daughters’ perceived mother/actual daughter: $r$’s range from .75 to .80; daughters’ perceived father/actual daughter: $r$’s range from .42 to .59; actual mother/actual daughter: $r$’s range from .43 to .63; actual father/actual daughter: $r$’s range from .34 to .47; $p$’s range from less than .0001 to less than .05).

One might ask why the correlations between adolescents’ perceptions of their parents’ attitudes and the adolescents’ own attitudes would be higher when compared to the actual attitudes of both the adolescent and the parent. First, the adolescent may be striving for consistency with the parent and thus perceive the parent as being more similar than might in reality be the case. Indeed, Lerner and Knapp (1975) presented such an explanation and noted that it points to the importance of the cognitive and emotional influence of intrafamilial attitudes. SCT suggests that cognitive mental models form across time and might include perceived evaluations about other people’s beliefs and attitudes especially if those people are perceived as attractive, likable, and emotionally important in ones’ life. Again, these mental models could contain perceptions that are not in reality the case but are perceived as valid.

In sum, (a) low to moderate correlations have generally been found when comparing actual attitudes between parents and children, (b) higher correlations have resulted for
perceived/actual pairings than for actual/actual pairings, and (c) higher correlations have been associated with religious oriented topics. Accordingly, the present study compared correlations of the actual religious coping of students’, parents, and friends’ (actual/actual correlations) with correlations of the students’ perceptions of their parents’ and friends’ religious coping and that students’ own (or actual) religious coping (perceived/actual correlations).

Both attachment theory (Bowlby, 1969/1982) and social cognitive theory (Bandura, 1986) are based on internalized mechanisms called IWMs or mental models. It is assumed that the content of these mental models is expressed later in life as one’s perceptions about their social world and their significant relationships in it. When designing a questionnaire for a study, it is these perceptions that researchers want to elicit from the study’s participants. In fact, most of the studies described in this paper, except for the early observational studies by Ainsworth (1973) and Ainsworth et al. (1978), involve results based on the measurement of peoples’ perceptions. Similarly, many of the studies in the psychology of religion and coping are predominantly the measurement of perceptions (Pargament, 1997). The present study included measures of actual versus perceived religious coping because, heretofore, few studies have compared the strengths of these two types of measures as predictors for religious coping.

For the present study the above question is important. If an adolescent’s perceptions of religious coping of a parent and a friend are a better predictor of that adolescent’s own religious coping compared to the actual religious coping of the parent and friend, then implications could be considered for religious coping cognitions as part of the content of that adolescent’s IWM. If this is so, the importance of an adolescent’s attachment relationships, particularly to parents and close friends, would be underscored for their role in the development of mental models for religious coping.
The Present Study

Research Questions

Social Correspondence

The first research question is the social correspondence hypotheses (Granqvist, 2002a) based on social learning theory’s concept of modeling (Bandura, 1986), which posits that behavior is learned vicariously through social experiences that build cognitive models of behavior that could be tapped at a later time. Therefore, the first research question asks to what degree is there correspondence between the religious coping of a late adolescent and the religious coping of his or her parents. Likewise, to what degree is there correspondence between the religious coping of the same late adolescent and the religious coping of his or her close friend. It is hypothesized that the actual and perceived religious coping of the parent and of the friend will be related to the religious coping of the adolescent. Based on literature in other areas (Acock & Bengtson, 1980; Lerner et al., 1975; L. Thompson, Clark, & Gunn, 1985) correspondence for levels of perceived parent and friend religious coping will be expected to be higher than correspondence for actual parent and friend religious coping.

Attachment as a Moderator of the Relation Between Parent/Friend Religious Coping and Adolescent Religious Coping

The second research question is based on attachment theory’s concept of an IWM (Bowlby, 1969/1982), which is a representational model of the self and how the world relationally works. It is developed in a relationship with someone to whom a person becomes emotionally attached such as the person’s mother or primary caretaker. Bowlby posited that the IWM serves as a mechanism for developing future attachment relationships. The second research
question asks: to what degree do late adolescents’ quality of attachment to their parents and their friends moderate the strength of the relation between the religious coping of their parents/friends to their own religious coping? Baron and Kenny (1986) define moderator as a qualitative or quantitative variable affecting the strength of a relation between predictor and criterion variables. It is hypothesized that higher levels of religious coping correspondence will be found for those adolescents who have higher as opposed to lower levels of secure attachment to their parent/friend.

Specific Hypotheses

Hypothesis 1: The actual and perceived religious coping levels of the parent/friend will be related to the religious coping levels of the adolescent, but concordance levels of perceived religious coping will be expected to be higher than concordance for actual religious coping.

1a. Hypotheses for Adolescents’ and Parents’ Religious Coping: Adolescents’ actual (perceived) positive (negative) religious coping will positively correlate with parents’ actual (perceived) positive (negative) religious coping.

1b. Hypotheses for Adolescents’ and Friends’ Religious Coping: Adolescents’ actual (perceived) positive (negative) religious coping will positively correlate with friends’ actual (perceived) positive (negative) religious coping.

Hypothesis 2: Higher levels of religious coping concordance will be found for those adolescents with higher as opposed to lower levels of secure attachment to their parent and friend.

2a. Adolescent–Parent Hypotheses for Parent Religious Coping: The degree of adolescent secure (insecure) attachment will moderate the relation between actual parent (adolescent perceived parent) positive (negative) religious coping and the adolescent’s own positive (negative) religious coping. That is, for adolescents with
higher as opposed to lower levels of secure attachment, there will be a stronger correspondence in religious coping.

2b. Adolescent–Friend Hypotheses for Friend Religious Coping: The degree of adolescent secure (insecure) attachment will moderate the relation between actual friend (adolescent perceived friend) positive (negative) religious coping and the adolescent’s own positive (negative) religious coping. That is, for adolescents with higher as opposed to lower levels of secure attachment, there will be a stronger correspondence in religious coping.
CHAPTER II

METHODS

Sample

One hundred forty-three (39 males, 104 females) introductory psychology students (Freshman, \( n = 69 \); Sophomore, \( n = 53 \); Junior \( n = 18 \); Senior, \( n = 3 \)) from Bowling Green State University volunteered to participate in this study. The college-age (\( M = 19.23, \ SD = 1.63 \)) students were chiefly Caucasian (\( n = 111 \)) from intact families (\( n = 103 \)) mostly representing Protestant (\( n = 63 \)) or Catholic (\( n = 43 \)) religious affiliations. The mean level of education for the students’ parents was 1 to 2 years of college education.

Procedures

With the permission of the instructor, the students were recruited from a large introductory psychology class. Students were assigned experimental credit for participating in the study and the students’ names were entered in a raffle for a $25 gift certificate to a local department store. Students who chose not to participate in the study could choose to do an alternative project and receive experimental credit following its completion. Appendix C shows the consent form that includes a description of the raffle as an incentive for participation in the study.

After reviewing the informed consent statement for project participation, the volunteer participants were asked to complete a survey booklet. After providing demographic information (e.g., age, sex, and parent’s education), students were asked to (a) nominate one parent and one friend with whom they spend the most time, (b) complete a survey about his or her perceived relationship with that parent and friend, and (c) complete a survey about his or her perception of
the parent’s and friend’s religious ways of coping. In addition, students completed a checklist indicating (a) the stressful events they themselves had experienced in the past year and (b) the degree that their own religious faith was central to coping with each experienced event. Next, the students completed a survey about their religious coping during stressful events and were asked to answer questions about what they do to cope with negative events. Finally, students were asked to address a letter and complete an address label to their nominated parent and friend. Upon completion of the survey, the students were assigned experimental credit and given a raffle entry form to complete and deposit in the raffle box for the drawing when data collection was completed. Appendix D shows the survey completed by the student and Appendices E and F show the letters and consent forms sent to the students’ parent and friend, respectively.

The researcher mailed the survey packets to selected parents and friends. Similar to the surveys described above for the student, the parents and friends were asked to complete (a) questions about demographic information, (b) the events and religious coping check list, and (c) a survey about their religious coping in relation to stressful events. The parent and friend were asked to return the completed survey to the researcher in the self-addressed stamped envelope included in the survey packet. Appendix F shows the parents’ and friends’ consent form and Appendices G and H show the surveys completed by that parent and friend, respectively.

Measures

Demographic and Background Information

The demographic and background information included the following variables: the participants’ sex, age, race, marital status, year in school, religious affiliation, and mother’s and father’s highest level of education (or the participants’ level of education if the parent was
completing the survey). The participants also reported on three questions about the general importance that they consider religion to have in their lives (global religiousness; discussed in more detail later).

The sample sizes for some of the categories within three of the demographic variables were too small to include in the analyses as a single category. First, because the sample was 78% Caucasian \( (n = 111) \), Black \( (n = 21, 15\%) \), Hispanic \( (n = 3, 2\%) \), and other racial designations \( (n = 8, 5\%) \) and were combined into one racial category titled “other” \( (n = 32, 22\%) \). Second, because 72% of the sample came from intact \( (n = 103) \) families, divorced \( (n = 22, 15\% \) of the sample), single \( (n = 14, 10\% \) of the sample), and widowed \( (n = 4, 3\% \) of the sample) were combined into a one category titled “not intact” \( (n = 40, 28\% \) of the sample). Third, the sample was represented by Protestant \( (n = 63, 44.1\%) \), Catholic \( (n = 43, 30.1\%) \), Jewish \( (n = 1, 0.7\%) \), and “other” religious affiliations \( (n = 11, 7.7\%) \). The remaining participants acknowledged no religious affiliation \( (n = 23, 16.5\%) \) and included two participants \( (1.3\%) \) who did not respond to the religious affiliation item. For regression equations to be reported later, two religious affiliation groups were formed: any affiliation and no affiliation (more details will be provided later).

The categories within two of the demographic variables were moderately to highly correlated with each other. The mothers’ and fathers’ levels of education (Mother: \( M = 5.26, SD = 1.12, n = 143 \); Father: \( M = 5.33, SD = 1.18, n = 141 \); range = 1 [seventh grade]–7 [graduate school]) were found to be correlated .43 \( (p < .01) \). Therefore, a single variable titled “parent education” was created by adding the scores on both Mother’s and Father’s level of education and then computing a mean. Finally, the three global religious variables were: the importance of religion in life (importance: scale = 1–5, 1 = not important, 5 = extremely important), the
frequency of prayer outside of religious services (prayer: scale = 1–8, 1 = never, 8 = more than once a week), and the frequency of attending religious services (attendance: scale = 1–9, 1 = never, 9 = several times a week). These variables were correlated as follows: attendance with prayer, \( r = .65 \) (\( p < .01 \)), attendance with importance \( r = .78 \) (\( p < .01 \)), and prayer with importance \( r = .74 \) (\( p < .01 \)); a global religious score was calculated by standardizing the scores on the three religious demographic variables, combining the scores, and then computing a mean.

**Inventory of Parent and Peer Attachment**

The Inventory of Parent and Peer Attachment (IPPA) was developed by Armsden and Greenberg (1987) and is based on the theoretical formulations of Bowlby (1969/1982) involving a person’s behavior, feelings, and expectations toward attachment figures. (For the present study, the term “friend” was used in place of the word “peer” except for the description of the IPPA in this section.)

Participants completed the IPPA (Armsden & Greenberg, 1987) twice. The first time they assessed the student’s perception of their attachment quality to their one parent with whom they spend the most time. The second time they assessed the student’s perception of their attachment quality to their peer (friend) with whom they spend the most time.

Normative data were collected for the inventory based on two samples \( n = 93 \) and \( n = 86 \), respectively) of middle-class undergraduate students who were taking psychology course work that required participation in research for an additional credit at the University of Washington (Armsden & Greenberg, 1987). Examples of questions on the parent version of the IPPA were “I tell my parent about my problems and troubles” (Trust), “My parent helps me to understand myself better,” (Communication), and “I wish I had a different parent” (Alienation). Examples of questions on the peer (friend) version of the IPPA were “My friend listens to what I
have to say” (Trust), “My friend encourages me to talk about my difficulties” (Communication), and “I feel the need to be in touch with my friends more often” (Alienation). The students responded by rating how true each statement was for them based on a 5-point Likert scale. Categories of response were Almost Never or Never, Seldom, Sometimes, Often, and Almost Always or Always. The reverse scored items were recoded so that high scores (rather than low scores) reflect higher levels of attachment when performing the analyses.

Factor analyses using Varimax rotation of the original 60-item inventory resulted in three parent scales and three peer (friend) scales (Armsden & Greenberg, 1987). Factor loadings for parent items on the appropriate factor (i.e., trust, communication, alienation) ranged from 0.45 to 0.74, and for peer (friend) items from 0.45 to 0.75. Each scale had high internal consistency (Cronbach’s alpha). The parent scales were Trust (10 items; alpha = .91), Communication (10 items; alpha = .91), and Alienation (8 items; alpha = .86).

Comparably high internal consistencies were found for the parent scales in the present study and were as follows: Trust, alpha = .89; Communication, alpha = .83; and Alienation, alpha = .89. Correlations among the three parent attachment subscales were as follows: communication and trust, $r = .66 \ (p < .01)$; communication and alienation, $r = .67 \ (p < .01)$; and trust and alienation, $r = .69 \ (p < .01)$. An Attachment to Parent Total score was computed for the present study by adding the scores on the IPPA subscales (Trust, Communication, and Alienation) and then computing the mean. The internal consistency for Attachment to Parent Total was also high (alpha = .94).

The IPPA’s (Armsden & Greenberg, 1987) peer (friend) subscales were similar to the parent subscales. Armsden and Greenberg rephrased the questions to be reflective of peer (friend) perceptions. The peer (friend) subscales had high internal consistency as well. The peer
(friend) scales were Trust (10 items; alpha = .91), Communication (8 items; alpha = .87), and Alienation (7 items; alpha = .72).

The internal consistencies for the peer (friend) scales in the present study were similar to those found in Armsden and Greenberg’s original study and were as follows: Trust, alpha = .91; Communication, alpha = .91; and Alienation, alpha = .66. The internal consistency on the Alienation scale was improved by dropping one item. That item was “I feel the need to be in touch with my friend more often; dropping it from the Alienation scale resulted in a Cronbach’s alpha of .80. The correlations in the present study among the IPPA’s (Armsden & Greenberg, 1987) three peer (friend) attachment subscales were as follows: communication and trust, \( r = .73 \) \((p < .01)\); communication and alienation, \( r = .39 \) \((p < .01)\); and trust and alienation, \( r = .67 \) \((p < .01)\). An Attachment to Friend Total score was computed for the present study in the same way that it was for the parent scales, by adding the scores on the three subscales and then computing a mean. The internal consistency for Attachment to Friend Total was high (alpha = .92).

Armsden and Greenberg (1987) found that the quality of parent and peer (friend) attachment was related to measures of well-being and affective status. Multiple regression analyses revealed that parent and peer (friend) attachment together accounted for 37% of the variance in Self-Esteem and 22% of the variance in Life-Satisfaction scores. Parent and peer (friend) attachment also were found together to contribute between 7% and 20% of the variance in affective-status measures, especially Depression/Anxiety and Resentment/Alienation scores. Finally, 3-week test–retest reliabilities on a separate sample of college students (mean age = 20.1; \( n = 27 \)) were 0.93 for the parent attachment measure and 0.86 for the peer (friend) attachment measure.
Life Events and Religious Coping Checklist

The Life Events and Religious Coping Checklist was adapted for the present study from Johnson and McCutcheon’s (1980) checklist for use with children and adolescents and from Cullman’s (1995) list of religious coping items in relation to stressful events for college students. Likewise, a similar checklist was developed listing appropriate events for the parent participant. The purpose of the checklist was to elicit memories of stressful events the participant experienced within the past 12 months and to rate the degree that he or she considered religious faith as central to coping with the events (Maton, 1989).

Sample items were similar in nature but tailored to parent and late adolescent concerns for their respective checklists. For example, sample items from the student and friend checklist were *Your parents’ divorce,* and *Failing a course;* sample items from the parent checklist were *Death of a spouse* and *Trouble with in-laws.* To complete the Life Events and Religious Coping Checklist, the participant read a list of 30 possible stressful events and placed a check mark beside each event that he or she had experienced in the past 12 months. Then the participant rated each event on a 5-point Likert scale for the degree to which religion was central in coping with the event. The degree ratings were *Almost Never or Never, Seldom, Sometimes, Often,* and *Almost Always or Always.*

Three students (of *N* = 143) rated the degree to which religion was central in coping with all 30 events without indicating whether they experienced the event. Therefore, it seemed apparent to the researcher that the instructions were misunderstood by those students, so their data were considered to be missing for the stressful events measure. The mean total number of events acknowledged by students was *M* = 6.65 (*SD* = 4.45, *n* = 140). The mean total number of
events acknowledged by friends was $M = 6.74$ ($SD = 5.12, n = 59$). The mean total number of events acknowledged by parents was $M = 4.62$ ($SD = 2.61, n = 104$).

As noted, participants rated each event as to the degree (Not at all = 1, Somewhat = 2, Quite a bit = 3, A great deal = 4) religion was important in coping with the event. The students’ mean event religious coping importance was $M = 2.77$ ($SD = .59, n = 132$). The friends’ mean event religious coping importance was $M = 2.60$ ($SD = .60, n = 53$). The parents’ mean event religious coping importance was $M = 2.98$ ($SD = .67, n = 96$). These ratings suggested that participants used religion “sometimes” to “quite a bit” to cope with experienced events.

*The Brief Religious Coping Scale*

The 14-item Brief Religious Coping Scale (RCOPE; Pargament, Smith, et al., 1998) was used to examine the actual religious coping used by the student, parent, and friend, as well as to examine the students’ perceptions of religious coping used by their parent and friend. The Brief RCOPE was adapted from the full RCOPE (Pargament et al., 2000), a comprehensive measure of religious coping consisting of 21 five-item subscales. The full RCOPE was standardized on two samples: college students and hospital patients over 55 years of age.

Factor analysis using principal factors extraction and oblimin rotation revealed, as hypothesized, two factors that reflect positive and negative religious coping (Pargament et al., 2000). Seven items from each of the two factors were selected to form the Brief RCOPE (Pargament, Smith, et al., 1998). The items were selected based on criteria such as (a) items having the highest factor loadings, (b) items clearly loading onto only one factor, and (c) items representing each of the seven subscales of the full RCOPE (Pargament et al., 2000).

The positive religious coping items on the Brief RCOPE (Pargament, Smith, et al., 1998) were generated from the following seven scales of the full version (Pargament et al., 2000):
spiritual connection, seeking spiritual support, religious forgiveness, collaborative religious coping, benevolent religious appraisal, religious purification, and religious focus. Sample positive religious coping items were, “Looked for a stronger connection with God” and “I seek help from God in letting go of my anger.” Likewise, the negative items of the Brief RCOPE (Pargament, Smith, et al., 1998) were generated from the following five scales of the full version (Pargament et al., 2000): spiritual discontent, punishing God reappraisal, interpersonal religious discontent, demonic reappraisal, and reappraisal of God’s power. Sample negative religious coping items were, “Wondered whether God had abandoned me” and “I question the power of God.” The items on the Brief RCOPE were rated on a scale of 1–4 (1 = Not At All, 2 = Somewhat, 3 = Quite a Bit, 4 = A Great Deal).

The Brief RCOPE (Pargament, Smith, et al., 1998) had high internal consistency for the college student sample (positive scale’s Cronbach’s alpha = .90; negative scale’s Cronbach’s alpha = .87), and the positive religious coping scale had higher means and greater variance than the negative religious coping scale in the college student sample ($t(526) = 22.42, p < .001$).

In the present study, the positive and negative religious coping scales of the Brief RCOPE (Pargament, Smith, et al., 1998) were completed to assess the students’ own religious coping (e.g., actual student religious coping) and the students’ perceptions of the parents’ and friends’ religious coping. The Brief RCOPE had acceptable internal consistency for the student sample (actual student: positive scale’s Cronbach’s alpha = .95; negative scale’s Cronbach’s alpha = .64; student perceived parent: positive scale’s Cronbach’s alpha = .96; negative scale’s Cronbach’s alpha = .82; student perceived friend: positive scale’s Cronbach’s alpha = .97; negative scale’s Cronbach’s alpha = .83). Item 13 (I decide the devil makes things happen), an item on the actual student Brief RCOPE negative scale, was deleted following the reliability
computations because the deletion improved its internal consistency (with item 13, Cronbach’s alpha = .56; without item 13, Cronbach’s alpha = .64).

In the present study, the positive and negative scales of the Brief RCOPE were also completed to assess parents’ and friends’ actual religious coping. The Brief RCOPE also had acceptable internal consistency for the parent and friend participants (actual parent: positive scale’s Cronbach’s alpha = .92; negative scale’s Cronbach’s alpha = .66; actual friend: positive scale’s Cronbach’s alpha = .93; negative scale’s Cronbach’s alpha = .82). One item was deleted on the negative scales of the actual parent and the actual friend Brief RCOPE. On the actual parent negative scale, item 11 (I question God’s love for me) was deleted following the reliability computations because the deletion improved its internal consistency (with item 11 Cronbach’s alpha = .59; without item 11, Cronbach’s alpha = .66). On the actual friend negative scale item 13 (I decide the devil makes things happen) was also deleted in order to improve the internal consistency (with item 13, Cronbach’s alpha = .75; without item 13, Cronbach’s alpha = .82).

Confirmatory factor analysis (using LISREL VII) of the two Brief RCOPE (Pargament, Smith, et al., 1998) scales indicated a reasonable fit for the data and acceptable goodness of fit indices. Also, the positive and negative scales correlated as expected with other measures such as health and well-being. Positive religious coping was (a) modestly correlated with lower levels of psychosomatic symptomatology, (b) moderately correlated with greater stress-related growth, and (c) strongly related to better religious outcome. Negative religious coping was modestly correlated with (a) higher levels of emotional stress, (b) poorer physical health, and (c) higher levels of psychosomatic symptomatology.
CHAPTER III

RESULTS

Overview of Results

The first major part of the Results section will present the preliminary analyses. These analyses include t-tests, ANOVAs, and correlations to assess demographic differences in the major study variables (attachment and religious coping). T-tests examined differences in the major study variables based on gender, race, and parents’ marital status; ANOVAs examined differences in the major study variables based on religious affiliation categories; and correlations examined whether the students’ parents’ level of education, students’ stressful events, and global religiousness were related to the major study variables. Demographic variables found to be related to students’ religious coping were considered as covariates in the regression analyses to be described later.

Next, zero order correlations to assess the results for the concordance hypothesis will be presented. The concordance hypothesis states that the actual and perceived religious coping levels of the parent/friend will be related to the religious coping levels of the student; concordance levels for perceived parent/friend religious coping are expected to be higher than concordance for actual parent/friend religious coping.

Finally, results for the moderation hypothesis will be presented. The moderation hypothesis states that higher levels of religious coping concordance will be found for those students who are securely attached to their parent and friend. Specifically, four sets of hierarchical regressions will be presented predicting student actual positive and negative religious coping (separate equations for each of the following four predictions: actual and
perceived parent, actual and perceived friend) to examine whether attachment moderates the relation between actual/perceived parent/friend religious coping and student religious coping. In each set of regressions, demographic variables were entered into the first step. Next, parent or friend religious coping and parent or friend attachment were entered to examine the main effects of these variables on student religious coping. Attachment and religious coping predictors were mean centered, following the recommendations of Aiken and West (1991). Finally, in Step 3, the interaction term of actual/perceived parent/friend religious coping by parent/friend attachment was entered. Based on the results of Step 3, follow up analyses were computed investigating the relation between actual/perceived parent/friend religious coping and student religious coping for groups of students scoring high and low in secure attachment.

Preliminary Analyses

Table 1 presents the means, standard deviations, and the results of the independent samples t-tests that examined differences in the major study variables based on sex, parents’ marital status, and race. Table 2 presents the means, standard deviations, and results of the univariate analyses of variance that examined differences in the major study variables based on religious affiliation. These analyses were computed both for descriptive purposes and to determine which background variables should be controlled statistically in the regression analyses to be reported later. Specifically, background variables were considered for statistical control if they were correlated with the student religious coping variables.

In terms of descriptive information, Table 1 shows that the sample of students was moderately religious. Specifically, the mean positive religious coping was 2.50 and 2.51 (scale = 1–4) for males and females, respectively, indicating that they use positive religious coping “Somewhat” (representing the rating of “2”) to “Quite a Bit” (representing the rating of
### Table 1
**Independent Samples T-Tests: Relations of Sex, Parents’ Marital Status, and Race with the Major Study Variables**

<table>
<thead>
<tr>
<th></th>
<th>Sex</th>
<th>Parents’ Marital Status</th>
<th>Race</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Male</td>
<td>Female</td>
<td>Married</td>
</tr>
<tr>
<td></td>
<td>M</td>
<td>SD</td>
<td>M</td>
</tr>
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<td>0.87</td>
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<td></td>
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<td>1.23</td>
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<tr>
<td></td>
<td>Frequency Private Prayer</td>
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<td></td>
<td>Attend Church or Synagogue</td>
<td>4.60</td>
<td>2.36</td>
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<tr>
<td>Student Attachment</td>
<td>To Parent</td>
<td>4.00</td>
<td>0.57</td>
</tr>
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<td></td>
<td>To Friend</td>
<td>4.08</td>
<td>0.51</td>
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<td>Religious Coping</td>
<td>Actual Student Positive</td>
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<td></td>
<td>Actual Student Negative</td>
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<td>0.61</td>
</tr>
<tr>
<td></td>
<td>Actual Parent Positive</td>
<td>2.73</td>
<td>0.81</td>
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<td></td>
<td>Actual Parent Negative</td>
<td>1.32</td>
<td>0.49</td>
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<td></td>
<td>Perceived Parent Positive</td>
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<td>1.00</td>
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<td></td>
<td>Perceived Parent Negative</td>
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<td>Actual Friend Positive</td>
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<td></td>
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<td>1.02</td>
</tr>
<tr>
<td></td>
<td>Perceived Friend Negative</td>
<td>1.34</td>
<td>0.49</td>
</tr>
</tbody>
</table>

<sup>a</sup>Not Intact (includes single, widowed, divorced). <sup>b</sup>Other (includes Black, Hispanic, Asian American, other).

<sup>+</sup>p < .10. <sup>*</sup>p < .05. **p < .01.
Table 2
**Univariate Analyses of Variance: The Relation Between Religious Affiliation and the Major Study Variables**

<table>
<thead>
<tr>
<th>Religious Affiliation</th>
<th>Protestant</th>
<th>Catholic</th>
<th>Other</th>
<th>None</th>
<th>F-Statistic</th>
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<tr>
<td>SD</td>
<td>M</td>
<td>SD</td>
<td>M</td>
<td>SD</td>
<td>F</td>
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<td>Religious Background</td>
<td></td>
<td></td>
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<td></td>
<td></td>
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<tr>
<td>Variables</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Global Religiousness</td>
<td>0.33&lt;sup&gt;c&lt;/sup&gt; 0.78</td>
<td>0.18&lt;sup&gt;bc&lt;/sup&gt; 0.72</td>
<td>-0.26&lt;sup&gt;b&lt;/sup&gt; 1.00</td>
<td>-1.09&lt;sup&gt;a&lt;/sup&gt; 0.54</td>
<td>21.49**</td>
</tr>
<tr>
<td>Importance of Religion</td>
<td>3.67&lt;sup&gt;c&lt;/sup&gt; 1.05</td>
<td>3.30&lt;sup&gt;bc&lt;/sup&gt; 0.96</td>
<td>2.71&lt;sup&gt;b&lt;/sup&gt; 1.54</td>
<td>1.74&lt;sup&gt;a&lt;/sup&gt; 1.01</td>
<td>19.14**</td>
</tr>
<tr>
<td>Frequency Private Prayer</td>
<td>5.59&lt;sup&gt;bc&lt;/sup&gt; 2.1</td>
<td>5.30&lt;sup&gt;bc&lt;/sup&gt; 2.11</td>
<td>4.93&lt;sup&gt;b&lt;/sup&gt; 2.70</td>
<td>2.39&lt;sup&gt;a&lt;/sup&gt; 1.90</td>
<td>12.80**</td>
</tr>
<tr>
<td>Attend Church or Synagogue</td>
<td>5.40&lt;sup&gt;b&lt;/sup&gt; 2.12</td>
<td>5.28&lt;sup&gt;b&lt;/sup&gt; 2.11</td>
<td>3.57&lt;sup&gt;a&lt;/sup&gt; 2.50</td>
<td>2.00&lt;sup&gt;a&lt;/sup&gt; 1.04</td>
<td>18.65**</td>
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<tr>
<td>Student Attachment</td>
<td></td>
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<td></td>
</tr>
<tr>
<td>To Parent</td>
<td>4.02 0.71</td>
<td>4.10 0.46</td>
<td>4.11 0.46</td>
<td>3.94 0.52</td>
<td>0.48</td>
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<td>To Friend</td>
<td>4.36 0.44</td>
<td>4.15 0.54</td>
<td>4.26 0.44</td>
<td>4.20 0.55</td>
<td>1.77</td>
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<tr>
<td>Religious Coping</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Actual Student Positive</td>
<td>2.92&lt;sup&gt;b&lt;/sup&gt; 0.90</td>
<td>2.50&lt;sup&gt;b&lt;/sup&gt; 0.81</td>
<td>2.43&lt;sup&gt;b&lt;/sup&gt; 1.08</td>
<td>1.39&lt;sup&gt;a&lt;/sup&gt; 0.54</td>
<td>17.69**</td>
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<tr>
<td>Actual Student Negative</td>
<td>1.34 0.53</td>
<td>1.34 0.45</td>
<td>1.37 0.39</td>
<td>1.39 0.53</td>
<td>0.09</td>
</tr>
<tr>
<td>Actual Parent Positive</td>
<td>2.84&lt;sup&gt;c&lt;/sup&gt; 0.79</td>
<td>2.78&lt;sup&gt;bc&lt;/sup&gt; 0.74</td>
<td>2.13&lt;sup&gt;ab&lt;/sup&gt; 0.92</td>
<td>2.04&lt;sup&gt;b&lt;/sup&gt; 0.57</td>
<td>6.63**</td>
</tr>
<tr>
<td>Actual Parent Negative</td>
<td>1.23 0.35</td>
<td>1.16 0.25</td>
<td>1.29 0.35</td>
<td>1.44 0.55</td>
<td>2.32*</td>
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<tr>
<td>Perceived Parent Positive</td>
<td>2.86&lt;sup&gt;b&lt;/sup&gt; 0.86</td>
<td>2.73&lt;sup&gt;b&lt;/sup&gt; 0.90</td>
<td>2.72&lt;sup&gt;b&lt;/sup&gt; 1.24</td>
<td>1.75&lt;sup&gt;a&lt;/sup&gt; 0.71</td>
<td>9.06**</td>
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<td>Perceived Parent Negative</td>
<td>1.16 0.33</td>
<td>1.22 0.51</td>
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<tr>
<td>Actual Friend Positive</td>
<td>2.53&lt;sup&gt;ac&lt;/sup&gt; 0.68</td>
<td>2.35&lt;sup&gt;abc&lt;/sup&gt; 0.86</td>
<td>1.63&lt;sup&gt;ab&lt;/sup&gt; 0.97</td>
<td>1.87&lt;sup&gt;a&lt;/sup&gt; 0.51</td>
<td>3.50*</td>
</tr>
<tr>
<td>Actual Friend Negative</td>
<td>1.50 0.56</td>
<td>1.37 0.52</td>
<td>1.33 0.48</td>
<td>1.46 0.58</td>
<td>0.29</td>
</tr>
<tr>
<td>Perceived Friend Positive</td>
<td>2.59&lt;sup&gt;bc&lt;/sup&gt; 0.99</td>
<td>2.18&lt;sup&gt;bc&lt;/sup&gt; 0.84</td>
<td>2.20&lt;sup&gt;b&lt;/sup&gt; 1.00</td>
<td>1.53&lt;sup&gt;a&lt;/sup&gt; 0.57</td>
<td>7.51**</td>
</tr>
<tr>
<td>Perceived Friend Negative</td>
<td>1.30 0.46</td>
<td>1.33 0.57</td>
<td>1.38 0.41</td>
<td>1.22 0.45</td>
<td>0.35</td>
</tr>
</tbody>
</table>

**Note:** Means with the same superscript are not significantly different.

*<sup>p</sup> < .10. **<sup>p</sup> < .05. ***<sup>p</sup> < .01.

“3”). Table 1 also shows that the mean positive religious coping reported by parents and friends was similar. However, negative religious coping strategies were reported much less frequently by all sources (student, actual/perceived parent, and actual/perceived friend) and the means for these ranged from 1.17 to 1.47 (scale = 1–4) indicating “Not at all” (representing the rating of “1”) to “Somewhat” (representing the rating of “2”). Moderate levels of religiosity are also supported by students’ reported levels of importance of religion (Males: $M = 3.28$, Females: $M = 3.11$, $3 = “moderately important,”$ scale = 1–5), frequency of private prayer (Males: $M = 5.00$, Females: $M = 4.90$, $5 = “once a week,”$ scale = 1–8), and church attendance (Males: $M = 4.60$, Females: $M = 4.65$, $4 = “several times a year,”$ $5 = “once a month,”$ scale = 1–9). Finally, the
students appear to be relatively well adjusted in terms of their interpersonal relationships, reporting relatively high levels of attachment to parents (Males: $M = 4.00$, Females: $M = 4.06$, $4 = \text{“often true,” scale} = 1–5$) and friends (Males: $M = 4.08$, Females: $M = 4.33$, $4 = \text{“often true,”}$ $5 = \text{“almost always or always true,” scale} = 1–5$).

In regards to demographic differences, $t$-tests for sex differences revealed that females endorsed significantly higher levels of total attachment to friends when compared to males. $T$-tests also showed that students whose parents were married reported significantly higher levels of perceived friend positive religious coping than the students whose parents’ marital status was rated as “not intact,” but neither sex nor parents’ marital status was related to students’ religious coping. Finally, “other” racial designations reported significantly higher levels of student actual positive religious coping and perceived parent positive religious coping and only marginally higher levels of perceived friend positive religious coping when compared to Caucasians. Because race was related to student positive religious coping, it was included as a control variable in the regressions predicting student positive religious coping.

Table 2 presents the means, standard deviations, and $F$ statistics for the analyses of variance examining religious affiliation differences in the major study variables. Table 2 shows significant differences among the categories of religious affiliation in relation to the religious background variables (i.e., global religiousness total, importance of religion, frequency of prayer, church attendance). Also, the relations between religious affiliation and positive religious coping across sources (i.e., student, actual/perceived parent, actual/perceived friend) were significant. Table 2 also presents the results of post hoc pairwise comparisons to determine which religious affiliation groups are significantly different from each other in the major study variables. For the purposes of the present study, in particular identifying which demographic variables to control in
later analyses, the religious affiliation groups differed on student positive religious coping such that all affiliated groups were not different from each other, but did use more positive religious coping than the nonaffiliated group. Thus, in the regressions to be reported later, the affiliated groups were combined into a single category, yielding a dichotomous variable for religious affiliation (1 = any, 2 = none).

Table 3 presents the correlations of the continuous demographic background variables with the major study variables. The correlations show that the students’ positive religious coping and perceptions of their friends’ positive religious coping were significantly correlated with the students’ age; that is, older students reported higher levels of actual self and perceived friend positive religious coping. The students’ negative religious coping, parents’ actual and perceived negative religious coping and the friends’ actual negative and perceived positive religious coping were significantly correlated with the parents’ level of education; that is, students of more educated parents reported lower levels of negative religious coping and of perceived parent negative and perceived friend positive religious coping. Global religiousness was found to be significantly associated with the students’, parents’, and friends’ actual and perceived positive religious coping levels as well as the students’ attachment to his or her parent; that is, the higher the student’s global religiousness, the higher were his or her levels of actual, perceived parent, and perceived friend positive religious coping and attachment to his or her parent. Because age and global religiousness were related to students’ positive religious coping, they were included as control variables in the regressions predicting student positive religious coping. Because parent education was related to student negative religious coping, it was included as a control variable in the regression predicting student negative religious coping.
Table 3
Correlations of the Continuous Demographic Background Variables with the Major Study Variables

<table>
<thead>
<tr>
<th></th>
<th>Student Attachment</th>
<th>Global Religiousness^c</th>
<th>Student Stressful Event Measure</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Age^a</td>
<td>Parent Education^b</td>
<td>Student</td>
</tr>
<tr>
<td>Student Attachment To Parent</td>
<td>0.02</td>
<td>0.10</td>
<td>0.22**</td>
</tr>
<tr>
<td>To Friend</td>
<td>−0.13</td>
<td>−0.03</td>
<td>0.12</td>
</tr>
</tbody>
</table>

Religious Coping

| Actual Student Positive  | 0.21^*             | 0.01                   | 0.83**  | 0.42** | 0.50** | 0.60**                  | 0.41**     |
| Actual Student Negative  | 0.04 −0.17^*       | −0.07                  | −0.12   | −0.09  |        | 0.06                   | −0.03      |
| Actual Parent Positive   | 0.14 −0.02         | 0.51**                 | 0.75**  | 0.36** |        | 0.37**                 | 0.36**     |
| Actual Parent Negative   | 0.04 −0.24^*       | −0.19                  | −0.07   | −0.05  | −0.31**| −0.08                  | −0.08      |
| Perceived Parent Positive| 0.14 −0.05         | 0.67**                 | 0.67**  | 0.33** |        | 0.44**                 | 0.41**     |
| Perceived Parent Negative| 0.05 −0.18^*       | 0.06                   | −0.13   | −0.10  | −0.03  | 0.15**                 | −0.03      |
| Actual Friend Positive   | 0.13               | 0.02                   | 0.42**  | −0.19  | 0.80** | 0.29^*                 | 0.32^*     |
| Actual Friend Negative   | 0.14 −0.32^*       | −0.16                  | −0.06   | −0.23  | −0.23  | −0.03                  | −0.03      |
| Perceived Friend Positive| 0.24^* −0.17^*     | 0.55**                 | 0.24**  | 0.68** | 0.39** | 0.26**                 | 0.26**     |
| Perceived Friend Negative| 0.03               | 0.01                   | 0.09    | −0.04  | −0.20  | 0.02                   | 0.12       |

^aRange = 18–31. ^bMean of mothers’ and fathers’ levels of education. ^cGlobal Religiousness (includes frequency of attending services, private prayer, and importance of religion).

*p < .10. *p < .05. **p < .01.

The students were asked to acknowledge whether they had experienced stressful events in the past year and whether they used religion to cope with those events. The number of total stressful events experienced was significantly positively associated with the students’ positive religious coping, significantly positively associated with actual and perceived parent positive religious coping, and only marginally positively associated with actual friend positive religious coping. Because total stressful events were significantly related to student actual positive, it was included as a control variable.

As expected, the students’ use of religion to cope with the stressful events was significantly and highly correlated with actual student positive religious coping (r = .60) and serves as an index of validity for the measure of students’ religious coping. Use of religion in coping was also related to perceived parent and friend positive religious coping, and the students’ attachment to his or her friend. It was decided not to include use of religious coping as
a control variable because it is a conceptually similar construct to the criterion variables in the later regression, i.e., students’ religious coping.

Overall, the preliminary analyses identified several control variables to enter in the first step of the hierarchical regression analyses. Consistent with the results shown in Tables 1, 2, and 3, age, race, religious affiliation, total stressful events, and global religiousness were entered as control variables in Step 1 of the regressions predicting student positive religious coping; parent education was entered in Step 1 of the regressions predicting student negative religious coping.

Test of Hypothesis 1:

Correlations Between Parent/Friend Religious Coping and Student Religious Coping

The first hypothesis stated that the actual and perceived religious coping levels of the parent/friend would be related to the religious coping levels of the student; concordance levels (correlations) between perceived parent/friend religious coping and student religious coping were expected to be higher than the concordance between actual parent/friend religious coping and student religious coping. Table 4 shows the correlations for religious coping among students and parents. Table 4 indicates significant correlations between actual student and actual parent positive religious coping ($r = .48$) and between actual student and perceived parent positive religious coping ($r = .70$). On the other hand, the correlation between actual student and actual parent negative religious coping was not significant, whereas the correlation between actual student and perceived parent negative religious coping was significant ($r = .50$). Thus, the first hypothesis was supported in regards to concordance between student and parent positive religious coping and only partially supported in regards to student and parent negative religious coping.
Table 4
Correlations for Religious Coping Among Students and Parents

<table>
<thead>
<tr>
<th>Religious Coping Variables</th>
<th>Student Actual RCOPE&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Parent RCOPE</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Positive</td>
<td>Negative</td>
<td>Actual</td>
</tr>
<tr>
<td>Student RCOPE</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td>.07</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Negative</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parent RCOPE</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td>.48**</td>
<td>-.06</td>
<td></td>
</tr>
<tr>
<td>Actual Negative</td>
<td>-.18*</td>
<td>.07</td>
<td>.00</td>
</tr>
<tr>
<td>Perceived Positive</td>
<td>.70**</td>
<td>-.01</td>
<td>.62**</td>
</tr>
<tr>
<td>Perceived Negative</td>
<td>-.01</td>
<td>.50**</td>
<td>-.08</td>
</tr>
</tbody>
</table>

Note. N’s range from 92 to 141.

<sup>a</sup>Religious Coping.

+<sup>p</sup> < .10. **<sup>p</sup> < .01.

Table 5 shows the correlations for religious coping among students and friends. The pattern of correlations appears similar to the pattern found for students and parents. Table 5 indicates significant correlations between actual student and actual friend positive religious coping ($r = .37$) and between actual student and perceived friend positive religious coping ($r = .63$). On the other hand, the correlation between actual student and actual friend negative religious coping was not significant, whereas the correlation between actual student and perceived friend negative religious coping was significant ($r = .50$). Again, similar to the concordance between student and parent religious coping, the first hypothesis was supported in regards to student and friend positive religious coping and only partially supported in regards to the concordance between student and friend negative religious coping.

One could ask whether students are accurate in perceiving their parents’/friends’ religious coping. Table 4 shows that students’ perceptions of parents’ positive religious coping was correlated .62 with parents’ actual positive religious coping; but the correlation between students’ perceptions of their parents’ negative religious coping and their parents’ actual negative religious coping was nonsignificant ($r = .10$). Table 5 shows that the correlation for the students’
Table 5  
**Correlations for Religious Coping Among Students and Friends**

<table>
<thead>
<tr>
<th>Religious Coping Variables</th>
<th>Student Actual RCOPE&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Friend RCOPE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Positive</td>
<td>Negative</td>
</tr>
<tr>
<td>Student RCOPE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Negative</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parent RCOPE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Negative</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Perceived Positive</td>
<td>.63**</td>
<td>.00</td>
</tr>
<tr>
<td>Perceived Negative</td>
<td>–.15*</td>
<td>.50**</td>
</tr>
</tbody>
</table>

*Note.* N’s range from 54 to 141.

<sup>a</sup>Religious Coping.

<sup>†</sup>p < .10.  <sup>∗</sup>p < .05.  <sup>∗∗</sup>p < .01.

perceptions of their friends’ positive religious coping and their friends’ actual positive religious coping was .56; and the correlation between students’ perceptions of the friends’ negative religious coping and their friends’ actual negative religious coping was .32. Thus, it appears that for the most part, students’ perceptions of their parents’/friends’ religious coping are significantly correlated with their parents’/friends’ actual religious coping.

However, a further analysis was computed to determine whether students’ perceptions of their parents’/friends’ religious coping were simply a reflection of the students’ own religious coping and global religiousness, or were in part a reflection of the parents’/friends’ actual religious coping. If parent/peer actual religious coping was related to students’ perception of their religious coping once the students’ global religiousness and own religious coping were controlled statistically, this might provide even further support for the validity of students’ perceptions (i.e., that their perceptions reflect in part how the parent/friend actually copes).

Thus, regression analyses predicting students’ perceptions of parents’ positive/negative religious coping and friends’ positive/negative religious coping were computed. The results are presented in Tables 6 and 7. Table 6 shows that parent actual positive religious coping predicts
students’ perceptions of parent positive religious coping, even when controlling for students’ actual positive religious coping and students’ global religiousness. However, parent actual negative religious coping does not uniquely predict students’ perceptions of their parents’ negative religious coping. Similarly in Table 7, friend actual positive religious coping uniquely predicts students’ perceptions of their friends’ positive religious coping, but friend actual negative religious coping does not uniquely predict students’ perceptions of their friends’ negative religious coping. Thus, students’ perceptions of their parents’ and friends’ positive religious coping do seem to reflect, at least in part, their parents’ and friends’ actual positive religious coping, but this may not be the case for negative religious coping.

Table 6
Regression of Students’ Perceptions of Parents’ Coping on Parents’ Actual Coping, Students’ Actual Coping, and Students’ Global Religiousness

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>Students’ Perceptions of Parents’ Positive RCOPE</th>
<th>Students’ Perceptions of Parents’ Negative RCOPE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Student Global Religiousness</td>
<td>.17</td>
<td>.00</td>
</tr>
<tr>
<td>Student Actual Positive (Negative) RCOPE</td>
<td>.40**</td>
<td>.63**</td>
</tr>
<tr>
<td>Parent Actual Positive (Negative) RCOPE</td>
<td>.35**</td>
<td>.02</td>
</tr>
<tr>
<td>F Value for Step</td>
<td>F (3, 98) = 51.91**</td>
<td>F (3, 88) = 19.35**</td>
</tr>
<tr>
<td>$R^2$</td>
<td>.61</td>
<td>.40</td>
</tr>
</tbody>
</table>

*Brief Religious Coping. **Global Religiousness (includes frequency of attending services, private prayer, and importance of religion).

**p < .01.

Table 7
Regression of Students’ Perceptions of Friends’ Coping on Friends’ Actual Coping, Students’ Actual Coping, and Students’ Global Religiousness

<table>
<thead>
<tr>
<th>Predictor Variables</th>
<th>Students’ Perceptions of Friends’ Positive RCOPE</th>
<th>Students’ Perceptions of Friends’ Negative RCOPE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Student Global Religiousness</td>
<td>.02</td>
<td>.20</td>
</tr>
<tr>
<td>Student Actual Positive (Negative) RCOPE</td>
<td>.57**</td>
<td>.53**</td>
</tr>
<tr>
<td>Friend Actual Positive (Negative) RCOPE</td>
<td>.33**</td>
<td>.18</td>
</tr>
<tr>
<td>F Value for Step</td>
<td>F (3, 54) = 27.95**</td>
<td>F (3, 50) = 8.01**</td>
</tr>
<tr>
<td>$R^2$</td>
<td>.61</td>
<td>.32</td>
</tr>
</tbody>
</table>

*Brief Religious Coping. **Global Religiousness (includes frequency of attending services, private prayer, and importance of religion).

**p < .01.
In sum, the first hypothesis regarding concordance between one’s own religious coping and parents’/friends’ religious coping appears to be supported in regards to positive religious coping and partially supported in regards to negative religious coping. And, as predicted, concordance rates are higher for students’ perceptions of parent/friend religious coping than for actual parent/friend religious coping. Regression analyses also support the validity of students’ perceptions of their parents’ and friends’ positive religious coping, but perceptions of parent and friend negative religious coping appear to be more a reflection of the students’ own negative religious coping.

Hypothesis 2: The Potential Moderating Role of Attachment in the Relation Between Student Religious Coping and Parent/Friend Religious Coping

Hypothesis 2 stated that higher levels of religious coping concordance between the student and his/her parent/friend would be found for those students who are securely attached to their parent and friend. Four sets of hierarchical regressions were computed as described in the overview of this section. (Within each set, two regressions are computed: one predicting student positive religious coping from parent or friend positive religious coping, and one predicting student negative religious coping from parent or friend negative religious coping.) The results of these regressions are summarized in Tables 8, 9, 10, and 11.

Table 8 presents the results of the regression analyses of students’ positive and negative religious coping on the demographic variables (Step 1: age, race, religious affiliation, student stressful event total, and global religiousness for student positive religious coping; parent education for student negative religious coping); parents’ actual positive/negative religious coping and students’ attachment to the parent (Step 2); and the interaction term of the parents’ religious coping x attachment to parent (Step 3). In Step 1, the demographic variables accounted
Table 8
Hierarchical Multiple Regressions of Students’ Brief RCOPE on Demographic Variables, Parents’ Actual Brief RCOPE, and Students’ Attachment to Parent

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>Positive</th>
<th></th>
<th>Negative</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$\Delta R^2$</td>
<td>$F$</td>
<td>$\beta$</td>
<td>$\Delta R^2$</td>
</tr>
<tr>
<td>Step 1: Demographic Variables</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>.09*</td>
<td>.01</td>
<td>--</td>
<td>--</td>
</tr>
<tr>
<td>Race</td>
<td>.05</td>
<td></td>
<td>--</td>
<td></td>
</tr>
<tr>
<td>Religious Affiliation</td>
<td>--.04</td>
<td></td>
<td>--</td>
<td></td>
</tr>
<tr>
<td>Parent Education</td>
<td>--</td>
<td></td>
<td>-.12</td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Total</td>
<td>.11**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Global Religiousness</td>
<td>.80**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>$F$ Value for Step</td>
<td>$F (5, 95) = 49.01^{**}$</td>
<td></td>
<td>$F (1, 92) = 1.28$</td>
<td></td>
</tr>
<tr>
<td>Step 2: Attachment and RCOPE</td>
<td>.00</td>
<td>.07</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Attachment to Parent</td>
<td>.03</td>
<td></td>
<td>-.26*</td>
<td></td>
</tr>
<tr>
<td>Actual Parent Positive (Negative) RCOPE</td>
<td>.04</td>
<td></td>
<td>.04</td>
<td></td>
</tr>
<tr>
<td>$F$ Value for Step</td>
<td>$F (2, 93) = 0.30$</td>
<td></td>
<td>$F (2, 90) = 3.26^*$</td>
<td></td>
</tr>
<tr>
<td>Step 3: Interactions</td>
<td>.00</td>
<td>.01</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Attachment to Parent x Actual</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parent Positive (Negative) RCOPE</td>
<td>.02</td>
<td></td>
<td>.10</td>
<td></td>
</tr>
<tr>
<td>$F$ Value for Step</td>
<td>$F (1, 92) = 0.17$</td>
<td></td>
<td>$F (1, 89) = 0.96$</td>
<td></td>
</tr>
</tbody>
</table>

$^a$Brief Religious Coping. $^b$Race (Caucasian = 1, Other = 2). $^c$Religious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). $^d$Mean of mothers’ and fathers’ levels of education. $^e$Mean Student Stressful Event Total. $^f$Global Religiousness (includes frequency of attending services, private prayer, and importance of religion).

$p < .10.$ $p < .05.$ $p < .01.$

for a significant 72% of the variance in student positive religious coping and a nonsignificant 1% of the variance in student negative religious coping. Within the step, global religiousness was the only significant variable contributing to the prediction of student positive religious coping (i.e., students with higher levels of global religiousness reported higher levels of positive religious coping). In Step 2, attachment to parent and actual parent positive religious coping account for a nonsignificant 0% of additional variance in student positive religious coping and a significant 7% additional variance in student negative religious coping. In this step, attachment to the parent predicted lower levels of student negative religious coping. In Step 3, the interaction term of
attachment to parent x actual parent coping was unrelated to student positive or negative religious coping, suggesting that attachment to parent did not moderate the relation between actual parent and student positive or negative religious coping.

Because global religiousness accounted for a large part of the variance in student positive religious coping, the regression was recomputed without this background variable (see Appendix I, Table I-1). Step 2 was now significant, $F(2, 94) = 6.53, p < .05$, with both attachment to the parent ($\beta = .17, p < .05$) and parent actual positive religious coping ($\beta = .30, p < .05$) predicting student positive religious coping. But the interaction term in Step 3 remained nonsignificant.

Table 9 presents the results of the regression analyses of students’ positive and negative religious coping on the demographic variables (Step 1: age, race, religious affiliation, student stressful event total, and global religiousness for student positive religious coping; parent education for student negative religious coping); the students’ perceived parent positive or negative religious coping and students’ attachment to the parent (Step 2); and the interaction term of perceived parent religious coping x attachment to parent (Step 3). In Step 1, the demographic variables accounted for a significant 72% of the variance in student positive religious coping and a significant 5% of the variance in student negative religious coping. Within the step, student stressful event total and global religiousness contributed significantly to the prediction of student positive religious coping, and parent education contributed significantly to the prediction of student negative religious coping (i.e., students with higher levels of stressful events and global religiousness reported higher levels of positive religious coping and students with higher levels of parent education reported lower levels of negative religious coping). In Step 2, attachment to parents and students’ perceived parent positive religious coping accounted for a significant 2% of additional variance in student positive religious coping and a significant 24%
additional variance in student negative religious coping. Within the step, perceived parent religious coping contributed significantly to the prediction of student positive and negative religious coping (i.e., higher levels of perceived parent religious coping predicted higher levels of student religious coping). In Step 3, the interaction of student attachment to parent x perceived parent religious coping accounted for a significant 3% additional variance in student negative religious coping. The nature of this significant interaction will be examined later.

Table 9
Hierarchical Multiple Regressions of Students’ Brief RCOPEa on Demographic Variables, Students’ Perceived Parent Brief RCOPE, and Students’ Attachment to Parent

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>Positive</th>
<th>Negative</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>ΔR²</td>
<td>F</td>
</tr>
<tr>
<td>Step 1: Demographic Variables</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>.72</td>
<td>.05</td>
</tr>
<tr>
<td>Raceb</td>
<td>.09+</td>
<td></td>
</tr>
<tr>
<td>Religious Affiliatioc</td>
<td></td>
<td>-.04</td>
</tr>
<tr>
<td>Parent Educationd</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Totald</td>
<td></td>
<td>.15*</td>
</tr>
<tr>
<td>Global Religiousnessf</td>
<td></td>
<td>.78**</td>
</tr>
<tr>
<td>F Value for Step</td>
<td></td>
<td>F (5, 132) = 69.23**</td>
</tr>
<tr>
<td>Step 2: Attachment and RCOPE</td>
<td></td>
<td>.02</td>
</tr>
<tr>
<td>Attachment to Parent</td>
<td></td>
<td>-.03</td>
</tr>
<tr>
<td>Perceived Parent Positive (Negative) RCOPE</td>
<td></td>
<td>.21**</td>
</tr>
<tr>
<td>F Value for Step</td>
<td></td>
<td>F (2, 130) = 5.45*</td>
</tr>
<tr>
<td>Step 3: Interactions</td>
<td></td>
<td>.00</td>
</tr>
<tr>
<td>Student Attachment to Parent x Perceived Parent Positive (Negative) RCOPE</td>
<td></td>
<td>.04</td>
</tr>
<tr>
<td>F Value for Step</td>
<td></td>
<td>F (1, 129) = 0.99</td>
</tr>
</tbody>
</table>

aBrief Religious Coping. bRace (Caucasian = 1, Other = 2). cReligious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). dMean of mothers’ and fathers’ levels of education. eMean Student Stressful Event Total fGlobal Religiousness (includes frequency of attending services, private prayer, and importance of religion).

+ p < .10. * p < .05. ** p < .01.

When the regression predicting student positive religious coping was recomputed without the global religious background variable, the results were essentially the same (see Appendix I, Table I-2).
Table 10 presents the results of the regression analyses of students’ positive and negative religious coping on the demographic variables (Step 1: age, race, religious affiliation, student stressful event total, and global religiousness for student positive religious coping; parent education for student negative religious coping); friends’ actual positive or negative religious coping and students’ attachment to the friend (Step 2); and the interaction term of friend religious coping x attachment to friend (Step 3). In Step 1, the demographic variables accounted for a significant 74% of the variance in student positive religious coping and a nonsignificant 2% of the variance in student negative religious coping. Within the step, race and global religiousness contributed significantly to the prediction of student positive religious coping (i.e.,

Table 10
Hierarchical Multiple Regressions of Students’ Brief RCOPE\textsuperscript{a} on Demographic Variables, Friends’ Actual Brief RCOPE, and Students’ Attachment to Friend

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>Actual Student RCOPE</th>
<th>Positive</th>
<th>Negative</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>$\Delta R^2$</td>
<td>$F$</td>
<td>$\beta$</td>
</tr>
<tr>
<td><strong>Step 1: Demographic Variables</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>.74</td>
<td>.07</td>
<td>--</td>
</tr>
<tr>
<td>Race\textsuperscript{b}</td>
<td>.19*</td>
<td>--</td>
<td>--</td>
</tr>
<tr>
<td>Religious Affiliation\textsuperscript{c}</td>
<td>-.08</td>
<td>--</td>
<td></td>
</tr>
<tr>
<td>Parent Education\textsuperscript{d}</td>
<td>--</td>
<td>-.13</td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Total\textsuperscript{d}</td>
<td>.06</td>
<td>--</td>
<td></td>
</tr>
<tr>
<td>Global Religiousness\textsuperscript{f}</td>
<td>.80**</td>
<td>--</td>
<td></td>
</tr>
<tr>
<td><strong>F Value for Step</strong></td>
<td></td>
<td>$F(5, 52) = 29.09^{**}$</td>
<td></td>
</tr>
<tr>
<td><strong>Step 2: Attachment and RCOPE</strong></td>
<td>.00</td>
<td>.02</td>
<td></td>
</tr>
<tr>
<td>Attachment to Friend</td>
<td>.03</td>
<td>.05</td>
<td></td>
</tr>
<tr>
<td>Actual Friend Positive (Negative) RCOPE</td>
<td>-- .01</td>
<td>.16</td>
<td></td>
</tr>
<tr>
<td><strong>F Value for Step</strong></td>
<td></td>
<td>$F(2, 50) = 0.08$</td>
<td></td>
</tr>
<tr>
<td><strong>Step 3: Interactions</strong></td>
<td>.01</td>
<td>.00</td>
<td></td>
</tr>
<tr>
<td>Student Attachment to Friend x Actual Friend Positive (Negative) RCOPE</td>
<td>-- .10</td>
<td>-- .04</td>
<td></td>
</tr>
<tr>
<td><strong>F Value for Step</strong></td>
<td></td>
<td>$F(1, 49) = 1.86$</td>
<td></td>
</tr>
</tbody>
</table>

\textsuperscript{a}Brief Religious Coping. \textsuperscript{b}Race (Caucasian = 1, Other = 2). \textsuperscript{c}Religious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). \textsuperscript{d}Mean of mothers’ and fathers’ levels of education. \textsuperscript{e}Mean Student Stressful Event Total. \textsuperscript{f}Global Religiousness (includes frequency of attending services, private prayer, and importance of religion).

* $p < .10.$ ** $p < .01.$
students in the “other” racial group and with higher levels of global religiousness reported higher levels of positive religious coping). In Step 2, attachment to friend and actual friend positive religious coping accounted for 0% of additional variance in student positive religious coping and a nonsignificant 2% of additional variance in student negative religious coping. In Step 3, the interaction of student attachment to friend x actual friend religious coping accounted for a nonsignificant 1% of additional variance in student positive religious coping and 0% of additional variance in student negative religious coping.

When the regression predicting student positive religious coping was recomputed without the global religious background variable, the results were essentially the same (see Appendix I, Table I-3).

Table 11 presents the results of the regression analyses of students’ positive and negative religious coping on the demographic variables (Step 1: age, race, religious affiliation, student stressful event total, and global religiousness for student positive religious coping; parent education for student negative religious coping); students’ perceived friend positive or negative religious coping and students’ attachment to the friend (Step 2); and the interaction term of perceived friend religious coping x attachment to friend (Step 3). In Step 1, the demographic variables accounted for a significant 7% of the variance in student positive religious coping and a significant 4% of the variance in student negative religious coping. Within the step, student stressful event total and global religiousness contributed significantly to the prediction of student positive religious coping, and parent education contributed significantly to the prediction of student negative religious coping (i.e., students with higher levels of stressful events and global religiousness reported higher levels of positive religious coping and students with higher levels of parent education reported lower levels of negative religious coping). In Step 2, attachment to
friend and students’ perceived friend positive religious coping accounted for a significant 3% of additional variance in student positive religious coping and a significant 26% additional variance in student negative religious coping (i.e., higher levels of perceived friend religious coping predicted higher levels of student religious coping). In Step 3, the interaction of student attachment to friend by perceived friend religious coping accounted for 0% additional variance in student positive and negative religious coping.

Table 11
Hierarchical Multiple Regressions of Students’ Brief RCOPEa on Demographic Variables, Students’ Perceived Friend Brief RCOPE, and Students’ Attachment to Friend

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>Positive</th>
<th></th>
<th></th>
<th>Negative</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>ΔR²</td>
<td>F</td>
<td>β</td>
<td>ΔR²</td>
<td>F</td>
<td>β</td>
</tr>
<tr>
<td>Step 1: Demographic Variables</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>.72</td>
<td>.04</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Raceb</td>
<td>.08*</td>
<td>--</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Religious Affiliationc</td>
<td>.09*</td>
<td>--</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Parent Educationd</td>
<td>-.04</td>
<td>--</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Totald</td>
<td>--</td>
<td>-.21*</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Global Religiousnessf</td>
<td>.15*</td>
<td>--</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>F Value for Step</td>
<td>F(5, 131) = 68.52**</td>
<td>F(1,129) = 5.79*</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Step 2: Attachment and RCOPE</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Attachment to Friend</td>
<td>.03</td>
<td>.26</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Perceived Friend Positive (Negative) RCOPE</td>
<td>.02</td>
<td>--</td>
<td>-.11</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>F Value for Step</td>
<td>F(2,129) = 8.32**</td>
<td>F(2,127) = 23.30**</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Step 3: Interactions</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Attachment to Friend x Perceived Friend Positive (Negative) RCOPE</td>
<td>.00</td>
<td>.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>F Value for Step</td>
<td>F(1,128) = 0.14</td>
<td>F(4,126) = 0.73</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

aBrief Religious Coping. bRace (Caucasian = 1, Other = 2). cReligious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). dMean of mothers’ and fathers’ levels of education. eMean Student Stressful Event Total. fGlobal Religiousness (includes frequency of attending services, private prayer, and importance of religion).

When the regression predicting student positive religious coping was recomputed without the global religious background variable, Step 3 now approached significance (F(1,129) = 3.24, p < .10), with the interaction term (β = .12, p < .10) for student attachment to friend x perceived
friend positive religious coping predicting student positive religious coping. The remaining results were essentially the same (see Appendix I, Table I-4).

In sum, the second hypothesis appears to be largely unsupported. Of the eight possible interaction terms testing the moderating hypothesis, only one was significant (attachment to parent x perceived parent negative religious coping predicted student negative religious coping). Possibly the lack of support for the moderating results reflects the relatively high levels of attachment in this sample. That is, the mean for attachment to parent was 4.04, and the mean for attachment to friend was 4.26, which represent values between the labels of “often true” to “almost always or always true” in regards to student report of attachment on a 1–5 scale. In order to investigate the possibility of moderation, it might be necessary to examine the relation between parent/friend and student religious coping in more extreme groups -- students at low and high levels of attachment. Thus, follow-up exploratory analyses are presented in the next section.

Follow-up Analyses Investigating the Relation Between Parent/Friend Religious Coping and Student Religious Coping for Students High and Low in Attachment

Correlations were computed to examine the relation between parent/friend religious coping and student religious coping for students high and low in attachment to parent/friend. Of particular interest was to investigate the nature of the one significant interaction reported in the previous section. There was a significant interaction for parent attachment by perceived parent negative religious coping in predicting student negative religious coping.

Students were categorized as high in attachment (upper third of distribution) or low in attachment (lower third of distribution). (Students in the middle third of the attachment distribution were not included in these analyses.) Table 12 shows correlations of religious coping among students, parents, and friends (for high and low attachment groups). Regarding the nature
of the one significant interaction, Table 12 indicates a significant correlation between perceived parent negative religious coping and student negative religious coping only for the low attachment ($r = .44$) group. However, despite this positive correlation, the scatter plot shows that a few outliers account for the result. Thus, the interaction may not be reliable even though the correlation shows that it may be attributed to the students at lower levels of attachment.

Table 12
Correlations for High and Low Attachment\(^a\) Groups: Religious Coping Among Students, Parents, and Friends

<table>
<thead>
<tr>
<th>Religious Coping Variables</th>
<th>Student Positive RCOPE(^b)</th>
<th>Student Negative RCOPE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Low Attachment to Parent Group</td>
<td>High Attachment to Parent Group</td>
</tr>
<tr>
<td>Parent RCOPE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td>.46*</td>
<td>.55**</td>
</tr>
<tr>
<td>Actual Negative</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Perceived Positive</td>
<td>.73**</td>
<td>.64**</td>
</tr>
<tr>
<td>Perceived Negative</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Low Attachment to Friend Group</td>
<td>High Attachment to Friend Group</td>
</tr>
<tr>
<td>Friend RCOPE</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td>.36</td>
<td>.48*</td>
</tr>
<tr>
<td>Actual Negative</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Perceived Positive</td>
<td>.52**</td>
<td>.74**</td>
</tr>
<tr>
<td>Perceived Negative</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note. \(N\)'s range from 19 to 47.

\(^a\)Attachment Range = 1–5, Parent: Low < 3.85 (lower 1/3 split), High > 4.37 (upper 1/3 split); Student: Low < 4.11 (lower 1/3 split), High > 4.57 (upper 1/3 split). \(^b\)Brief Religious Coping.

\(^* p < .05. \quad ** p < .01.\)

The reader can see that for all other correlations, the relation between parent/friend actual or perceived religious coping and student religious coping was similar for the high and low attachment groups.
CHAPTER IV

DISCUSSION

The goal of this study was to advance the understanding of the role of parents’ and friends’ religious coping in predicting college students’ religious coping. Hypothesis 1, the concordance hypothesis, predicted that there would be a significant relation between a student’s religious coping and his or her parent’s/friend’s religious coping. Hypothesis 2, the moderator hypothesis, predicted that the student’s attachment quality to his/her parent/friend would moderate that relation, such that there would be a stronger positive relation between parent/friend religious coping and student religious coping for those students with higher as opposed to lower levels of parent/friend attachment. To examine this topic, a sample of late adolescent college students was asked questions about their own religious coping and their parent’s and friend’s religious coping and about their relationship with a selected parent and friend. Then the selected parent and friend were mailed surveys to return to the researcher and, similarly, were asked about their own religious coping.

Descriptive Findings Associated with Religious Coping

For the most part, this sample of college students and their parents and friends acknowledged a moderate level of use of positive religious coping strategies in dealing with a variety of stressful events along with moderate to high levels of general religious commitment (i.e., attending services, private prayer, and importance of religion). Thus, this sample of college students and their parents and friends, similar to that found in other studies, would be described as moderately religious (Cullman, 1995; Pargament et al., 1994) and coping religiously in
generally positive ways (Harrison et al., 2001). On the other hand, as in the previous studies, all sources reported relatively low levels of negative religious coping.

Religious coping and generic forms of religious commitment are like two peas in a pod—they are suited for each other (i.e., they were highly correlated with each other) but it is important to know their individual identities (Pargament, 1997). In this study and others (Pargament et al., 1994; Park & Cohen, 1993), the importance of religious coping in comparison to general religiousness or nonreligious variables is not how much variance it accounts for, but rather whether religious coping makes a significant difference over and above knowing the individual’s general religiousness. For example, in this study, students’ perceptions of their parent’s and friend’s positive and negative religious coping predicted their own religious coping even after accounting for the students’ global religiousness. The findings of this study, then, attempted to tease apart religious coping from more generic forms of religiousness in order to gain knowledge about what predicts it.

Several other descriptive variables are important to note in relation to religious coping. First, higher levels of the students’ perceptions of friends’ positive religious coping was related to coming from two-parent families. Perhaps the students from families where both parents are present have vicariously observed (Bandura, 1986) less problematic and more supportive family processes, thus providing socialization experiences that, in part, promote the students’ perceptions of positive religious coping for people to whom they are close.

A second finding in this study was that if one is Caucasian, there is a significant likelihood of religion being less important and of having lower levels positive religious coping as well as lower levels of perceived parent positive religious coping when compared to someone of another racial identity. Indeed, minority groups (i.e., African Americans, elderly, poor, troubled)
report more involvement in religion than do Caucasians (Pargament, 1997). Perhaps minority
groups have fewer nonreligious resources that provide them with options for coping and, as a
consequence, to compensate their religious involvement is increased (Brant & Pargament, 1995).

Third, parent education was significantly and inversely related to the students’ negative
religious coping; and actual and perceived parent and actual friend negative religious coping.
Although speculative, perhaps parents with higher levels of education have developed a broader
religious orienting system that is more capable of protecting them from struggles. Further studies
are needed about the social factors that promote and inhibit the development of religious
orienting systems.

Finally, older students were more likely to engage in positive religious coping and to
perceive their friends as doing the same. The restricted age range of the sample precludes the
explanation of differences in cognitive maturity being associated with higher levels of positive
religious coping. It might be that the social and developmental tasks of older versus younger
students (i.e., readjusting family relationships, living in an apartment as opposed to a college
residence hall, choosing a career or life partner, planning for life beyond college, developing
one’s own personal values and beliefs) demand more coping resources, including more religious
coping. Also, older students, through experiences in their early collegiate years, may have
learned positive religious coping methods that they did not know when they started college.
Clearly, demographic differences in positive and negative religious coping need to be replicated;
when verified, the next step would be to conduct research to examine the processes that account
for these demographic differences.
Concordance Hypothesis

Two types of concordance were examined in this study. Specifically, the concordance hypothesis investigated whether the student’s religious coping was related to his or her parent’s/friend’s actual coping, as well as whether the student’s religious coping was related to his or her perceptions the parent’s/friend’s religious coping. For positive religious coping, it was found that the students’ coping was significantly related both to the parent’s/friend’s actual and perceived coping; for negative religious coping, the student’s coping was related to perceptions of the parent’s/friend’s coping, but not the parent’s/friend’s actual coping. In addition, correlations of the student’s religious coping with perceptions of the parent’s/friend’s religious coping were higher in magnitude than with the parent’s/friend’s actual coping. Overall, then, strong support was found for Hypothesis 1 in regards to concordances between student and parent/friend positive religious coping; moderate support was found for concordance in negative religious coping (i.e., limited to students’ perceptions of their parents’/friends’ coping).

Positive Religious Coping Concordances

The strong support for the concordances between student and actual/perceived parent/friend positive religious coping is consistent with Bandura’s (1986) Social Cognitive Theory’s (SCT) concept of mental models. Theoretically, the explanation is that mental models, in this case for positive religious coping, evolve through socialization experiences, i.e., through exposure to the behaviors of valued others, which are then internalized.

First, the socialization explanation for the significant and positive concordance between student and actual/perceived parent/friend positive religious coping suggests that positive religious coping may have occurred, at least in part, through the student’s dynamic bidirectional interchanges within the triadic person, behavior, and environmental setting (Bandura, 1986). In
other words, for this sample of students, the students’ parents and friends used positive religious coping that the students vicariously observed and that resulted in the encoding of cognitions and symbols for the development of the students’ mental models for positive religious coping. Indeed there is evidence that people do use moderate levels of positive religious coping and at higher levels than negative religious coping (Harrison et al., 2001). This has been shown in samples of medically-ill patients (Bush, Rye, Brant, Emery, Pargament, & Riessinger, 1999; Fitchett, Rybarczyk, DeMarco, & Nicholas, 1999; Koenig, Pargament, & Nielsen, 1998), Oklahoma City bombing survivors (Pargament, Smith, et al., 1998), bereaved family members of homicide victims (M. Thompson & Vardaman, 1997); hospice caregivers (Mickley et al., 1998); and college students coping with major life stressors (Pargament et al., 2000). The prevalence of positive religious coping over negative religious coping also suggests the likelihood that the students’ socialization experiences may have presented higher levels of positive religious coping to observe in comparison to negative religious coping. Hence, it is plausible that this sample of students may have vicariously observed positive religious coping in their socialization backgrounds and then internalized mental models for using it.

Second, SCT (Bandura, 1986) suggests that the characteristics of one’s parents and friends, i.e., such as background, admirable qualities, and similarities to the student, whom the students may have observed using positive religious coping could further support the likelihood of the positive religious coping concordance. Here SCT (Bandura, 1986) suggests that the students would be more likely to internalize as mental models the religious coping strategies of those they admire and who were similar to them. These internalized models, in this case the mental models for positive religious coping, would be tapped later in life for coping.
Third, SCT (Bandura, 1986) suggests that mental models would likely contain information about the risks and benefits for positive religious coping. It might be that the benefits within mental models for positive religious coping in one’s background carry a vicariously observed salience that differs from that of negative religious coping. Thus, positive religious coping’s mental model, at times, could be a more reasonable choice when compared to negative religious coping options. For instance, the positive religious coping items connote the likelihood of experiencing less distress compared to the negative religious coping items. That is, the positive religious coping scale suggests beneficial qualities or a positive valance, so to speak, when compared to the negative religious coping scales. For example, *Tried to see how God might be trying to strengthen me in this situation* or *I sought God’s love and care*, two items on the positive religious coping scale may connote experiencing less distress when observed than do *Felt punished by God for my lack of devotion* and *Wondered whether my church had abandoned me*, two items on the negative religious coping scale. As a result, a student evaluating the beneficial qualities of positive over negative religious coping could likely choose positive religious coping as his or her religious coping method.

Perhaps vicarious observations of both positive and negative religious coping in one’s socialization background could be internalized as mental models. However, Bandura (2003) purports that there is a gap between what people vicariously learn and what they do. This is a reflective gap that includes self-evaluation and striving for desired outcomes such as “self-satisfaction and self-worth, and refrain from behaving in ways that produce self-censure” (p. 186). It is reasonable to think that these desired outcomes would be part of the reflective process an adolescent might engage in before deciding on positive versus negative religious coping or any coping method for that matter. Given the pivotal developmental stage toward adulthood that
the adolescent is experiencing and his or her assumed proactive capabilities (Harrison et al., 2001), positive religious coping methods could be a more reasonable and salient choice over some of the negative religious coping methods.

In addition, higher levels of self-esteem, life satisfaction, and quality of life have been associated with higher levels of positive religious coping (Koenig et al., 1998; Mickley et al., 1998; Pargament, Zinnbauer, et al., 1998), so students could have observed these outcomes in their parents and friends who used positive religious coping strategies. So for this sample of college students, the content of their mental models could include coping strategies consistent with positive religious coping that might push for selection of positive rather than negative religious coping methods. Indeed, more studies are needed to identify and describe what is vicariously observed in people’s backgrounds in association with both positive and negative religious coping.

**Negative Religious Coping Concordances**

Why were concordance levels of students’ negative religious coping with their parents’/friends’ actual negative religious coping not found to be significant, yet levels of students’ perceptions of their parents’/friends’ negative religious coping did reach significance?

In the context of SCT theory (Bandura, 1986), this may indicate that the students’ mental models for negative religious coping cannot be attributed, at least in part for this sample, to the dynamic bidirectional triadic person-behavior-environment setting (Bandura, 1986) of their socialization backgrounds. For mental models of negative religious coping to develop (as described earlier for positive religious coping), it is necessary for one to vicariously observe one’s parents’ and friends’ using negative religious coping. Perhaps negative religious coping was used considerably less often by the students’ parents and friends because there is a stigma
about expressing religious doubts, conflicts, and concerns. Thus, negative religious coping is not encoded as a potent enough mental model for the student to use when compared to the potency of the mental model for positive religious coping. As discussed earlier, there is evidence that people do use considerably higher levels of positive religious coping than negative religious coping (Harrison et al., 2001). Hence, it is plausible that this sample of students may have vicariously observed higher levels of positive religious coping in their socialization backgrounds than negative religious coping.

Also, as discussed earlier in regards to positive religious coping, SCT (Bandura, 1986) maintains that characteristics of the model may influence whether the observer would be likely to internalize vicariously observed behaviors as mental models. In this sample, if the parents and friends in the students’ backgrounds used negative religious coping, it may not have developed into a usable mental model for coping among other options available to the student, because the person they vicariously observed engaging in the negative religious coping was viewed with less respect and/or with less admiration than a friend or parent who used positive religious coping.

It is also possible that negative religious coping is less likely to develop into a plausible mental model for some people due to the vicariously observed outcomes of negative religious coping (Harrison et al., 2001) that present negative religious coping as less attractive in its own right. As suggested earlier, reflective processes about coping outcomes in regards to self-esteem and maintaining friendships (Bandura, 2003) may prohibit its expression. Although longitudinal studies are needed and causality cannot be inferred, there is evidence (with some exceptions, Pargament, Zinnbauer, et al., 1998) from cross sectional research designs suggesting negative outcomes associated with negative religious coping for mental and physical health (Harrison et al., 2001). Negative religious coping, specifically spiritual discontent, interpersonal religious
conflict, and negative reframing, has been shown to be related to increased levels of depressive symptomatology in community (Bickel et al., 1998; Pargament, Zinnbauer, et al., 1998), clinical (Bush et al., 1999; Koenig et al., 1998), and caregiving (Mickley et al., 1998) samples. Increased worry and anxiety has also been associated with higher levels of negative religious coping (Kooistra & Pargament, 1998; Mickley et al., 1998; Pargament, Zinnbauer, et al., 1998; Pargament et al., 1999) although there have been exceptions (Richards & Folkman, 1997). In regards to medical samples, negative religious coping has been shown to be related to physical health outcomes as well (Harrison et al., 2001). Fitchett et al. (1999) found an inverse relation between negative religious coping and improved functional ability in medical rehabilitation patients. Global self ratings (Koenig et al., 1998) of health and better cognitive abilities (Koenig, Weiner, Peterson, Meador, & Keefe, 1997 have also been shown to have an inverse relation with negative religious coping. Finally, Pargament et al. (2000) found a higher death rate over a 2-year period in a medical patient sample who used higher levels of negative religious coping. It seems tenable that vicariously observing stressful depressive symptoms and serious medical problems in conjunction with one’s parents’ or friends’ use of negative religious coping might affect the development of a less potent mental model for using negative religious as opposed to positive religious coping later in life.

The foregoing discussion utilized a socialization hypothesis to suggest that others’ religious coping is used as a model for one’s own religious coping. However, because this is a correlational study at one point in time, it is difficult to conclude that the other person’s (parents’ or friends’) coping in fact influenced the student’s coping. Rather, it might be just as reasonable to assume that the students actively seek out others who are similar to themselves (Scarr, 1987; Scarr & McCartney, 1983), in this case, others with a similar religious coping orientation. This
argument is less plausible with the concordance relation between parents’ and students’ positive religious coping because people do not select their own parents. But this alternative hypothesis is certainly plausible to explain the relation between friends’ and students’ religious coping.

**Accuracy of Students’ Perceptions of Parents’/Friends’ Actual Religious Coping**

The students’ perceptions of their parents’ and friends’ religious coping are, for the most part, significantly correlated with their parents’ and friends’ actual religious coping. To examine whether the students’ perceptions of their parents’/friends’ religious coping were an accurate representation of their parents’/friends’ actual religious coping, regression analyses predicting the students’ perceptions of parents’ positive/negative religious coping and friends’ positive/negative religious coping were computed. Specifically, even after accounting for students’ own positive religious coping and their global religiousness, their parents’ and friends’ actual positive religious coping still significantly predicted the students’ perceptions of their parents’ and friends’ positive religious coping. Thus, students’ perceptions of their parents’ and friends’ positive religious coping appear to be valid representations of their parents’/friends’ actual coping. But this was not the case for the students’ perceptions of parents’/friends’ negative religious coping, which were predicted by the students’ actual negative religious coping but not their parents’/friends’ actual negative religious coping in these regression equations.

In SCT (Bandura, 1986), the posited mechanism for socializations’ effects is, as previously discussed, mental models, and in this study, mental models for religious coping. Mental models are internalized over time during socialization experiences that take place in the bidirectional triadic person-situation-environmental setting. As such, mental models are derived from actual experiences repeated over time during rearing, yet become perceptions of those experiences later on. It appears that the students’ mental models for positive religious coping,
represented by the significant relations between the students’ perceived parent/friend and actual parents’/friend positive religious coping, may be, at least in part, consistent with the students’ actual socialization experiences. Hence, the students’ thoughts, feelings, attitudes, beliefs, and perceptions that are part of their religious coping mental model might be consistent with earlier interactions and vicarious observations of their parents’ and friends’. However, this appears not to be the case for negative religious coping.

But for negative religious coping, the students’ perceptions of their parents’/friends’ negative religious coping appears to be significantly related to the students’ own negative religious coping strategies. Consequently, it is possible that mental models for positive religious coping are somehow afforded the opportunity to evolve and become established but the mental models for negative religious coping may not have such opportunity. There are several reasons why this might be so.

First, as discussed earlier, the vicariously observed characteristics of the person using negative religious coping, the risks and benefits of the outcomes of negative religious coping, and the prevalence of negative religious coping during socialization are all explanations for low levels of the internalization of negative religious coping mental models.

Second, mental models for negative religious coping may not develop because negative religious coping is not repeated consistently enough over time. For example, although speculative, it is possible that there could be a “learning curve” when an event initially occurs so that initially higher levels of negative religious coping might be expressed. Then, as one adjusts (i.e., learns to cope better) to the situation, positive religious coping increasingly replaces the negative religious coping. Thus, negative religious coping would not be repeated consistently over time but rather in infrequent spurts during adjustment to new situations.
Third, the perceptions of parents’ and friends’ negative religious coping appear to be a reflection of students’ own negative religious coping. In the 1960s and 1970s, this phenomenon was part of a group of perceived/actual attitude studies involving parents and their college age children. When discrepancies occurred in agreement between parents and children, it was called a “generation gap” (Hunsberger, 1985; Lerner et al., 1975) and referred to the misrepresentation of student/parent opinions and beliefs. Many of these studies were discussed in terms of the degree that adolescents’ beliefs were influenced by either their parents or friends. In the present study, what does predict the students’ thoughts, feelings, attitudes, beliefs, and perceptions that become their strategies for religious coping? At least in part, for positive religious coping, this study suggests that the development of mental models for positive religious coping through socialization experiences may be predictive of them. On the other hand, the students seem to have some kind of mental model for negative religious coping, but they seem to have their own model that appears not related to parents’ or friends’ actual negative religious coping. Perhaps social predictors at the contextual level are less powerful predictors of negative religious coping when compared to positive religious coping.

Finally, perhaps because students have less opportunity to observe others using negative religious coping, the students assume that those individuals close to them (a parent, a friend) must cope the same way the students do. That is, perhaps students strive for a perception that their attitudes (in this case, religious coping) are similar to those of their parents and friends, perhaps even more so than the attitudes of those significant others actually are, which would account for stronger correlations between perceptions of others’ coping and students’ coping than between others’ actual coping and students’ coping, as was found in this study of parents’, friends’, and one’s own religious coping. Indeed, as discussed in the Introduction, there are
ample studies showing stronger perceived/actual than actual/actual correlations (Acock & Bengtson, 1980; Breen, 1991; Lerner & Knapp, 1975; Okagaki & Bevis, 1999).

Moderation Hypothesis

Hierarchical regression analyses tested the moderation hypothesis, which states that higher levels of religious coping concordance will be found for those students with high as opposed to low levels of attachment to their parent and friend. The moderation hypothesis was found to be largely unsupported; only one of the eight possible parent/friend attachment x parent/friend positive/negative religious coping interactions was significant and appears accounted for by outliers. Although there was no evidence, then, for attachment as a moderator of the relation between parent/friend religious coping and student religious coping, there were some main effects of parent attachment on the students’ religious coping. It is important to note that there were no main or interactive effects involving friend attachment. But, the mean for the students’ levels of attachment to their friend ($M = 4.26$) was slightly higher than for their attachment to their parent ($M = 4.04$), and the standard deviation for attachment to friend ($SD = .49$) was slightly lower than for that of the students’ attachment to parent ($SD = .59$). So, it could be that no main or interactive effects were found for friend attachment because the students selected only friends to whom they were closely attached and there was too little variance in friend attachment to find effects.
Main and Moderating Effects of Parent/Friend Attachment in the Relation Between Parent/Friend Religious Coping and Student Religious Coping

Predicting Student Positive Religious Coping

Main effects. It may be that Global Religiousness was too powerful a predictor for even the unique main effects of parent and friend attachment on student positive religious coping to be identified. In fact, when the regressions were computed again without Global Religiousness as a predictor, attachment to parent indeed uniquely predicted students’ positive religious coping. Specifically, higher levels of attachment to parent predicted higher levels of student positive religious coping above and beyond the control variables (age, race, religious affiliation, and total number of stressful events) and parent positive religious coping. This is consistent with attachment theory’s (Bowlby, 1969/1982) concept of the IWM as a mental model that affects adjustment (i.e., coping). Here, cognitions, symbols, attitudes, and beliefs evolve through one’s attachment relationship with his or her parent and become mental models of how the world works. As a consequence, the student’s attachment to his or her parent and the students’ positive religious coping are related because the student’s mental models for positive religious coping reflect the religious attitudes and beliefs of the parent that grew out of the student’s attachment relationship with that parent.

This is also consistent with Pargament’s (1997) attachment to religion conception. Drawing from Kirkpatrick’s (1992, 2005) linking of attachment theory to the psychology of religion to attachment to God, Pargament (1997) proposed a relation between parental attachments and attachment to religion. Here, a securely attached student may have mental models as part of his or her IWM that are associated with an attachment to religion, which, in
turn, serves as a secure base and out of which the student’s positive religious coping is expressed when under stress.

*Moderation effects.* As noted, the hypothesized moderator effect of parent or friend attachment in the relation between parent/friend religious coping and student religious coping was not found. This sample of college students was relatively well adjusted and securely attached, which could account for the nonsignificant moderation effects. A sample with more diversity in attachment levels could be more informative if it included students with low levels of attachment to the parent and friend. Also, the moderation effect may have been reduced because the students selected a parent/friend whom they admired or felt was similar to them. Recall that the moderator hypothesis stated that the relation between parent/friend religious coping and student religious coping would be positive and significant only for students with high as opposed to low levels of attachment. The lack of a moderator effect was clearly demonstrated by follow-up correlational analyses for high- and low-attachment groups (upper and lower thirds of the attachment distributions). But the lower third of the parent and friend attachment distributions had cutoff points that were still consistent with moderately high levels of attachment (parent attachment cutoff = 3.85; friend attachment cutoff = 4.11; scale: 1–5). Thus, the contention here is that the moderator hypothesis could be more adequately tested if the sample included adolescents who are truly at low levels of attachment—students who are alienated from their parents and friends.

*Predicting Student Negative Religious Coping*

*Main effects.* The only main effect of attachment predicting student negative religious coping was that higher levels of parent attachment marginally predicted lower levels of the students’ negative religious coping in one regression equation. This is consistent with attachment
theory’s (Bowlby, 1969/1982) conception of the IWM and with the high levels of security in this sample. If one is securely attached to the parent, he or she will have a more positive IWM representing their parents’ positive beliefs, values, and wholesome ways of coping. Having an IWM with more positive ways of coping could result in fewer negative ways of coping and that, in part, could mean lower levels of negative religious coping. Also, in regards to Pargament’s (1997) conception of secure attachments’ association with a secure attachment to religion, this could mean that the student’s mental model of a secure base (that is part of their IWM) is also represented in an attachment to religion. The student, in this case, would be more likely to seek out positive religious resources when stressed, which could serve to reduce the levels of negative religious coping. Although speculative, the importance of this finding is that it might point to secure attachment’s possible role for reducing negative religious coping and what are generally (pending further research, Pargament, Zinnbauer, et al., 1998) considered harmful ways of coping.

Limitations and Future Directions

There are several limitations to this study and, therefore, it is important to interpret the results cautiously. First, the present study assumes that socialization processes primarily influence behavior. However, it could just as well be that the friend did not influence the student’s religious coping but rather that the student selected a friend based on similarity, and this similarity might even include ways of coping. Thus, a major limitation of the study is its design that is cross sectional and not longitudinal in nature. A longitudinal study with multiple time points and measurements of the participants’ and others’ religious coping at each time point could shed light on bidirectional processes of selection versus socialization effects.
A second limitation is the homogeneity of the sample. The sample consisted of mostly securely attached and well-adjusted first-year college students from Protestant and Catholic religious affiliations. The homogeneity of religious backgrounds, and perhaps more important, levels of attachment security, made it difficult to assess the degree of representativeness of the results to students of other religious affiliations and the degree to which low levels of attachment security might play a role in the relation between parent/friend religious coping and one’s own religious coping. It is recommended that future studies use samples that include more diverse religious groups and clinical populations that have wider ranges of secure and insecure attachment both to parents and to friends.

A third limitation is the large amount of variance accounted for by generic forms of religiousness. This is often a problem in Psychology of Religion and Coping studies (Pargament, 1997). In this study, it may have contributed to the weak results for the unique effects of parent/friend religious coping on the student’s religious coping. The religious coping of the college students is embedded within their larger generic religious and nonreligious ways of supporting and sustaining themselves during personal struggles. Indeed, some results were strengthened when global religiousness was dropped from the set of control variables. Studies that use a specific event of high intensity might help pull the embedded religious coping variance from that of the global religious orienting system. Thus, studies designed to tease apart the religious orienting system from other meaningful variables that account for smaller yet significant amounts of variance are needed.

For example, the global religious variable consisted of a combination of three generic religious variables: the importance of religion, frequency of private prayer, and religious service attendance. It is thought that religious coping variance is embedded, at least in part, within the
variance of these three variables. Indeed, the three variables were combined because they were moderately to highly correlated with each other, and each, separately, was positively highly correlated with the students’ religious coping. Also, there were significant and positive correlations between these three global religious variables and total attachment to one’s parent and friend. Further investigation about the reflective processes behind each of these three global variables to understand more about the students’ mental model representing them, could reveal information about the content of mental models for positive religious coping and their development and/or expression within the context of a parent/friend attachment relationship.

Bandura (1986, 2003) suggested the importance of the reflective processes in the gap between when a behavior (i.e., outward expression or internalized thought that influences outward expression) is learned (i.e., vicariously observed) and its outward expression. Certainly it is within this gap that deliberation is occurring in regards to one’s choice of religious (i.e., positive or negative religious coping) and/or nonreligious coping options before they are acted upon. Sometimes global religiousness is viewed as a nuisance in the quest for effects. Perhaps, studies considering its effects more deeply that ask questions about possible internalized religious mental models that might be related to religious coping are needed.

In an alternative vein, instead of delving within the global religious variable as part of a person’s religious orienting system, delving outside of it may shed light on external predictors of religious coping. Ano (2003) found that religious struggles conceptualized as a way of religious coping evolve when stressful life experiences meet with the limitations of one’s religious orienting system. Desai (2005) found that indices of growth and decline as a result of a spiritual struggle are associated with struggle severity and that decline is associated with avoidant attachment to God. It could be more fruitful to investigate the predictors of negative religious
coping using a more alienated sample and to investigate it within the context of the spiritual struggles that test the limits of one’s religious orienting system.

A fourth limitation is that this study did not include measures of nonreligious forms of coping. It may be that attachment plays a role in the development of students’ nonreligious forms of coping and in moderating the relation between parent/friend nonreligious coping and student nonreligious coping. Granqvist (2005) has suggested and found evidence that students with higher levels of security actually use less religious means of coping even if their parents were highly religious. In the present study it is possible that attachment to one’s parent/friend could have moderated nonreligious forms of coping given the high levels of security that were represented in the sample. Thus, an improvement to this study would be to include nonreligious coping measures.

Fifth, Oman and Thoresen (2003a, 2003b) and Bandura (2003) have recently expanded Social Cognitive Theory’s (Bandura, 1986) concept of modeling to include spiritual models. Spiritual models are exemplary individuals that are formally or informally observed and show one how to live a spiritual life. Examples of spiritual models could be historical religious figures such as Buddha, Jesus, or Muhammad, contemporary models such as Mother Teresa or Gandhi, or members of one’s family and/or religious community. In light of the present study’s theoretical footing in SCT and the Psychology of Religion and Coping (Pargament, 1997), investigating further the kinds of model characteristics that tend to be associated with attachment qualities and religious coping might help to further delineate predictors and moderators of religious coping.

A final limitation is that this study was retrospective in nature. The participants were asked to recall how much they religiously coped in the past year with a range of events that they
experienced. It is possible that the students’ recall for a level of religious coping that they experienced in the past with a problem that is now resolved may not be accurate. Prospective studies assessing the process by which students cope with current and ongoing events over time would address this issue.

**Implications and Conclusions**

The results of this study could be helpful to religious leaders, counselors, and therapists who work with people who are religiously oriented and open to understanding how to use a client’s religious practices and beliefs to cope. Because, in many cases, religious leaders generally know an entire family, for them to understand the significance of the perceptions of parents’ and friends’ religious coping despite what the actual influences might be, could be helpful to their guidance of an individual family member with a particular struggle or problem. Although findings of this study are unclear with regard to negative religious coping, the study does suggest that positive religious coping appears related to secure attachment. For therapists and counselors, this finding implicates the importance of considering late adolescents’ socialization background and its effect on their ways of coping religiously with the events in their lives during therapy.

This study also points to the importance of understanding theoretically more about the development and function of internalized religious coping mental models that coexist along side other types of theoretical models such as Bowlby’s (1969/1982) IWM and Bandura’s (1986) concept of mental models that result from vicarious observations and learning. The stability of the IWM has generally been established (Main et al., 1985; Rothbard & Shaver, 1994) across the life span, yet very little is known about how mental models for religion and religious coping might coexist and function as they evolve in the mental landscape of the individual. Certainly,
the existence of religious conversion experiences suggests a greater flexibility in religious models and, therefore, should not be viewed as *cut and pasted* within Bowlby’s concept of an IWM. Recent developments in Bandura’s SCT’s conception of spiritual models (Bandura, 2003; Oman & Thoresen, 2003a, 2003b) may hold promise for initial definition of religious and religious coping mental models.

In conclusion, the goal of this study was to advance the understanding of the role of parents’ and friends’ religious coping in predicting college students’ religious coping. The concordance hypothesis predicted a significant relation between student religious coping and parent/friend religious coping. The moderator hypothesis predicted that student attachment quality to parent/friend would moderate that relation, resulting in a stronger positive relation between parent/friend religious coping and student religious coping for those with higher as opposed to lower levels of parent/friend attachments. The concordance hypothesis was supported in regards to positive religious coping and partially supported in regards to negative religious coping. As predicted, concordance rates are higher for students’ perceptions of parent/friend religious coping than for actual parent/friend religious coping. The attachment as moderator hypothesis appears to be largely unsupported, but a limitation of the study was that the sample was relatively highly attached to their parents/friends, which weakened the ability to test the moderator hypothesis.
REFERENCES


Oman, D., & Thoresen, C. (2003b). Spiritual modeling: A key to spiritual and religious growth?

New York: Guilford.

Religion and the search for control in the hospital waiting room. *Journal of Health

God help me (I): Religious coping efforts as predictors of the outcomes to significant

Methods of religious coping with the Gulf War: Cross-sectional and longitudinal

Religion and the problem-solving process: Three styles of coping. *Journal for the

Initial development and validation of the RCOPE. *Journal of Clinical Psychology, 56*(4),
519–543.


APPENDIX A

MEASURES FOR ADOLESCENT AND ADULT ATTACHMENT
### Table A-1

**Measures for Adolescent and Adult Attachment**

<table>
<thead>
<tr>
<th>Author, Year, Name of Measure</th>
<th>Type of Instrument</th>
<th>What It Measures</th>
<th>Psychometric Properties</th>
<th>Subject Samples</th>
<th>Limitations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Main et al., 1985 Adult Attachment Interview (AAI)</td>
<td>Semistructured Retrospective Interview</td>
<td>Attachment coherence and incoherence grouped into two types: a) secure (autonomous) b) insecure (dismissing, preoccupied, unresolved)</td>
<td>AAI appears not related to cognitive abilities and gender. High stability for classification groups. High correlations with Ainsworth et al. (1978) behavioral measures in infancy and childhood</td>
<td>Adults Adolescents Parent/Child dyads Adolescents Couples. Clinical Nonclinical</td>
<td>Costly and requires time and training.</td>
</tr>
<tr>
<td>Crowell &amp; Owens, 1996 Current Relationship Interview (CRI)</td>
<td>Interview</td>
<td>Secure-base representation, use, support in dyadic relationships grouped into two types: a) one secure (autonomous) b) two insecure (dismissing, preoccupied)</td>
<td>CRI and AAI moderately correlated and correlation increases across time. CRI appears not related to cognitive abilities, gender. Positively related to secure-base behavioral measures</td>
<td>Adult dyads</td>
<td>Less stable than AAI, especially in early phases of dyadic relationship. Costly and requires time and training.</td>
</tr>
<tr>
<td>Pottharst, 1990 Attachment History Questionnaire (AHQ)</td>
<td>Multiitem retrospective self-report questionnaire with open-ended questions and checklists</td>
<td>Measures attachment to parent and degree of: a) secure attachment base b) insensitive parental discipline c) threats of separation d) peer affectional support</td>
<td>Insecurity related to trauma and pathology. Four factors revealed by principal components analysis and varimax rotation. Subscales combine to single security score (alpha = .91).</td>
<td>Clinical populations</td>
<td>Focuses on extreme pathological circumstances in Bowlby’s writings. Not designed for adolescent population samples</td>
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<tr>
<td>Author, Year, Name of Measure</td>
<td>Type of Instrument</td>
<td>What It Measures</td>
<td>Subject Samples</td>
<td>Limitations</td>
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<td>Armsden &amp; Greenberg, 1987</td>
<td>Multitem self-report questionnaire for parents (25 questions) and peers (28 questions)</td>
<td>Measures current perceptions of trust, communication, and alienation in a relationship dyad</td>
<td>Specifically designed for late adolescent populations and for adolescent/parent and adolescent/peer dyads</td>
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<tr>
<td>Inventory of Parent and Peer Attachment (IPPA)</td>
<td>Security correlated with self-esteem, life satisfaction, use of problem-solving, and less loneliness, anxiety, and relationship conflict. Subscales highly correlated and often aggregated into secure/insecure indexes</td>
<td>Internal consistency for each of three subscales revealed by meta-analysis (Reese et al., 2002): a) Trust: 0.91 b) Communication 0.90 c) Alienation: 0.81</td>
<td>Somewhat lower score reliabilities for alienation scale.</td>
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<tr>
<td>West, Sheldon, &amp; Reiffer, 1987</td>
<td>Multiitem self-report questionnaire</td>
<td>RAQ - Measures the attachment quality of a person who endorses having a primary attachment figure</td>
<td>Adult population samples</td>
<td></td>
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<tr>
<td>West &amp; Sheldon-Keller, 1994</td>
<td>Multiitem self-report questionnaire for Reciprocal Attachment Questionnaire for Adults (RAQ)</td>
<td>AAQ – Measures the attachment quality of a person who does not endorse having a primary attachment figure</td>
<td>Does not assess romantic, friendship, or parental relationship dyads.</td>
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<tr>
<td>Avoidant Attachment Questionnaire for Adults (AAQ)</td>
<td>Factor analyses revealed two factors: Factor 1: a) proximity seeking b) separation protest c) feared loss Factor 2: a) availability b) use of attachment figure</td>
<td>RAQ - Fairly high internal consistency and test-retest reliability (averages about 0.75 using Fisher’s r to z and z to r transformations)</td>
<td>Not developed for adolescent population samples</td>
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<tr>
<td>Author, Year, Name of Measure</td>
<td>Type of Instrument</td>
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<td>N. L. Collins &amp; Read, 1990</td>
<td>18-item self-report Likert type questionnaire</td>
<td>Measures Ainsworth’s three attachment types: a) comfortable in close relationships (Close) b) trust and depend on others (Depend) c) fear of being unloved, abandoned (Anxiety)</td>
<td>Adult samples</td>
<td>Low internal consistency and test-retest reliabilities when compared to IPPA, PAQ, PBI, and BORI</td>
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<tr>
<td>Adult Attachment Scale (ASS)</td>
<td>Ainsworth-based instrument adapted from Hazen and Shaver’s (1987) previous 3-item scale (Attachment Style Questionnaire)</td>
<td>Correlated with measures of attitudes of self and others, and romantic relationship characteristics. Predictive of depression, substance abuse, and eating disorders (Burge et al., 1997).</td>
<td></td>
<td>Not developed for adolescent population samples</td>
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<tr>
<td>Bell, Billington, &amp; Becker, 1986</td>
<td>45-item self-report questionnaire in True/False format</td>
<td>Object-relations-based attachment patterns of personality and identity in the context of relationships</td>
<td>Adult population samples</td>
<td>Lowest reliability estimates on all subscales when compared to the IPPI, PAQ, and the PBI</td>
<td></td>
</tr>
<tr>
<td>Bell Object Relations Inventory (BORI)</td>
<td>Bell Object Relations Inventory (BORI)</td>
<td>Four factor analytic derived subscales: a) Alienation b) Insecure Attachment: c) Egocentric d) Social Incompetence:</td>
<td></td>
<td>Lower reliability estimates on all subscales for female samples when compared to other attachment measures</td>
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<td></td>
<td>High scores on insecure attachment and social incompetence correlate with eating disorder severity in female adolescents</td>
<td>Meta-analytic derived reliability scores for each subscale (Reese et al., 2002)</td>
<td></td>
<td>Designed for adult population samples</td>
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<tr>
<td>Author, Year, Name of Measure</td>
<td>Type of Instrument</td>
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<tr>
<td>Kenny, 1987 Parental Attachment Questionnaire (PAQ)</td>
<td>70-item self-report Likert type measure</td>
<td>Ainsworth-based model tapping perceptions on 3 factor analytic-derived subscales: a) affective relationship b) fostering of autonomy c) support</td>
<td>Late adolescent and young adult populations</td>
<td>Security correlated with psychological symptoms when entering college, positive relationships, and overall adjustment to college</td>
<td></td>
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<tr>
<td>Parker, Tupling, &amp; Brown, 1979 Parental Bonding Instrument (PBI)</td>
<td>Self-report Likert type 50-item questionnaire 25-item parent form, 25-item adolescent form</td>
<td>Bowlby-based model assesses the adolescent–parent bond during the first 16 years of life</td>
<td>Adolescent/parent dyads</td>
<td>In general constructs reflect similar broadly defined dimensions of other attachment measures (i.e., parental sensitivity/responsiveness, availability/rejection)</td>
<td>Test-retest reliability on four subscales ranges from 0.67 to 0.80, but had large mean standard deviations (0.13 to 0.23) compared to other instruments Large variability of scores within each subscale Does not assess attachment to peers Designed for adolescents 16 years old or younger</td>
</tr>
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APPENDIX B

IMPLICATIONS FOR THE RELATIONSHIP OF ATTACHMENT AND RELIGION VARIABLES
Table B-1
*Implications for the Relationship of Attachment and Religion Variables*

<table>
<thead>
<tr>
<th>Study</th>
<th>Sample, Stressor, Attachment and Religious Measures Pertinent to the Present Study</th>
<th>Findings Pertinent To Present Study</th>
<th>Relevance To Present Study</th>
</tr>
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<tr>
<td>Belavich &amp; Pargament, 2002</td>
<td>155 middle-aged adults in hospital waiting room while a loved one underwent surgery completed the Hazen and Shaver (1987) Attachment to God scale adjusted for dimensional measurement using 5-point Likert responses, Religious Problem Solving Scales (Pargament, 1997) and Religious Coping Activities Scale.</td>
<td>Higher levels of adult secure attachment to God Increased collaborative and spiritual coping. Less anger and distance from God</td>
<td>Links secure attachment to religious coping.</td>
</tr>
<tr>
<td>Byrd &amp; Boe, 2001</td>
<td>166 college age students complete a student stress scale, the RSQ (Griffin &amp; Bartholomew, 1994) but adjusted the scale to measure two dimensions of insecurity (anxiety and avoidance) on a 5-point Likert scale. Worded it to apply attachment concepts to relationships in general. Measured meditative, colloquial, and petitionary prayer.</td>
<td>Lower levels of avoidant attachment to God Higher levels of meditative and colloquial prayer</td>
<td>Low avoidant attachment implies more secure attachment. Suggests a link between secure attachment and prayer, a form of religious coping. Stable with controls. Stronger during times of stress.</td>
</tr>
<tr>
<td>Granqvist, 2005</td>
<td>197 adults (mean age was 38 years) completed Hazen (1990) perceived parental attachment history adjusted to a 6-point response scale, Religious Problem Solving Scales (Pargament et al., 1988), Parental Religious Activity Scale (Granqvist &amp; Hagekull, 1999), and religiosity prototype for religious correspondence (Granqvist &amp; Hagekull, 2002).</td>
<td>Adult secure attachment to parents Insignificant levels of religious coping</td>
<td>Secure attachment to parent tended to not be involved in religious coping and this finding was even stronger for parents perceived to be highly religious. No stress measure was included in this study but may be necessary to tap religious coping for secure people.</td>
</tr>
<tr>
<td>Granqvist, 2002b</td>
<td>196 adolescents (mean age was 16.3 years) completed a retrospective 13-item perceived maternal and paternal attachment rating scale based on Hazen and Shaver (1986) measure, Granqvist and Hagekull (1999) Socialization-Based Religiosity Scale, and religious change measures.</td>
<td>Adolescent secure attachment to parents Smaller fluctuations of religious change over time.</td>
<td>Suggests secure adolescents may have adopted over time their parents’ religious values and that those values are part of the adolescent’s cognitive framework. No stress measure was included in this study, which again suggests that secure people need a stressor to elicit religious coping.</td>
</tr>
<tr>
<td>Birgegard &amp; Granqvist, 2004</td>
<td>Three controlled experiments (total N = 175, age approx. 25 years) using subliminal cues of separation from God or from mother employed to activate the attachment system. Participants completed Hazen (1990) perceived parental attachment history adjusted to a 7-point response scale, Granqvist and Hagekull (1999) Emotionally-Based Religiosity Scale.</td>
<td>Secure attachment to parent Turns to God, religious attachment behavior</td>
<td>Attachment to God (i.e., religious attachment behavior) was moderated in all three experiments by perceived attachment to parents. The investigators concluded that the studies support correspondence between IWM of parents and God.</td>
</tr>
</tbody>
</table>
APPENDIX C

STUDENT CONSENT FORM AND RAFFLE INFORMATION
Survey About Close Relationships, Stress, and Religious Attitudes
Student Informed Consent

Dear Student,

My name is Ellen Cullman and I am a graduate student at Bowling Green State University. I am conducting a research project toward the completion of my Ph.D. degree in Clinical Psychology. Below is information about my project that will let you know what to expect and help you decide if you want to volunteer to participate in my study and earn one experimental credit. There is an alternative project that you can choose to do instead that will also earn you one experimental credit in case you would prefer not to participate in my study. I will be happy to answer any questions you may have before you make your decision.

Sincerely,

Ellen Cullman, M.A.
Clinical Psychology

Purpose

The purpose of this research project is to examine how close relationships are related to a person’s religious beliefs and attitudes when they cope with a stressful event. This study is being conducted for the completion of my dissertation. Please be assured that you can earn one experimental credit either by voluntarily participating in this study or completing an alternative project.

Risks and Informed Consent

The risks of your volunteering for this study are no more than what you would encounter in daily life. Participation in this project requires you to be 18 years of age or older. Once you have read this statement and the researcher has answered and questions you have, you are considered informed to make a decision about whether you participate in this study. The completion and return of the survey indicates your consent to participate in it. This informed consent statement is yours to keep.

Participation

Participation requires you to complete a survey booklet, and address two envelopes containing surveys to be mailed to one of your parents and a friend. If you complete the survey booklet in its entirety by responding to all statements and questions and leaving no statements and questions unanswered and if you provide the addresses of your selected parent and friend, you will receive one experimental credit in psychology assigned on Experimetrix, psychology’s web site. If you meet the above requirements and the researcher also receives in the mail the surveys from your parent and friend you will be eligible to enter a raffle. (See Raffle Instructions on the next page.)
The survey will ask you to report demographic information about yourself (age, gender, year in school, etc.) and your religious beliefs when coping with a stressful event that occurred within the past year. You also will be asked questions about the type of relationship you have with one of your parents and a best friend and about how your parent, best friend, and you yourself use religion to cope with a stressful event. Once you begin the survey, it will take you about 30-minutes to complete.

**Procedure**

You heard about this study from an announcement in your psychology class. You are expected to complete the entire survey during this appointment time in order to receive credit.

In the classroom, the researcher will give you an informed consent statement to read and she will answer any questions you have about the survey. Next, she will hand out the survey booklet, review its instructions, tell you to start, and remain available in the classroom to answer any questions you have while completing the survey.

When you are finished, you will be asked to check that all questions on the survey have been completed and to hand in the booklet to the researcher or teaching assistant. He/She will then check your booklet for completion, eligibility for experimental credit, and eligibility to enter the raffle.

**Raffle Instructions:** If you (1) complete the entire survey booklet and have it checked by the researcher for completion, (2) provide two addresses (one to a parent and one to a friend), and (3) if the researcher receives in the mail the completed surveys of your parent and your friend, then you will be eligible to enter a raffle to win one $25 Meijer Gift Card. Ten Meijer Gift Cards will be raffled, so you will have 10 chances to have your name drawn. A cell phone will be available in the classroom if you need to get someone’s address. Once you have qualified for the raffle by completing steps (1) and (2) above, you will be given a raffle ticket to fill out with your name, address, telephone number, email, and survey control number. Once your ticket is filled out you will be instructed to it insert in the provided raffle box. When your parent’s and friend’s survey is received by the researcher, they will be matched with your survey using the control numbers written in the upper left hand corner.

The raffle will take place four weeks after you completed your survey in class. Your email address will be used (1) to notify you after two weeks, if I have not yet received your parent and friend surveys, to ask you to remind them to send me their surveys; and (2) to notify you after four weeks if your name is drawn to win a $25 Meijer’s gift card.

To determine gift card winners, a raffle ticket will be drawn from the raffle box. The control number on the drawn raffle ticket will be matched with the control numbers on your completed survey and that of your parent and friend. If your ticket number corresponds to a set of three surveys with the same number (parent, friend, and student surveys) you will be contacted and arrangements will be made to mail your winning $25 Meijer’s Gift Card. Raffle drawings will continue in the same manner until there are 10 gift card winners.
Participants Rights

The procedures in this study are arranged so that the information you provide will be kept confidential and private. This means that no one will be able to connect your name, your parent’s name, or your friend’s name to any survey that was completed by you or those who mailed surveys to the researcher. The number at the top left side of the survey pages is for matching your survey with your parent’s and BGSU friend’s survey and does not serve in any way to identify you or your parent and your friend. To make sure that your answers remain completely private and confidential, you are not to write your name or put any marks on the front or inside the survey that would identify you personally. Once the drawing for the raffle is completed, all raffle tickets will be destroyed. No identifying information will remain.

Your participation in this project is voluntary. You may withdraw from the study at any time without penalty. If you have questions at any time about the study, please contact me at the phone numbers and email address provided on the next page. Also, contact me if you become distressed during the course of this project or call the Psychological Services Center (PSC) at Bowling Green State University (419-372-2540).

Benefits

This project will offer insight into the development of religious attitudes in late adolescence and provide information about how family and friends affect that development. The primary benefit of your participation is that you will help psychologists and society better understand how religious attitudes develop and the role of parents and friends in that development. You may also learn more about how psychological research is conducted. If you would like a copy of the results of this project, tell me before you leave the classroom and arrangements will be made for you to receive a copy.

Contact Information

If you have questions about this research study, you may contact me or my faculty advisor. I can be reached at 1-216-595-0500 (ext.185) or 419-494-7699 (cell) and by email at ecullman@bghost.net. My faculty advisor is Dr. Eric Dubow. He may be reached at 419-372-2301 or edubow@bgnet.bgsu.edu.

If you have questions regarding the conduct of this study or about your rights as a research participant, you may contact the Chair of Bowling Green State University’s Human Subjects Review Board at 419-372-7716 or hsrb@bgnet.bgsu.edu.
APPENDIX D

STUDENT SURVEY
Survey Instructions

All names, addresses, and emails will remain confidential and are used to:

- Mail surveys to your parent and a friend.
- Email reminders to your parent and friend.
- Determine experimental credit assignment.
- Determine raffle gift card winners

You must answer all questions in the survey, provide the addresses of a parent and friend, and have your survey checked for completion to receive experimental credit and enter the raffle. To be eligible to win a $25 Meijer gift card should your raffle ticket be drawn, I must receive your parent and friend completed surveys in the mail.

Keep in mind the following when you complete this survey:

1. Please read and follow the directions carefully.

2. You will be asked to provide the address of a parent and friend.

3. My cell phone is available to use if you are unsure of the correct address.

4. **Please try to not skip any questions. All of your questions must be completed for raffle eligibility.**

5. If you have questions that would prevent you from completing the survey, I am here to answer them for you.

6. There are no right or wrong answers. The best answer most clearly reflects your point of view.

7. When you turn in your survey, I or a teaching assistant will check that your survey is complete, tear off the last page of your survey with your “P” number on it in order to receive experimental credit, and hand you your raffle ticket to put in the raffle box.

Thank you for your time and participation,

Ellen P. Cullman, M.A.,
Clinical Psychology
PICK A PARENT

I will be asking you some questions about your background, your parent and peer relationships, stressful events in your life during the past year, and your religious attitudes and beliefs about God when stressed. For some of the questions, I want you to consider ONE parent. I want you to pick the parent with whom you have spent the most time. Later, when the instructions ask you, think about the ONE parent you picked as you answer the questions inside this booklet.

1. The ONE parent I have spent the most time with is:

   _____My Father (1)   _____My Mother (2)

2. Please PRINT CLEARLY on the label below the address (first/last name, street address, city, state, Zip Code) of the one parent you picked so I can mail them a short survey.

3. The address above (and on the next page) must be provided to receive experimental credit and to enter the raffle. I will mail a short survey to your parent along with a stamped envelope for them to mail it back to me. Please encourage them to complete the survey and mail it back. If you also want me to email your parents a reminder, please PRINT CLEARLY their email address below.

   My parent’s email address is: ________________________@____________________
PICK A CLOSE FRIEND

For other questions, I want you to consider ONE close friend. I want you to pick the close friend with whom you have spent the most time. When the directions say to, think about the ONE close friend you picked as you answer the questions inside this booklet.

1. The ONE close friend with whom I spend the most time is:

_____ Male (1)  _____ Female (2)

2. Please PRINT CLEARLY on the label below the address (first/last name, street address, city, state, Zip Code) of the close friend you picked below:

3. The address above (and on the previous page) must be provided to receive experimental credit and to enter the raffle. I will mail a short survey to your friend along with a stamped envelope for them to mail it back to me. Please encourage them to complete the survey and mail it back. If you also want me to email your friend a reminder, please PRINT CLEARLY their email address below. I will only email them if I do not receive their packet within two weeks of my mailing it to them.

My friend’s email address is: _____________________@________________
Demographic Information

Please check the appropriate response to each item below as it applies to you.

1. Sex: ___Male(1) ___Female(2)

2. Age: ___

3. Race: ___White(1) ___Black(2) ___Hispanic(3) ___American(4) ___Other(5) please specify

4. Your Parent’s Marital Status: ___Single(1) ___Married(2) ___Divorced(3) ___Widowed(4)

5. Year in School: ___Freshman(1) ___Sophomore(2) ___Junior(3) ___Senior(4) ___Other(5)

6. Which of the following categories best describes your current religious affiliation?
   ___Catholic(1) ___Protestant(2) ___Jewish(3) ___None(4) ___Other(5) please specify

7. How important is religion in your life?
   extremely ___important(5) very ___important(4) moderately ___important(3) slightly ___important(2) not ___important(1)

8. How often do you attend religious services?
   several times a week(9) every week(8) nearly every week(7) 2–3 times a month(6) about once a month(5) about once a year(4) less than once a month(3) less than once a year(2) never once a year(1)

9. How often do you pray privately in places other than at the church or synagogue?
   more than once a week(8) once a week(7) once a day(6) a few times a week(5) once a month(4) about once a month(3) less than once a month(2) never(1)

10. Your mother and father’s highest level of education:
    Your Mother                        Your Father
    ___Graduate or professional training(7) ___Graduate or professional training(7)
    ___College graduate (4 years)(6) ___College graduate (4 years)(6)
    ___Partial college(5) ___Partial college(5)
    ___High school graduate(4) ___High school graduate(4)
    ___Some high school (10th or higher)(3) ___Some high school (10th or higher)(3)
    ___Junior high school graduate(2) ___Junior high school graduate(2)
    ___Less than 7th grade(1) ___Less than 7th grade(1)
Survey About My Relationship With My Parent

Below are statements that describe ways you might feel in relationship to your one parent that you picked earlier with whom you have spent the most time.

Read each statement below keeping in mind your one parent and decide how true each statement is for you by placing a checkmark on the appropriate line.

1. My parent respects my feelings.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (5)
   ____ true (4)
   ____ true (3)
   ____ true (2)
   ____ or never true (1)

2. I feel my parent is successful as a parent.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (5)
   ____ true (4)
   ____ true (3)
   ____ true (2)
   ____ or never true (1)

3. I wish I had a different parent.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (1)
   ____ true (2)
   ____ true (3)
   ____ true (4)
   ____ or never true (5)

4. My parent accepts me as I am.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (5)
   ____ true (4)
   ____ true (3)
   ____ true (2)
   ____ or never true (1)

5. I have to rely on myself when I have a problem to solve.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (1)
   ____ true (2)
   ____ true (3)
   ____ true (4)
   ____ or never true (5)

6. I like to get my parent’s point of view on things I’m concerned about.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (5)
   ____ true (4)
   ____ true (3)
   ____ true (2)
   ____ or never true (1)

7. I feel it’s no use letting my feelings show.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (1)
   ____ true (2)
   ____ true (3)
   ____ true (4)
   ____ or never true (5)

8. My parent senses when I’m upset about something.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (5)
   ____ true (4)
   ____ true (3)
   ____ true (2)
   ____ or never true (1)

9. Talking over my problems with my parent makes me feel ashamed or foolish.
   - almost always
   - often
   - sometimes
   - seldom
   - almost never
   ____ or always true (1)
   ____ true (2)
   ____ true (3)
   ____ true (4)
   ____ or never true (5)
10. My parent expects too much of me.

almost always          often          sometimes          seldom          almost never
___or always true (1) ___true (2) ___true (3) ___true (4) ___or never true (5)

11. I get upset easily at home.

almost always          often          sometimes          seldom          almost never
___or always true (1) ___true (2) ___true (3) ___true (4) ___or never true (5)

12. I get upset a lot more than my parent knows about.

almost always          often          sometimes          seldom          almost never
___or always true (1) ___true (2) ___true (3) ___true (4) ___or never true (5)

13. When we discuss things, my parent considers my point of view.

almost always          often          sometimes          seldom          almost never
___or always true (5) ___true (4) ___true (3) ___true (2) ___or never true (1)

14. My parent trusts my judgment.

almost always          often          sometimes          seldom          almost never
___or always true (5) ___true (4) ___true (3) ___true (2) ___or never true (1)

15. My parent has their own problems, so I don’t bother them with mine.

almost always          often          sometimes          seldom          almost never
___or always true (1) ___true (2) ___true (3) ___true (4) ___or never true (5)

16. My parent helps me to understand myself better.

almost always          often          sometimes          seldom          almost never
___or always true (5) ___true (4) ___true (3) ___true (2) ___or never true (1)

17. I tell my parent about my problems and troubles.

almost always          often          sometimes          seldom          almost never
___or always true (5) ___true (4) ___true (3) ___true (2) ___or never true (1)

18. I feel angry with my parent.

almost always          often          sometimes          seldom          almost never
___or always true (1) ___true (2) ___true (3) ___true (4) ___or never true (5)

19. I don’t get much attention at home.

almost always          often          sometimes          seldom          almost never
___or always true (1) ___true (2) ___true (3) ___true (4) ___or never true (5)
20. My parent encourages me to talk about my difficulties.

21. My parent understands me.

22. I don’t know whom I can depend on these days.

23. When I am angry about something, my parent tries to be understanding.

24. I trust my parent.

25. My parent doesn’t understand what I’m going through these days.

26. I can count on my parent when I need to get something off my chest.

27. I feel that no one understands me.

28. If my parent knows something is bothering me, they ask me about it.
Survey About My Relationship With My Friend

Below are statements that describe ways you might feel in relationship to your one close friend that you picked earlier with whom you have spent the most time. Read each statement below keeping in mind your one close friend and decide how true each statement is for you by placing a checkmark on the appropriate line.

1. I like to get my friend’s point of view on things I’m concerned about.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (5) ___ true (4) ___ true (3) ___ true (2) ___ or never true (1)

2. My friend senses when I’m upset about something.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (5) ___ true (4) ___ true (3) ___ true (2) ___ or never true (1)

3. When we discuss things, my friend considers my point of view.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (5) ___ true (4) ___ true (3) ___ true (2) ___ or never true (1)

4. Talking over my problems with my friend makes me feel ashamed or foolish.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (1) ___ true (2) ___ true (3) ___ true (4) ___ or never true (5)

5. I wish I had a different friend.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (1) ___ true (2) ___ true (3) ___ true (4) ___ or never true (5)

6. My friend understands me.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (5) ___ true (4) ___ true (3) ___ true (2) ___ or never true (1)

7. My friend encourages me to talk about my difficulties.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (5) ___ true (4) ___ true (3) ___ true (2) ___ or never true (1)

8. My friend accepts me as I am.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (5) ___ true (4) ___ true (3) ___ true (2) ___ or never true (1)

9. I feel the need to be in touch with my friend more often.
   almost always              often               sometimes          seldom              almost never
   ___ or always true (1) ___ true (2) ___ true (3) ___ true (4) ___ or never true (5)
10. My friend doesn’t understand what I’m going through these days.

- almost always
- or always true (1)
- often
- true (2)
- sometimes
- true (3)
- seldom
- true (4)
- almost never
- or never true (5)

11. I feel alone or apart when I am with my friend.

- almost always
- or always true (1)
- often
- true (2)
- sometimes
- true (3)
- seldom
- true (4)
- almost never
- or never true (5)

12. My friend listens to what I have to say.

- almost always
- or always true (5)
- often
- true (4)
- sometimes
- true (3)
- seldom
- true (2)
- almost never
- or never true (1)

13. I feel my friend is a good friend.

- almost always
- or always true (5)
- often
- true (4)
- sometimes
- true (3)
- seldom
- true (2)
- almost never
- or never true (1)

14. My friend is fairly easy to talk to.

- almost always
- or always true (5)
- often
- true (4)
- sometimes
- true (3)
- seldom
- true (2)
- almost never
- or never true (1)

15. When I am angry about something, my friend tries to be understanding.

- almost always
- or always true (5)
- often
- true (4)
- sometimes
- true (3)
- seldom
- true (2)
- almost never
- or never true (1)

16. My friend helps me to understand myself better.

- almost always
- or always true (5)
- often
- true (4)
- sometimes
- true (3)
- seldom
- true (2)
- almost never
- or never true (1)

17. My friend is concerned about my well-being.

- almost always
- or always true (5)
- often
- true (4)
- sometimes
- true (3)
- seldom
- true (2)
- almost never
- or never true (1)

18. I feel angry with my friend.

- almost always
- or always true (1)
- often
- true (2)
- sometimes
- true (3)
- seldom
- true (4)
- almost never
- or never true (5)

19. I can count on my friend when I need to get something off my chest.

- almost always
- or always true (5)
- often
- true (4)
- sometimes
- true (3)
- seldom
- true (2)
- almost never
- or never true (1)
20. I trust my friend.

almost always  often  sometimes  seldom  almost never
____ or always true (5)  ____ true (4)  ____ true (3)  ____ true (2)  ____ or never true (1)


almost always  often  sometimes  seldom  almost never
____ or always true (5)  ____ true (4)  ____ true (3)  ____ true (2)  ____ or never true (1)

22. I get upset a lot more than my friend knows about.

almost always  often  sometimes  seldom  almost never
____ or always true (1)  ____ true (2)  ____ true (3)  ____ true (4)  ____ or never true (5)

23. It seems as if my friend is irritated with me for no reason.

almost always  often  sometimes  seldom  almost never
____ or always true (1)  ____ true (2)  ____ true (3)  ____ true (4)  ____ or never true (5)

24. I tell my friend about my problems and troubles.

almost always  often  sometimes  seldom  almost never
____ or always true (5)  ____ true (4)  ____ true (3)  ____ true (2)  ____ or never true (1)

25. If my friend knows something is bothering me, they ask me about it.

almost always  often  sometimes  seldom  almost never
____ or always true (5)  ____ true (4)  ____ true (3)  ____ true (2)  ____ or never true (1)
**Life Events and Religious Coping Check List**

Instructions: Below is a list of events that sometimes happen to people.
1. Read over the entire list of events.
2. Circle each event you have experienced **during the past year**.
3. Write life events that were important to you but not listed on the lines provided at the end.
4. For each event **CIRCLE** the number in the column that **indicates how important your religious faith was when coping with that event**.

<table>
<thead>
<tr>
<th>Circle events you experienced in the past year</th>
<th>IMPORTANCE OF RELIGION WHEN I COPED WITH THE EVENT</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Not At All</td>
</tr>
<tr>
<td>1. Death of a close family member.</td>
<td>1</td>
</tr>
<tr>
<td>2. Death of a close friend.</td>
<td>1</td>
</tr>
<tr>
<td>3. Serious illness or injury to a close family member.</td>
<td>1</td>
</tr>
<tr>
<td>4. Serious illness or injury to a close friend.</td>
<td>1</td>
</tr>
<tr>
<td>5. Major personal illness or injury.</td>
<td>1</td>
</tr>
<tr>
<td>6. Problems with leaving home.</td>
<td>1</td>
</tr>
<tr>
<td>7. Failing an important exam.</td>
<td>1</td>
</tr>
<tr>
<td>8. Failing a course.</td>
<td>1</td>
</tr>
<tr>
<td>9. Academic probation.</td>
<td>1</td>
</tr>
<tr>
<td>10. Problems with roommate(s).</td>
<td>1</td>
</tr>
<tr>
<td>11. Problems with boyfriend or girlfriend.</td>
<td>1</td>
</tr>
<tr>
<td>12. Problems with close friend(s).</td>
<td>1</td>
</tr>
<tr>
<td>13. Pressure to drink and/or take drugs.</td>
<td>1</td>
</tr>
<tr>
<td>14. Increase in family arguments.</td>
<td>1</td>
</tr>
<tr>
<td>Circle events you experienced in the past year</td>
<td>IMPORTANCE OF RELIGION WHEN I COPED WITH THE EVENT</td>
</tr>
<tr>
<td>----------------------------------------------</td>
<td>-----------------------------------------------</td>
</tr>
<tr>
<td>15. Your parents separate.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>16. Your parents divorce.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>17. Increase in number of arguments you have with your parents.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>18. Sexual relationship problems (e.g., pressure to have sex).</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>19. Unwanted pregnancy (if female) or girlfriend has unwanted pregnancy (if male).</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>20. Having an abortion (if female) or girlfriend has an abortion (if male).</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>21. Major decrease in family income.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>22. Difficulty getting job.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>23. Financial problems with school (e.g., tuition, room and board).</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>24. Church problems (e.g., difficulty finding a church; problems attending a church, different, fewer, or increased church activities).</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>25. Problems with major change in social activities (e.g., parties, movies, visiting friends).</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>26. Conviction for a minor law violation such as speeding or drunkenness.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>27. Problems or worries with deciding on a major.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>28. Difficulties or worries with making new friends.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>29. Problems or worries with living in a dormitory.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>30. Problems or worries with the nation being at war.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>31.</td>
<td>Not At All 1</td>
</tr>
<tr>
<td>32.</td>
<td>Not At All 1</td>
</tr>
</tbody>
</table>
How I Apply My Religion to Cope With Negative Events

The following items deal with ways you religiously cope with negative events in your life. There are many different ways of religious coping and different people deal with things in different ways. Each item below says something about a particular way of religious coping. I want to know how much or how frequently you do what each item says. I want to know what you do to religiously cope with negative events. Do not answer on the basis of what worked or not – just whether you do it and how frequently you do it. Try to rate each item in your mind separately from the others.

<table>
<thead>
<tr>
<th>Circle the answer that best applies to you. Make your answers at true for you as you can.</th>
<th>Not At All</th>
<th>Somewhat</th>
<th>Quite A Bit</th>
<th>A Great Deal</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I look for a stronger connection with God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>2. I seek God’s love and care.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>3. I seek help from God in letting go of my anger.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>4. I try to put my plans into action together with God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>5. I try to see how God might be trying to strengthen me in this situation.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>6. I ask forgiveness for my sins.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>7. I focus on religion to stop worrying about my problems.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>8. I wonder whether God has abandoned me.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>9. I feel punished by God for my lack of devotion.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>10. I wonder what I did for God to punish me.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>11. I question God’s love for me.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>12. I wonder whether my church has abandoned me.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>13. I decide the devil makes things happen.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>14. I question the power of God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
How I Perceive My Parent Applies Religion to Cope With Negative Events

For the following items think about the one parent with whom you have spent the most time. The items deal with ways you might perceive your parent religiously coping with negative events. Each item below says something about a particular way of religious coping. I want to know how much or how frequently you have perceived your parent doing what each item says. Do not answer on the basis of what worked or didn’t work for them – just whether you perceive him/her doing what the item says and how much you perceive it. Try to rate each item in your mind separately from the others.

<table>
<thead>
<tr>
<th>Circle the answer that best applies to you. Make your answers at true for you as you can.</th>
<th>Not At All</th>
<th>Somewhat</th>
<th>Quite A Bit</th>
<th>A Great Deal</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. My parent looks for a stronger connection with God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>2. My parent seeks God’s love and care.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>3. My parent seeks help from God in letting go of his/her anger.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>4. My parent tries to put his/her plans into action together with God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>5. My parent tries to see how God might be trying to strengthen him/her when he/she has problems.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>6. My parent asks forgiveness for his/her sins.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>7. My parent focuses on religion to stop worrying about his/her problems.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>8. My parent wonders whether God abandons him/her.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>9. My parent feels God punishes him/her for his/her lack of devotion.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>10. My parent wonders what he/she did when he/she thinks God punishes him/her.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>11. My parent questions God’s love for him/her.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>12. My parent wonders whether his/her church abandons him/her.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>13. My parent decides the devil makes things happen.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>14. My parent questions the power of God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
How I Perceive My Friend Applies Religion to Cope With Negative Events

For the following items think about your *friend with whom you have spent the most time*. The items deal with ways you might perceive your friend religiously coping with negative events. Each item below says something about a particular way of religious coping. I want to know how much or how frequently you have perceived your friend doing what each item says. Do not answer on the basis of what worked or didn’t work for them – just whether you perceive him/her doing what the item says and how much you perceive it. Try to rate each item in your mind separately from the others.

<table>
<thead>
<tr>
<th>Circle the answer that best applies to you. Make your answers at true for you as you can.</th>
<th>Not At All</th>
<th>Somewhat</th>
<th>Quite A Bit</th>
<th>A Great Deal</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. My friend looks for a stronger connection with God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>2. My friend seeks God’s love and care.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>3. My friend seeks help from God in letting go of his/her anger.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>4. My friend tries to put his/her plans into action together with God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>5. My friend tries to see how God might be trying to strengthen him/her when he/she has problems.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>6. My friend asks forgiveness for his/her sins.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>7. My friend focuses on religion to stop worrying about his/her problems.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>8. My friend wonders whether God abandons him/her.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>9. My friend feels God punishes him/her for his/her lack of devotion.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>10. My friend wonders what he/she did when he/she thinks God is punishing him/her.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>11. My friend questions God’s love for him/her.</td>
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<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>12. My friend wonders whether his/her church abandons him/her.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>13. My friend decides the devil makes things happen.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>14. My friend questions the power of God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
Congratulations! You are finished!

To get experimental credit please do the following:

1. Write your BGSU “P” number on the line at the left: P___________________
   Your “P” number will be used to assign you one experimental credit.

2. Check that you have answered all questions and provided the address of a parent
   and a friend in order to be eligible for experimental credit.

3. Fill out all the information on the raffle ticket attached below.

4. Hand the survey to me or the teaching assistants to check for completion.

5. After your survey has been checked for completion, if eligible, I or the teaching
   assistant will detach your raffle ticket. They will keep this page with the “P” number
   (in order to assign credit) and give you the raffle ticket to put in the raffle box.
APPENDIX E

PARENTS’ LETTER AND CONSENT FORM
Dear _________,

(Mom/Dad)

Hi! I just participated in an experiment to receive credit for my Introduction to Psychology class and/or to maybe win a $25 Meijer Gift Card. The study is examining how close relationships are related to a person’s religious attitudes when they cope with a stressful event.

To make the study a success, the researcher needs your help. She needs you to complete the enclosed survey and return it to her as soon as possible. There is a checklist and one short questionnaire for you to complete, and it will only take you about 15 minutes. The statement below tells you more about it. When you finish the survey, please put it back into the enclosed self-addressed stamped envelope and drop it in the mail.

Thanks for helping out with this study. Studies like this help maintain Bowling Green’s reputation as a research institution – and may even improve the value of my education (and your tuition dollars!).

Thanks!!

_________________
Student Signature
Survey About Close Relationships, Stress, and Religious Attitudes
Parent Informed Consent

Dear Parent,

My name is Ellen Cullman and I am a graduate student at Bowling Green State University. I am conducting a research project toward the completion of my Ph.D. degree in Clinical Psychology. Below is some information about my project that will let you know what to expect. If you have any questions please do not hesitate to contact me. My contact information is at the end of this consent statement. Thank you for your participation.

Sincerely,

Ellen Cullman, M.A.
Clinical Psychology

Purpose
The purpose of this research project is to examine how close relationships are related to a person’s religious beliefs and attitudes when they cope with a stressful event. This study is being conducted for the completion of my dissertation.

Informed Consent
Once you have read this statement, you can e-mail me (ecullma@bghost.net) if you have questions about your decision to participate in this study. The completion and return of the survey indicates your consent to participate in it. This informed consent statement is yours to keep.

Participation
Participation requires you to complete the enclosed survey booklet and return it to me using the self-addressed stamped envelope included with the booklet.

The survey will ask you to report demographic information about yourself (age, gender, education, etc.) and your religious attitudes and beliefs when coping with a stressful event that occurred within the past year. The survey will take you about 15 minutes to complete.

Procedure
Your student son or daughter at Bowling Green State University gave me your address to send you this survey. He/she heard about this study from an announcement in psychology class, from the psychology department’s web site, or from a notice posted on bulletin boards around campus.

If you volunteer to fill out the enclosed survey, please read carefully the instructions on the front of the survey booklet, open the booklet, and start. When you
are finished, please check that all questions on the survey have been completed, insert the booklet into the self-addressed stamped envelope, and drop it in the mail.

**Participant Rights**

The procedures in this study are arranged so that the information you provide will be kept confidential or private. This means that no one will be able to connect your name or your son or daughter’s name to any survey that was completed by you or them. The number at the top left side of the survey pages is for matching your survey with your BGSU son or daughter’s survey and does not serve in any way to identify you or your son or daughter. To make sure that your answers remain completely private and confidential, you are not to write your name or put any marks on the front or inside the survey booklet that would identify you personally.

Your participation in this project is voluntary. You may withdraw from the study at any time without penalty.

**Benefits**

This project will offer insight into the development of religious attitudes in late adolescence and provide information about how family and friends affect that development. The primary benefit of your participation is that you will help psychologists and society better understand how religious attitudes develop and the role of parents and friends in that development. You may also learn more about how psychological research is conducted. If you would like a copy of the results of this project, please e-mail to me your name and address and I will be sure a copy is sent to you when the study is completed.

**Contact Information**

If you have questions about this research study, you may contact me or my faculty advisor. I can be reached at 419-494-7699 and by e-mail at eculma@bghost.net. My faculty advisor is Dr. Eric Dubow. He may be reached at 419-372-2301 or edubow@bgnet.bgsu.edu.

If you have questions regarding the conduct of this study or about your rights as a research participant, you may contact the Chair of Bowling Green State University’s Human Subjects Review Board at 419-372-7716 or hsrb@bgnet.bgsu.org.
APPENDIX F

FRIEND LETTER AND CONSENT FORM
Dear ________,

(Friend)

Hi! I just participated in an experiment to receive credit for my Introduction to Psychology class and/or to maybe win a $25 Meijer Gift Card. The study is examining how close relationships are related to a person’s religious attitudes when they cope with a stressful event.

To make the study a success, the researcher needs your help. She needs you to complete the enclosed survey and return it to her as soon as possible. There is a checklist and one short questionnaire for you to complete, and it will only take you about 15 minutes. The statement below tells you more about it. When you finish completing the survey, just put it back into the enclosed self-addressed stamped envelope and drop it in the mail.

Thanks for helping out with this study. Studies like this help maintain Bowling Green’s reputation as a research institution – and may even improve the value of our education and a future job!

Thanks!!

_________________

Student Signature
Dear Friend,

My name is Ellen Cullman and I am a graduate student at Bowling Green State University. I am conducting a research project toward the completion of my Ph.D. degree in Clinical Psychology. Below is some information about my project that will let you know what to expect. If you have any questions please do not hesitate to contact me. My contact information is at the end of this consent statement. Thank you for your participation.

Sincerely,

Ellen Cullman, M.A.
Clinical Psychology

Purpose
The purpose of this research project is to examine how close relationships are related to a person’s religious beliefs and attitudes when they cope with a stressful event. This study is being conducted for the completion of my dissertation.

Informed Consent
Once you have read this statement, you can e-mail me (ecullma@bghost.net) if you have questions about your decision to participate in this study. The completion and return of the survey indicates your consent to participate in it. This informed consent statement is yours to keep.

Participation
Participation requires you to complete the enclosed survey booklet and return it to me using the self-addressed stamped envelope included with the booklet.

The survey will ask you to report demographic information about yourself (age, gender, education, etc.) and your religious attitudes and beliefs when coping with a stressful event that occurred within the past year. The survey will take you about 15 minutes to complete.

Procedure
Your friend, a student at Bowling Green State University gave me your address to send you this survey. He/she heard about this study from either an announcement in psychology class, from the psychology department’s web site, or from a notice posted on bulletin boards around campus.

If you volunteer to fill out the enclosed survey, please read carefully the instructions on the front of the survey booklet, open the booklet, and start. When you
are finished, please check that all questions on the survey have been completed, insert the booklet into the self-addressed stamped envelope, and drop it in the mail.

**Participant Rights**

The procedures in this study are arranged so that the information you provide will be kept confidential or private. This means that no one will be able to connect your name or your BGSU friend’s name to any survey that was completed by you or them. The number at the top left side of the survey pages is for matching your survey with your BGSU friend’s survey and does not serve in any way to identify you or your friend. To make sure that your answers remain completely private and confidential, you are not to write your name or put any marks on the front or inside the survey booklet that would identify you personally.

Your participation in this project is voluntary. You may withdraw from the study at any time without penalty.

**Benefits**

This project will offer insight into the development of religious attitudes in late adolescence and provide information about how family and friends affect that development. The primary benefit of your participation is that you will help psychologists and society better understand how religious attitudes develop and the role of parents and friends in that development. You may also learn more about how psychological research is conducted. If you would like a copy of the results of this project, please e-mail to me your name and address and I will be sure a copy is sent to you when the study is completed.

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If you have questions regarding the conduct of this study or about your rights as a research participant, you may contact the Chair of Bowling Green State University’s Human Subjects Review Board at 419-372-7716 or hsrb@bgnet.bgsu.org.
APPENDIX G

PARENT SURVEY
Survey Instructions

Keep in mind four things when completing this survey:

1. Please read and follow the directions carefully.

2. Please try to not skip any questions.

3. If you have questions that would prevent you from completing the survey, please try to contact me so I can help you. (Ellen at 1-800-352-1899; 419-494-7699; ecullman@bgnet.bgsu.net)

4. There are no right or wrong answers. The best answer most clearly reflects your point of view.

Thank you for your time and participation,

Ellen P. Cullman, M.A.,
Clinical Psychology
Demographic Information

Please check the appropriate response to each item below as it applies to you.

1. Sex: ___ Male (1) ___ Female (2)

2. Age: ___

3. Race: ___ White (1) ___ Black (2) ___ Hispanic (3) ___ American (4) ___ Other (5) please specify

4. Marital Status: ___ Single (1) ___ Married (2) ___ Divorced (3) ___ Widowed (4)

5. Which of the following categories best describes your current religious affiliation?

___ Catholic (1) ___ Protestant (2) ___ Jewish (3) ___ None (4) ___ Other (5) please specify

6. How important is religion in your life?

extremely ___ important (5) very ___ important (4) moderately ___ important (3) slightly ___ important (2) not ___ important (1)

7. How often do you attend religious services?

several ___ times (9) every ___ nearly times (8) 2–3 times ___ about once times (7) about once ___ times (6) less than once ___ times (5) less than once ___ or twice ___ times a week (4) once a week (3) once a month (2) ___ never (1)

8. How often do you pray privately in places other than at the church or synagogue?

more than ___ times a week (8) once a week (7) ___ less than once a week (6) ___ times a month (5) once a month (4) ___ less than once a month (3) ___ year (2) ___ never (1)

9. Your highest level of education:

___ Graduate or professional training (7)
___ College graduate (4 years) (6)
___ Partial college (5)
___ High school graduate (4)
___ Some high school (10th or higher) (3)
___ Junior high school graduate (2)
___ Less than 7th grade (1)
Life Events and Religious Coping Check List

Instructions: Below is a list of events that sometimes happen to people.
1. Read over the entire list of events.
2. Circle each event you have experienced during the past year.
3. Write life events that were important to you but not listed on the lines provided at the end.
4. For each event CIRCLE the number in the column that indicates how important your religious faith was when coping with that event.

<table>
<thead>
<tr>
<th>Circle events you experienced in the past year</th>
<th>IMPORTANCE OF RELIGION WHEN I COPED WITH THE EVENT</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Not At All</td>
</tr>
<tr>
<td>1. Death of a spouse.</td>
<td>1</td>
</tr>
<tr>
<td>2. Death of a son or daughter.</td>
<td>1</td>
</tr>
<tr>
<td>3. Death of a close friend.</td>
<td>1</td>
</tr>
<tr>
<td>4. Serious illness or injury to a close family member.</td>
<td>1</td>
</tr>
<tr>
<td>5. Serious illness or injury to a close friend.</td>
<td>1</td>
</tr>
<tr>
<td>6. Major personal illness or injury.</td>
<td>1</td>
</tr>
<tr>
<td>7. Moving to a new home.</td>
<td>1</td>
</tr>
<tr>
<td>8. Being laid off from work.</td>
<td>1</td>
</tr>
<tr>
<td>9. Being fired from a job.</td>
<td>1</td>
</tr>
<tr>
<td>10. Problems or worries with people at work.</td>
<td>1</td>
</tr>
<tr>
<td>11. Trouble with in-laws.</td>
<td>1</td>
</tr>
<tr>
<td>12. Marital difficulties.</td>
<td>1</td>
</tr>
<tr>
<td>13. Separated from spouse.</td>
<td>1</td>
</tr>
<tr>
<td>14. Divorced from spouse.</td>
<td>1</td>
</tr>
<tr>
<td>15. Increase in number of arguments with your children.</td>
<td>1</td>
</tr>
<tr>
<td>Circle events you experienced in the past year</td>
<td>IMPORTANCE OF RELIGION WHEN I COPED WITH THE EVENT</td>
</tr>
<tr>
<td>----------------------------------------------------------------------------------------------------------------</td>
<td>---------------------------------------------------</td>
</tr>
<tr>
<td>16. Change in responsibilities at work.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>17. Your parents enter a rest home.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>18. Your in-laws enter a rest home.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>19. Immediate family member drinks heavily.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>20. Worries about behavior problems with own children.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>21. Getting into debt beyond means of repayment.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>22. Major decrease in family income.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>23. Foreclosure of mortgage or loan.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>24. Problems with major change in social and recreational activities.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>25. Son or daughter leaving home.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>26. Difficulty with nation being at war.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>27.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>28.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>29.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>30.</td>
<td>1 2 3 4</td>
</tr>
<tr>
<td>31.</td>
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</tr>
<tr>
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How I Apply My Religion to Cope With Negative Events

The following items deal with ways you religiously cope with negative events in your life. There are many different ways of religious coping and different people deal with things in different ways. Each item below says something about a particular way of religious coping. I want to know how much or how frequently you do what each item says. I want to know **what you do to religiously cope with negative events**. Do not answer on the basis of what worked or not – just whether you do it and how frequently you do it. Try to rate each item in your mind separately from the others.

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<th>Somewhat</th>
<th>Quite A Bit</th>
<th>A Great Deal</th>
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<td></td>
<td></td>
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<td>4</td>
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<td>3</td>
<td>4</td>
</tr>
<tr>
<td>13. I decide the devil makes things happen.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>14. I question the power of God.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
APPENDIX H

FRIEND SURVEY
Survey Instructions

Keep in mind four things when completing this survey:

1. Please read and follow the directions carefully.

2. Please try to not skip any questions.

3. If you have questions that would prevent you from completing the survey, please try to contact me so I can help you. (Ellen at 1-800-352-1899; 419-494-7699; ecullman@bgnet.bgsu.net)

4. There are no right or wrong answers. The best answer most clearly reflects your point of view.

Thank you for your time and participation,

Ellen P. Cullman, M.A.,
Clinical Psychology
Demographic Information

Please check the appropriate response to each item below as it applies to you.

1. Sex: ___ Male(1) ___ Female(2)

2. Age: ___

3. Race: ___ White(1) ___ Black(2) ___ Hispanic(3) ___ American(4) ___ Other(5) 
___ please specify

4. Your Parent’s Marital Status: ___ Single(1) ___ Married(2) ___ Divorced(3) ___ Widowed(4)

5. Year in School: ___ Freshman(1) ___ Sophomore(2) ___ Junior(3) ___ Senior(4) ___ Other(5)

6. Which of the following categories best describes your current religious affiliation?
___ Catholic(1) ___ Protestant(2) ___ Jewish(3) ___ None(4) ___ Other(5) 
___ please specify

7. How important is religion in your life?
___ extremely important(5) ___ very important(4) ___ moderately important(3) ___ slightly important(2) ___ not important (1)

8. How often do you attend religious services?
___ several times(9) ___ nearly every week(8) ___ every week(7) ___ 2–3 times a month(6) ___ a month(5) ___ about once a year(4) ___ less than once a year(3) ___ less than once a year(2) ___ never(1)

9. How often do you pray privately in places other than at the church or synagogue?
___ more than once a week(8) ___ once a week(7) ___ once a month(6) ___ less than once a month(5) ___ once a month(4) ___ less than once a month(3) ___ less than once a month(2) ___ never(1)

10. Your mother and father’s highest level of education:

   Your Mother   Your Father
___ Graduate or professional training(7) ___ Graduate or professional training(7)
___ College graduate (4 years)(6) ___ College graduate (4 years)(6)
___ Partial college(5) ___ Partial college(5)
___ High school graduate(4) ___ High school graduate(4)
___ Some high school (10th or higher)(3) ___ Some high school (10th or higher)(3)
___ Junior high school graduate(2) ___ Junior high school graduate(2)
___ Less than 7th grade(1) ___ Less than 7th grade(1)
Life Events and Religious Coping Check List

Instructions: Below is a list of events that sometimes happen to people.

1. Read over the entire list of events.
2. Circle each event you have experienced during the past year.
3. Write life events that were important to you but not listed on the lines provided at the end.
4. For each event CIRCLE the number in the column that indicates how important your religious faith was when coping with that event.

<table>
<thead>
<tr>
<th>IMPORTANCE OF RELIGION WHEN I COPED WITH THE EVENT</th>
<th>Not At All</th>
<th>Somewhat</th>
<th>Quite A Bit</th>
<th>A Great Deal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Circle events you experienced in the past year</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. Death of a close family member.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>2. Death of a close friend</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>3. Serious illness or injury to a close family member.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>4. Serious illness or injury to a close friend.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>5. Major personal illness or injury.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>6. Problems with leaving home.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>7. Failing an important exam.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>8. Failing a course.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>9. Academic probation.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>10. Problems with roommate(s).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>11. Problems with boyfriend or girlfriend.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>12. Problems with close friend(s).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>13. Pressure to drink and/or take drugs.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>14. Increase in family arguments.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>15. Your parents separate.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>Circle events you experienced in the past year</td>
<td>IMPORTANCE OF RELIGION WHEN I COPED WITH THE EVENT</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>-----------------------------------------------------------------------------------------------------------------</td>
<td>-----------------------------------------------</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>16. Your parents divorce.</td>
<td>Not At All</td>
<td>Somewhat</td>
<td>Quite A Bit</td>
<td>A Great Deal</td>
</tr>
<tr>
<td>17. Increase in number of arguments you have with your parents.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>18. Sexual relationship problems (e.g., pressure to have sex).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>19. Unwanted pregnancy (if female) or girlfriend has unwanted pregnancy (if male).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>20. Having an abortion (if female) or girlfriend has an abortion (if male).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>21. Major decrease in family income.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>22. Difficulty getting job.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>23. Financial problems with school (e.g., tuition, room and board).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>24. Church problems (e.g., difficulty finding a church; problems attending a church, different, fewer, or increased church activities).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>25. Problems with major change in social activities (e.g., parties, movies, visiting friends).</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>26. Conviction for a minor law violation such as speeding or drunkenness.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>27. Problems or worries with deciding on a major.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>28. Difficulties or worries with making new friends.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>29. Problems or worries with living in a dormitory.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>30. Problems or worries with the nation being at war.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>31.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
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<tr>
<td>32.</td>
<td>1</td>
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<td>13. I decide the devil makes things happen.</td>
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<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
APPENDIX I

HIERARCHICAL REGRESSION TABLES I.1–I.4
Table I-1
Hierarchical Multiple Regressions of Students’ Positive Brief RCOPE on Demographic Variables, Parents’ Actual Brief RCOPE, and Students’ Attachment to Parent

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>( \Delta R^2 )</th>
<th>( F )</th>
<th>( \beta )</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Step 1: Demographic Variables</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>.31</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Race(^b)</td>
<td>.08</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Religious Affiliation(^c)</td>
<td>.33(^*)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Total(^d)</td>
<td>.28(^*)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>( F ) Value for Step</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>( F(4, 96) = 10.56^{**} )</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Step 2: Attachment and RCOPE</strong></td>
<td>.08</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Attachment to Parent</td>
<td>.17(^*)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Parent Positive RCOPE</td>
<td>.30(^*)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>( F ) Value for Step</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>( F(2, 94) = 6.53^{*} )</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Step 3: Interactions</strong></td>
<td>.00</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Attachment to Parent x Actual Parent Positive RCOPE</td>
<td>.06</td>
<td></td>
<td></td>
</tr>
<tr>
<td>( F ) Value for Step</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>( F(1, 93) = 0.58 )</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

\(^a\)Brief Religious Coping. \(^b\)Race (Caucasian = 1, Other = 2). \(^c\)Religious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). \(^d\)Mean Student Stressful Event Total.

\(^*\)\( p < .10 \). \(^{*}\)\( p < .05 \). \(^{**}\)\( p < .01 \).
Table I-2
Hierarchical Multiple Regressions of Students’ Positive Brief RCOPE\(^a\) on Demographic Variables, Students’ Perceived Parent Brief RCOPE, and Students’ Attachment to Parent

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>(\Delta R^2)</th>
<th>(F)</th>
<th>(\beta)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Step 1: Demographic Variables</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td>.32</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Race(^b)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Religious Affiliation(^c)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Total(^d)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>(F) Value for Step</td>
<td>(F (4, 133) = 15.49^{**})</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Step 2: Attachment and RCOPE</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Attachment to Parent</td>
<td></td>
<td></td>
<td>.04</td>
</tr>
<tr>
<td>Actual Parent Positive RCOPE</td>
<td></td>
<td></td>
<td>.57**</td>
</tr>
<tr>
<td>(F) Value for Step</td>
<td>(F (2, 131) = 34.58^{**})</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Step 3: Interactions</td>
<td></td>
<td></td>
<td>.00</td>
</tr>
<tr>
<td>Student Attachment to Parent x Actual Parent Positive RCOPE</td>
<td></td>
<td></td>
<td>.04</td>
</tr>
<tr>
<td>(F) Value for Step</td>
<td>(F (1, 130) = 0.46)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

\(^a\)Brief Religious Coping. \(^b\)Race (Caucasian = 1, Other = 2). \(^c\)Religious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). \(^d\)Mean Student Stressful Event Total.

\(* p < .05. \quad ** p < .01.)
Table I-3
Hierarchical Multiple Regressions of Students’ Positive Brief Positive RCOPE\(^a\) on Demographic Variables, Friends’ Actual Brief RCOPE, and Students’ Attachment to Friend

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>(\Delta R^2)</th>
<th>(F) Value for Step</th>
</tr>
</thead>
<tbody>
<tr>
<td>Step 1: Demographic Variables</td>
<td>.32</td>
<td>(F (4, 53) = 6.19^{**})</td>
</tr>
<tr>
<td>Age</td>
<td>.12</td>
<td></td>
</tr>
<tr>
<td>Race(^b)</td>
<td>.25(^*)</td>
<td></td>
</tr>
<tr>
<td>Religious Affiliation(^c)</td>
<td>.34(^*)</td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Total(^d)</td>
<td>.28(^*)</td>
<td></td>
</tr>
<tr>
<td>Step 2: Attachment and RCOPE</td>
<td>.03</td>
<td>(F (2, 51) = 1.09)</td>
</tr>
<tr>
<td>Attachment to Parent</td>
<td>.07</td>
<td></td>
</tr>
<tr>
<td>Actual Parent Positive RCOPE</td>
<td>.15</td>
<td></td>
</tr>
<tr>
<td>Step 3: Interactions</td>
<td>.01</td>
<td>(F (1, 50) = 0.55)</td>
</tr>
<tr>
<td>Student Attachment to Parent x Actual Parent Positive RCOPE</td>
<td>.09</td>
<td></td>
</tr>
</tbody>
</table>

\(^a\)Brief Religious Coping. \(^b\)Race (Caucasian = 1, Other = 2). \(^c\)Religious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). \(^d\)Mean Student Stressful Event Total.

\(^* p < .10. \,** p < .01.\)
## Table I-4

*Hierarchical Multiple Regressions of Students’ Positive Brief RCOPE* on Demographic Variables, Students’ Perceived Friend Brief RCOPE, and Students’ Attachment to Friend

<table>
<thead>
<tr>
<th>Predictor Variable</th>
<th>$\Delta R^2$</th>
<th>$F$</th>
<th>$\beta$</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Step 1: Demographic Variables</strong></td>
<td>.32</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Age</td>
<td></td>
<td>.15*</td>
<td></td>
</tr>
<tr>
<td>Race</td>
<td></td>
<td>.17*</td>
<td></td>
</tr>
<tr>
<td>Religious Affiliation</td>
<td></td>
<td>.34**</td>
<td></td>
</tr>
<tr>
<td>Student Stressful Event Total</td>
<td></td>
<td>.27**</td>
<td></td>
</tr>
<tr>
<td>$F$ Value for Step</td>
<td></td>
<td>$F (4, 132) = 15.38^{**}$</td>
<td></td>
</tr>
<tr>
<td><strong>Step 2: Attachment and RCOPE</strong></td>
<td>.20</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Attachment to Parent</td>
<td></td>
<td>.04</td>
<td></td>
</tr>
<tr>
<td>Actual Parent Positive RCOPE</td>
<td></td>
<td>.48**</td>
<td></td>
</tr>
<tr>
<td>$F$ Value for Step</td>
<td></td>
<td>$F (2, 130) = 27.77^{**}$</td>
<td></td>
</tr>
<tr>
<td><strong>Step 3: Interactions</strong></td>
<td>.01</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student Attachment to Parent x Actual Parent Positive RCOPE</td>
<td></td>
<td>.12+</td>
<td></td>
</tr>
<tr>
<td>$F$ Value for Step</td>
<td></td>
<td>$F (1, 129) = 3.24^{+}$</td>
<td></td>
</tr>
</tbody>
</table>

*Brief Religious Coping. *Race (Caucasian = 1, Other = 2). *Religious Affiliation (None = 1, Any (includes Protestant, Catholic, Jewish, other, system missing) = 2). *Mean Student Stressful Event Total.

$^{+} p < .10. \quad ^{*} p < .05. \quad ^{**} p < .01.$
APPENDIX J

CORRELATIONS FOR ATTACHMENT AND RELIGIOUS COPING

AMONG STUDENTS, PARENTS, AND FRIENDS
## Table J-1
Correlations for Attachment and Religious Coping Among Students, Parents, and Friends

<table>
<thead>
<tr>
<th></th>
<th>Total Attachment</th>
<th>Student RCOPE&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Parent RCOPE</th>
<th>Friend RCOPE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td>Actual</td>
<td>Perceived</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Positive</td>
<td>Negative</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>To Parent</td>
<td>To Friend</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Positive</td>
<td>Negative</td>
</tr>
<tr>
<td>Total Attachment</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>To Parent</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>To Friend</td>
<td>.25**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Student RCOPE</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td>.14</td>
<td>.13</td>
<td>.07</td>
<td>1.00</td>
</tr>
<tr>
<td>Actual Negative</td>
<td>–.24**</td>
<td>–.14</td>
<td>.07</td>
<td>1.00</td>
</tr>
<tr>
<td>Parent RCOPE</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td>–.07</td>
<td>–.02</td>
<td>.48**</td>
<td>–.06</td>
</tr>
<tr>
<td>Actual Negative</td>
<td>–.02</td>
<td>.04</td>
<td>–.18</td>
<td>.07</td>
</tr>
<tr>
<td>Perceived Positive</td>
<td>.16</td>
<td>.08</td>
<td>.70**</td>
<td>.01</td>
</tr>
<tr>
<td>Perceived Negative</td>
<td>–.20*</td>
<td>–.15</td>
<td>.01</td>
<td>.50**</td>
</tr>
<tr>
<td>Friend RCOPE</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Actual Positive</td>
<td>.08</td>
<td>.24</td>
<td>.37**</td>
<td>.01</td>
</tr>
<tr>
<td>Actual Negative</td>
<td>.08</td>
<td>–.11</td>
<td>–.17</td>
<td>.17</td>
</tr>
<tr>
<td>Perceived Positive</td>
<td>.15</td>
<td>.21*</td>
<td>.63**</td>
<td>.00</td>
</tr>
<tr>
<td>Perceived Negative</td>
<td>–.05</td>
<td>–.19*</td>
<td>.15</td>
<td>.49**</td>
</tr>
</tbody>
</table>

Note. N's range from 53 to 143.
<sup>a</sup>Religious Coping.

*p < .10. *p < .05. **p < .01.