

Forgiveness, Attachment to God, and Mental Health Outcomes in Older U.S. Adults: A Longitudinal Study

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Abstract

We analyze a sample of older U.S. adults with religious backgrounds in order to examine the relationships among two types of divine forgiveness and three indicators of psychological well-being (PWB) as well as the moderating role of attachment to God. Results suggest that (a) feeling forgiven by God and transactional forgiveness from God are not associated with changes in PWB over time, (b) secure attachment to God at baseline is associated with increased optimism and self-esteem, (c) feeling forgiven by God and transactional forgiveness from God are more strongly associated with increased PWB among the securely attached, and (d) among the avoidantly attached, PWB is associated with consistency in one's beliefs, that is, a decreased emphasis on forgiveness from God. Findings underscore the importance of subjective beliefs about God in the lives of many older adults in the United States.

Keywords

religion, health, aging, life course, longitudinal, attachment to god

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The association between forgiveness and positive mental health outcomes has received considerable attention, and deservedly so, since individual well-being is tightly linked to the quality of a person's relationships (Ermer & Proulx, 2015; Harris & Thoresen, 2005; Witvliet & McCullough, 2007; Worthington, Witvliet, Pietrini, & Miller, 2007). And while many Americans work to maintain relationships with family, friends, and coworkers, they also find it meaningful to maintain a relationship with God. A sizable proportion of the U.S. population even considers personal relationship with God to be of paramount importance (Luhmann, 2012; Putnam & Campbell, 2010). Relatively few studies of forgiveness, however, focus on the religious aspects of forgiveness and its link with well-being (Davis, Hook, & Worthington Jr., 2008; Krause & Ellison, 2003; Uecker, Ellison, Flannelly, & Burdette, 2016).

In order to shed further light on these matters, we assess two types of forgiveness—feelings of forgiveness by God and belief in the need for reformed behavior to receive God's forgiveness—and three indicators of psychological well-being (PWB): optimism, self-esteem, and life satisfaction. We consider the nature of one's attachment to God and its association with PWB as well as how one's relationship with God might moderate the connection between forgiveness and mental health. We do so in an older population, a group of people with unique characteristics vis-à-vis religion and forgiveness. Older adults are more reflective about their relationship with God since they recognize their lives may soon come to an end (Allemand, Hill, Ghaemmaghami, & Martin, 2012), and according to the life review perspective, they use their remaining years to expiate guilt and resolve intrapsychic conflicts (Butler & Lewis, 1977). They tend to be more religious than younger adults, and coming to grips with their relationship with God may in turn be a high priority (Krause, 2004).

Individual differences moderate the impact of forgiveness on health (Griffin, Worthington, Lavelock, Wade, & Hoyt, 2015). Missing from studies of individual differences, however, is a consideration of how perceived relationship with God interacts with forgiveness to shape mental health outcomes. Attachment to God is an ideal construct to test this. Developed from Bowlby's (1969) pioneering work on childhood attachments, attachment to God is an indicator of the warmth and security an individual perceives in her relationship with God (Granqvist & Kirkpatrick, 2013; Hill & Pargament, 2008; Kirkpatrick, 2005; Rowatt & Kirkpatrick, 2002). In mental health studies, attachment to God is inversely related to psychological distress (Bradshaw, Ellison, & Marcum, 2010), secure attachment at baseline is associated with decreased distress over time (Ellison, Bradshaw, Kuyel, &

Marcum, 2012), and attachment to God reduces the effects of post-traumatic stress disorder (Mikulincer & Shaver, 2007).

However, few studies have examined attachment to God in the context of forgiveness (Davis et al., 2008). Forgiveness is a central teaching of many world religions, and religious believers take their faith into account when they engage in acts of forgiveness (Cohen, Malka, Rozin, & Cherfas, 2006; Rye et al., 2001). The perceived relationship with God, therefore, needs to be examined. We do so in a sample of older U.S. adults with a religious background by testing the relationships among two measures of forgiveness and three aspects of mental health. In each of these six possible relationships, we test whether (a) the main effect of forgiveness on mental health persists over time, (b) the main effect of attachment to God on mental health persists over time, and (c) the moderating effect of attachment to God and forgiveness persists over time.

Theoretical and Empirical Background

Forgiveness and Well-Being

Forgiveness appears to be good for mental health (Allemand et al., 2012; Lawler-Row & Piferi, 2006; Toussaint & Friedman, 2009; Toussaint, Williams, Musick, & Everson, 2001). Trait forgiveness of others (the disposition toward being a forgiving person) is associated with higher subjective well-being, lower depression and reduced stress, and markers of successful aging (Lawler-Row & Piferi, 2006). Although some research suggests forgiveness operates by reducing anger, which is linked to stress and heart disease (Witvliet, 2001), other research suggests effects independent of anger reduction (Harris & Thoresen, 2005). Nearly all studies agree, however, that forgiving another person promotes the health of interpersonal relationships by facilitating healing after inevitable transgressions occur (McCullough, 2000). The individual benefits by experiencing increased harmony and decreased psychological strain (Lawler-Row, Hyatt-Edwards, Wuensch, & Karremans, 2011).

Given these findings, the ability to forgive others is likely good for psychological health (Lawler et al., 2005; Witvliet, Ludwig, & Vander Laan, 2001). Most research on forgiveness, however, focuses on interpersonal forgiveness. Comparatively little research has focused on being forgiven by God, despite the fact that Americans' understanding of forgiveness has deep religious roots (Rye et al., 2001). Toussaint et al. (2001) found that forgiveness of others plays a more significant role in PWB and life satisfaction than does feeling forgiven by God. Krause and

Ellison (2003) demonstrated the way older adults go about forgiving is important: Those who require offenders to perform acts of contrition experience higher levels of psychological distress than those who forgive freely and unconditionally. They also found that those who feel forgiven by God are more likely to forgive unconditionally. McConnell and Dixon (2012) found that individual belief in the efficacy of God's forgiveness increases likelihood of self-forgiveness while general belief in a forgiving God does not. Finally, Uecker et al. (2016) found that belief in human sin is predictive of negative psychiatric symptoms, but that belief in God's forgiveness attenuates this relationship.

Why would forgiveness by God improve mental health? Religious dogmas, particularly within conservative Christianity, emphasize the sinfulness of the individual (Uecker et al., 2016). Belief in sinfulness has been labeled by psychotherapists as deeply harmful to the individual and incompatible with sound mental health (Branden, 2000; Watters, 1992). For those that embrace such doctrines, however, forgiveness is offered as a counteractive salve. Religious believers who effectively appropriate God's forgiveness are likely to experience good mental health. Whether or not belief in sin causes distress in the first place is not at issue here; rather, our purpose is to explain why forgiveness might result in positive mental health outcomes. This line of reasoning is consistent with Watson, Morris, and Hood's (1988) finding that the negative effects of guilt are minimized when counteracted by belief in God's forgiveness.

But what of those who no longer believe in God, or who experience a cold or distant relationship with God? Such a relationship may also be associated with changed attitudes about sin, guilt, or the very necessity of forgiveness. Hayward, Krause, Ironson, Hill, and Emmons (2016) report that atheists and agnostics tend to have worse PWB than religious affiliates or those with no preference. Individuals who have intellectually rejected the idea of God may lose a resource once available to them, or for some God might still demand reckoning, like a specter, even though religious belief has come to an end. Existing research suggests a complex (and unclear) relationship between divine forgiveness and mental health. Incorporating not just beliefs about God, but the nature of one's relationship with God—particularly one's style of attachment to God—may further clarify these relationships.

Attachment to God and Well-Being

Attachment to God is an extension of general attachment theory (Ainsworth, Blehar, Waters, & Wall, 2015; Bowlby, 1969), an influential framework that

describes the relationship between infants and their caretakers as an evolutionary-adaptive process of forming close-knit bonds. Caretakers who are warm, comforting, and available help children form *secure* attachment bonds, while those who are distant, cold, and unavailable tend to produce children with *avoidant* attachments. *Anxious* attachments are associated with caretakers who are inconsistent in their love and availability. These patterns of attachment form what are called internal working models, neurological and psychosocial constructs of what children come to expect in future relationships. Thus, securely attached children tend to grow into adults who form warm and secure attachments to friends, romantic partners, God, and even the workplace, while insecurely attached children (whether avoidant or anxious) struggle in forming adult attachments (Granqvist & Hagekull, 2003; Granqvist & Kirkpatrick, 2013; Kent, in press; Kent, Bradshaw, & Dougherty, 2016; Kirkpatrick & Shaver, 1992).

Attachment to God is a distinct type of attachment under the general umbrella of attachment theory (Ellison et al., 2012; Granqvist & Hagekull, 2003; Granqvist & Kirkpatrick, 2013; Kirkpatrick, 2005; Pargament, 1997). In the attachment paradigm, internal working models develop and operate in such a way that people form attachments across their entire range of relationships; attachment to God is one attachment domain among many (Kirkpatrick, 2005). Many Americans view their relationship with God as central (Luhmann, 2012), and thus their well-being is likely affected by the nature of that relationship. Unsurprisingly, then, salutary associations have been identified between secure attachment to God and life satisfaction, psychological distress, depression, and PWB (Bradshaw et al., 2010; Ellison et al., 2012; Kirkpatrick, Shillito, & Kellas, 1999; Kirkpatrick & Shaver, 1992).

Forgiveness, Attachment to God, and Well-Being

Attachment theory has largely been applied to forgiveness research using general attachment theory rather than attachment to God (Jankowski & Sandage, 2011; Lawler-Row et al., 2011; Lawler-Row, Younger, Piferi, & Jones, 2006). Securely attached individuals are more forgiving of specific offenses (state forgiveness) and also exhibit higher levels of trait forgiveness and positive emotion (Lawler-Row et al., 2006). Secure attachment has similarly been linked to a disposition to forgive (Jankowski & Sandage, 2011), and anxious or avoidant attachment styles are associated with reduced trait forgiveness (Davis et al., 2008). Lawler-Row et al. (2011) show attachment is indirectly associated with health problems through the pathway of

forgiveness. They conclude that tension can result from a lack of forgiveness in a relationship, which may lead to psychological distress.

Attachment to God has been applied in only one study of forgiveness (Davis et al., 2008). Davis and colleagues report that those with anxious and avoidant attachments to God experience reduced forgiveness for transgressions committed by others, but the relationship is fully mediated by religious coping. Scholars have not yet examined how one's relationship with God may moderate or buffer the association between various types of forgiveness and PWB, a gap this study seeks to fill. Just as religious involvement affects willingness to forgive (Mullet et al., 2003), attachment to God may moderate forgiveness in predicting PWB. Attachment to God describes the perceived emotional relationship with God, and individuals who feel close to God may more readily appropriate and benefit from feelings of forgiveness. How this applies to differing types of forgiveness is unknown, yet some speculation suggests several possibilities.

We examine feelings of forgiveness by God and belief in conditional forgiveness from God dependent on the individual's reformed behavior. Wink and Scott's (2005) consistency of belief hypothesis suggests that synchronicity between belief and practice is more salient for mental health outcomes than measures of religiousness per se. This suggests that where attachment to God and forgiveness beliefs coincide, the positive benefits of forgiveness are likely to increase. At the same time, those who are distant from God may depend on divine forgiveness less for their mental well-being, since God is less likely to be a primary attachment figure. Even conditional forgiveness based on the individual's changed behavior is likely to follow this pattern, since conditional forgiveness is based on the assumption that God is a personal being with whom one can make exchanges. This personal understanding of God and concomitant experiences of personal forgiveness from God are tightly bound together.

Age and Forgiveness

Older adults are an ideal population to study forgiveness, attachment to God, and mental health. Depressive symptoms begin to increase after reaching their nadir shortly after age 65 (Clarke & Wheaton, 2005). Older adults also more often report they are willing to forgive others, and when they do so, they experience larger increases in self-reported mental health than younger adults (Krause, 2004; Toussaint et al., 2001). Further, a lack of forgiveness in later life is linked to depressive symptoms among women (Ermer & Proulx,

2015), and trait forgiveness is higher among the elderly (Lawler-Row & Piferi, 2006).

Disentangling potential cohort effects in this process is difficult, but one compelling perspective, the life review process (Butler & Lewis, 1977), suggests that these phenomena are associated with age in general and not simply a particular generation. From this perspective, increased forgiveness among the elderly stems from the desire of older people to make sense of their lives and form their experiences and relationships into a coherent whole before their lives draw to a close. In one study, when sense of time was manipulated by having participants imagine they would be emigrating soon or receiving a drug which would prolong their life, those with shortened time manipulation displayed higher levels of forgiveness (Cheng & Yim, 2008). Moreover, when people have limited future-time perspectives, they actually benefit *more* from forgiveness (Allemand et al., 2012). Following the life review perspective, we argue that—at least for those with a theistic worldview, which is most Americans (Putnam & Campbell, 2010)—part of finishing life well entails making things right with God (Krause & Ellison, 2003).

But simply talking about a theistic worldview is not specific enough. Research on attachment to God suggests that PWB relates to consistency of belief, not just the direction of the attachment orientation (Bradshaw & Kent, in press). Those who are securely attached to God tend to experience positive outcomes when they act in accordance with their secure attachment orientation, and insecurely attached individuals tend to experience positive outcomes when they behave in accordance with their insecure orientation. Thus, one's relationship with God must be considered in order to understand whether or not someone would feel the need to seek forgiveness from God and in turn experience improved PWB after seeking that forgiveness.

Hypotheses

We anticipate secure attachment to God will be associated with positive changes in PWB. We also expect feelings of forgiveness will be associated with changes in PWB. The expected direction for being forgiven by God is positive, but we remain agnostic on the direction of transactional forgiveness. Transactional forgiveness may enable individuals to feel as if they are making a reliable bargain with a relational God, or it might spawn fear of being unable to fulfill the promise to change. These two scenarios suggest the possibility of both positive and negative outcomes related to transactional forgiveness. Finally, we expect variations in attachment to God will be associated with differential outcomes of forgiveness and PWB

Table 1. Descriptive Statistics.

Variable	Mean	SD	Min.	Max.
Optimism (W1)	3.146	0.538	1	4
Optimism (W2)	3.087	0.633	1	4
Self-esteem (W1)	3.444	0.494	1	4
Self-esteem (W2)	3.495	0.515	1	4
Life satisfaction (W1)	-0.008	0.808	-3.089	1.389
Life satisfaction (W2)	-0.007	0.796	-3.177	1.441
Secure attachment to God	3.535	0.592	1	4
Forgiven by God	0.513	—	0	1
Transactional forgiveness	2.991	0.646	1	4
Age	75.139	6.670	65	101
Female (Ref = male)	0.618	—	0	1
Black (Ref = White)	0.465	—	0	1
Married (Ref = not married)	0.473	—	0	1
Education	11.281	3.483	1	25
Income	6.414	2.491	1	10
Religious attendance	5.729	2.723	1	9
Prayer	5.774	1.877	0	7
Catholic	0.189	—	0	1
Protestant	0.732	—	0	1
Other Christian	0.050	—	0	1
No affiliation	0.029	—	0	1

Note. All statistics are from Wave 1 variables except for Wave 2 psychological well-being.

Data

Our data come from the Religion, Aging, and Health Survey. The survey includes two waves of public data (2001 and 2004) that provide the opportunity to explore the interactive effects of forgiveness and attachment to God on changes in PWB over time. Survey participants were Black and non-Hispanic White individuals who lived in the continental United States and were noninstitutionalized, English-speaking adults 65 years of age or older (see Table 1 for summary statistics). Participants were restricted to those who reported attending Christian churches on a regular basis or practicing the Christian faith at some point in their lives. Most respondents in the sample practiced at the time of the survey, with 40 individuals reporting former affiliation with Christianity. Muslims, Jews, and members of other religions were excluded because it is difficult to devise measures of religion that are suitable for persons of all faiths. Participants were drawn from all eligible persons in the Health Care Financing Administration Medicare Beneficiary

Eligibility List (now called Centers for Medicare and Medicaid Services), with Blacks oversampled. Data collection was conducted by Louis Harris and Associates (now Harris Interactive). A total of 1,500 interviews were obtained with an overall response rate of 62% for W1. When W2 was conducted, 75 participants refused, 81 were not eligible, 208 were deceased, and 112 could not be located. The final N for W2 was 1,024. Data from the Current Population Survey by the Census Bureau were used to weight the sample by age, sex, education, and region of the country. Sampling weights were also included to adjust for the oversampling of older Blacks. More detailed information on this data set can be found in Krause (2003).

Measures

Dependent variables. PWB was assessed with three measures taken at both W1 and W2 (see Krause, 2005, for details). Optimism was measured with the following 3 items ($\alpha = .84$ at W1 and $.86$ at W2): (a) "I'm optimistic about my future," (b) "In uncertain times, I usually expect the best," and (c) "I feel confident the rest of my life will turn out well." Response categories ranged from 1 = *strongly disagree* to 4 = *strongly agree*. The first 2 items were adapted from a scale developed by Scheier and Carver (1985), while the third was developed by Krause (2002).

Self-esteem was measured with an abbreviated 3-item scale originally developed by Rosenberg (1965). Specific items included (a) "I feel I am a person of worth or at least on an equal plane with others," (b) "I feel I have a number of good qualities," and (c) "I take a positive attitude toward myself." Response categories ranged from 1 = *strongly disagree* to 4 = *strongly agree* ($\alpha = .91$ at W1 and $.91$ at W2).

Life satisfaction was tapped with the following 3 items: (a) "As I look back on my life, I am fairly well satisfied," (b) "I would not change the past even if I could," and (c) "Now please think about your life as a whole. How satisfied are you with it?" The first 2 items, which were taken from the Life Satisfaction Index A (Neugarten, Havighurst, & Tobin, 1961), had response categories ranging from 1 = *strongly disagree* to 4 = *strongly agree*, while the third had response categories ranging from 1 to 5 with 1 = *not satisfied at all* to 5 = *completely satisfied*. Because these items did not have identical response categories, they were standardized, then summed and averaged. The Cronbach's α s were $.72$ and $.70$ at W1 and W2, respectively.

Key independent variables. Two different W1 measures of forgiveness were used in this study, both of which tapped a unique dimension of forgiveness.

The first measure of forgiveness asked whether respondents felt forgiven by God for wrongs committed. It was a single-item measure which read: "I believe God forgives me for the things I've done wrong." Response categories ranged from 1 to 4, with 1 = *strongly agree* and 4 = *strongly disagree*. There was not a lot of variation on the disagree end of this measure, so a single dichotomous variable for strongly agree compared with all others was constructed and used in all analyses. The results were comparable when we treated this measure as an ordinal variable and when more than two categories were created, so this coding does not appear to bias the findings.

The second measure of forgiveness asked whether individuals must change their behavior to receive forgiveness from God. This measure consisted of 3 items which read: "In order to be forgiven by God . . ." (a) ". . . I must ask God to forgive me," (b) ". . . I must promise God I will not make the same mistake again," and (c) ". . . I must correct what I have done wrong." Response categories ranged from 1 to 4, with 1 = *strongly agree* and 4 = *strongly disagree*. The items were reverse coded and then summed and averaged so that a stronger impulse toward transactional forgiveness received a higher score ($\alpha = .78$).

Perceived secure attachment to God was tapped at Wave I with 6 items which were summed then averaged ($\alpha = .91$): (a) "I have a close personal relationship with God," (b) "I feel that God is right here with me in everyday life," (c) "When I talk to God, I know he listens to me," (d) "God protects me," (e) "I look to God for strength in a crisis," and (f) "I look to God for guidance when difficult times arise." These items were also used as an attachment scale in Bradshaw and Kent (in press). Response categories for the first 4 items ranged from 1 = *strongly disagree* to 4 = *strongly agree*, while for the last two, they ranged 1 = *not at all* to 4 = *a great deal*.

Control variables. Several covariates were used as statistical controls in all regression models. These included age (in years), sex (*female* = 1), marital status (*married* = 1), race (*Black* = 1), income (1 = *less than US\$5,000* to 10 = *more than US\$80,000*), education (in years), prayer frequency (0 = *never* to 7 = *several times a day*), religious service attendance (1 = *never* to 9 = *more than once a week*), and religious affiliation (dummy variables for Protestant, Catholic, other Christian, and no affiliation). All respondents who reported no religious affiliation clarified on a subsequent item that they "used to be a Christian."

Analytic Strategy

Descriptive statistics were estimated, followed by longitudinal regression models. Since we are interested in changes in PWB over time, all models examined W2 PWB as dependent variables while controlling for W1 PWB. The three dependent variables were all continuous, so ordinary least squares (OLS) regression was used in all multivariate analyses. The models included both main and interactive effects of forgiveness and attachment to God on changes in PWB over time. All constitutive terms were mean centered prior to the construction of cross-product terms. We eliminated cases in which the respondent didn't know or refused to specify a religious affiliation preference. Given that the study was designed to capture responses only from Christians and former Christians, this choice resulted in the loss of only five cases. We executed multiple imputation techniques in Stata 13 to impute missing values for all W1 variables. Missing values were not imputed for W2 measures of PWB. The final *N* ranges from 1,014 to 1,023, depending upon which dependent variable is under investigation. All regression analyses were weighted to account for the sampling design.

Results

Table 1 shows descriptive statistics for all variables. PWB was high at both waves of data. Mean levels of optimism were 3.146 and 3.087 at Waves 1 and 2, respectively, on scales that ranged from 1 to 4. For self-esteem, the averages were 3.444 and 3.495, respectively. Averages were comparable for life satisfaction. Secure attachment to God had a mean of 3.535 on a 1–4 scale. Roughly half (51.3%) of the sample strongly agreed that they were forgiven by God, and the mean on the transactional forgiveness measure was 2.991 on a scale that ranged from 1 to 4. The average age was 75.139 years, 61.8% of the sample was female, 46.5% was Black, 58.5% had a high school education or more (with 11.281 mean years of education overall), and the average income was 6.414 on a 1–10 scale. Religious attendance had a mean of 5.729 on a 1–9 scale, and the average level of prayer was 5.774 on a 0–7 scale. In the sample, 18.9% reported being Catholic, 73.2% Protestant, 5% other Christian, and 2.9% no religious affiliation.

Tables 2 and 3 show the results of longitudinal OLS regression analyses. We expected that forgiveness by God would relate to increased PWB over time since forgiveness has been linked with reduced levels of depression and increased perceptions of physical health in previous studies (Ermer & Proulx, 2015; Wilson, Milosevic, Carroll, Hart, & Hibbard, 2008). We were agnostic

Table 2. OLS Parameter Estimates From the Regression of W2 Psychological Well-Being on W1 (Baseline) Psychological Well-Being, Secure Attachment to God, Forgiveness, and Control Variables.

Variable	Optimism		Self-Esteem		Life Satisfaction	
	(1)	(2)	(1)	(2)	(1)	(2)
W1 optimism/self-esteem/life satisfaction	.180***	.192***	.160***	.174***	.243***	.245***
Age	-.001	-.001	-.003	-.003	.000	.000
Female (Ref = male)	-.061	-.057	.014	.016	.031	.032
Black (Ref = White)	-.033	-.033	.017	.018	.080	.081
Married (Ref = not married)	-.007	-.010	.041	.040	.160**	.159**
Education	.007	.007	.011†	.011†	.017†	.017†
Income	.001	.001	.003	.003	.003	.003
Religious attendance	.029***	.029***	.001	.002	.008	.008
Prayer	.026	.023	-.006	-.008	-.013	-.013
Catholic (Ref = Protestant)	-.086†	-.086†	.007	.010	.064	.064
Other Christian (Ref = Protestant)	-.129	-.130	-.305***	-.300***	-.168†	-.168†
No affiliation (Ref = Protestant)	-.248†	-.248†	-.035	-.033	-.059	-.059
Secure attachment to God	.109*	.118*	.049‡	.068‡	.027	.031
Forgiven by God	.067	—	.064†	—	.017	—
Transactional forgiveness	—	.012	—	-.024	—	.001
Adjusted R ² (from non-imputed data)	.049	.047	.063	.056	.078	.070
N	1,014	1,014	1,023	1,023	1,021	1,021

Note. OLS = ordinary least squares.

† $p < .10$. * $p < .05$. ** $p < .01$. *** $p < .001$. ‡Significant at $p < .05$ when forgiveness variable excluded.

Table 3. OLS Parameter Estimates From the Regression of W2 Psychological Well-Being on W1 (Baseline) Psychological Well-Being, Secure Attachment to God, Forgiveness, Control Variables, and the Interaction Between Secure Attachment to God and Forgiveness.

Variable	Optimism		Self-Esteem		Life Satisfaction	
	(1)	(2)	(1)	(2)	(1)	(2)
W1 optimism/self-esteem/life satisfaction	.171***	.180***	.154***	.157***	.238***	.233***
Age	-.001	-.002	-.003	-.004	.000	-.001
Female (Ref = male)	-.062	-.062	.013	.011	.030	.023
Black (Ref = White)	-.034	-.033	.015	.017	.078	.076
Married (Ref = not married)	-.008	-.007	.039	.042	.158	.165
Education	.007	.007	.011†	.011†	.017†	.016†
Income	.001	.001	.003	.004	.003	.004
Religious attendance	.028***	.029***	.000	.001	.006	.006
Prayer	.019	.020	-.010	-.013	-.020	-.022
Catholic (Ref = Protestant)	-.076	-.080	.013	.017	.073	.076
Other Christian (Ref = Protestant)	-.123	-.136	-.301***	-.305***	-.162†	-.178†
No affiliation (Ref = Protestant)	-.296*	-.285*	-.068	-.077	-.112	-.139
Secure attachment to God	.040	.067	.003	.009	-.045	-.076
Forgiven by God	.045	—	.050	—	-.007	—
Transactional forgiveness	—	.003	—	-.034	—	-.016
Secure Attachment to God × Forgiven by God	.219*	—	.147*	—	.230*	—
Secure Attachment to God × Transactional Forgiveness	—	.086†	—	.101*	—	.175**
Adjusted R ² (from non-imputed data)	.050	.046	.063	.060	.080	.074
N	1,014	1,014	1,023	1,023	1,021	1,021

Note. OLS = ordinary least squares.

†p < .10. *p < .05. **p < .01. ***p < .001.

as to the direction between transactional forgiveness and PWB. The results shown in Table 2 do not provide support for these expectations, as neither measure of forgiveness is significantly related to optimism, self-esteem, or life satisfaction. One measure does reach marginal significance, however. Feeling forgiven by God marginally predicts positive changes in self-esteem over time ($b = .067, p < .10$).

We also expected that a secure attachment to God would positively associate with changes in PWB. The findings shown in Table 2 provide partial support for this hypothesis. Secure attachment to God is associated with increases in optimism over time after controlling for baseline levels of optimism. Secure attachment to God is also associated with changes in self-esteem (when forgiveness measures are excluded, unreported models).

The findings shown in Table 3 and Figure 1 examine our final hypothesis, which stated that a secure attachment to God would moderate the relationships between forgiveness and changes in PWB over time, such that forgiveness would be more strongly associated with PWB among individuals who are securely attached to God. The data provide strong support for this prediction. For optimism, Model 1 shows that the interaction between feeling forgiven by God and secure attachment to God is statistically significant ($b = .219, p < .05$). The positive sign on the interaction term suggests there is a positive association between feeling forgiven by God and optimism among those who are securely attached to God. To better understand this complex interaction, Figure 1a provides a graphical representation. The highest levels of optimism are found among those who feel forgiven by God and are very securely attached to God (i.e., are 1 standard deviation [*SD*] above the mean on this measure). The effect of feeling forgiven by God on optimism is weaker among those who have average levels of attachment to God and even weaker among those who are below the mean.

For self-esteem, the interactions between feeling forgiven by God and secure attachment to God (Model 1; $b = .147, p < .05$) and transactional forgiveness and secure attachment (Model 2; $b = .101, p < .05$) are both statistically significant. The positive signs indicate that the positive correlation between forgiveness and self-esteem is stronger among those who were securely attached to God. According to Figure 1b, the highest levels of self-esteem are found among those who feel forgiven by God and are one *SD* above the mean on the secure attachment to God measure. The effect of feeling forgiven by God is weaker at lower levels of attachment to God. Figure 1c displays the interaction between transactional forgiveness and attachment to God. In this case, there is an inverse relationship between transactional forgiveness and changes in self-esteem among those who are

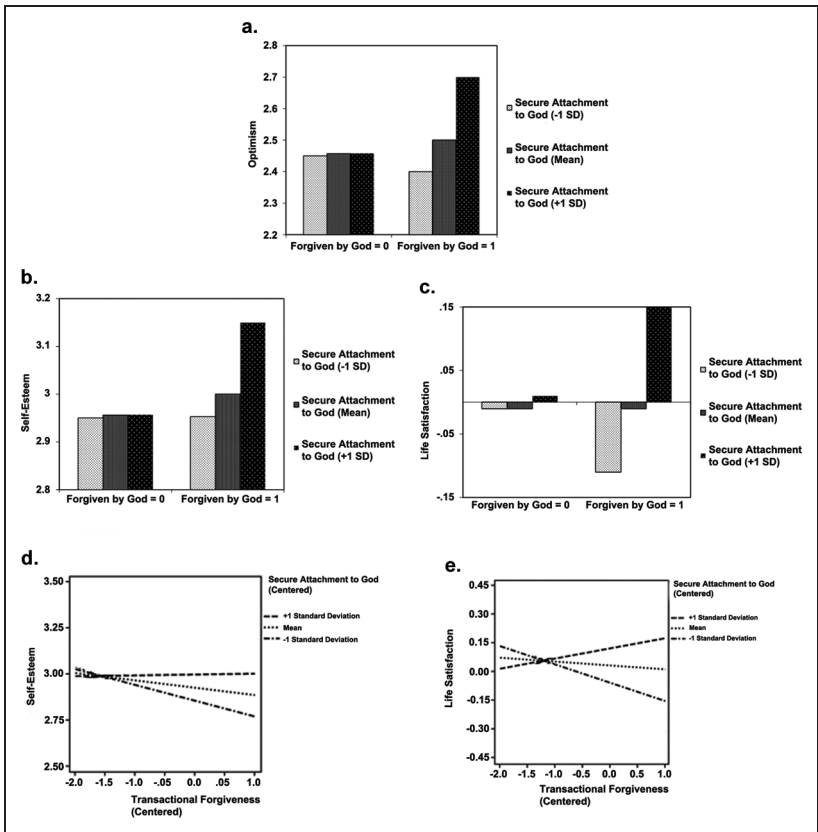


Figure 1. Interactive effects of secure attachment to God and forgiveness on changes in psychological well-being.

avoidantly attached to God. This association gets weaker, however, as attachment to God moves from avoidant (below the mean) to secure (above the mean).

For life satisfaction, the interactions between feeling forgiven by God and secure attachment to God (Model 1; $b = .230, p < .05$) and between transactional forgiveness and secure attachment are statistically significant (Model 2; $b = .175, p < .01$). The positive signs show that the positive correlation between forgiveness and life satisfaction is stronger among those who are securely attached to God. Figure 1d shows that the highest levels of life satisfaction are observed for individuals who feel forgiven by God and are 1 SD above the mean on the secure attachment to God measure. This

association gets weaker as attachment to God declines. Figure 1e allows us to interpret the interaction between transactional forgiveness and attachment to God. At mean levels of attachment to God, there is virtually no association between transactional forgiveness and life satisfaction. For individuals 1 *SD* above the mean on the attachment measure, however, transactional forgiveness from God is positively associated with life satisfaction. This association is negative for those who are below the mean on attachment to God.

Discussion

Cross-sectional studies have generally found a positive link between forgiveness and measures of mental health (Freedman & Enright, 1996; Krause & Ellison, 2003; Lawler-Row & Piferi, 2006). Acting on the insight that higher levels of relational quality and forgiveness are related to well-being (Strelan, Acton, & Patrick, 2009) and that individual differences moderate the impact of forgiveness on health (Griffin et al., 2015), we examined both the direct effects of forgiveness and attachment to God on PWB as well as moderating effects. Results indicate that feeling forgiven by God or engaging in transactional forgiveness do not seem to predict changes in PWB over time, with the exception of a marginal relationship between feeling forgiven by God and self-esteem. While the results are largely null, these findings are still relevant due to the fact that longitudinal studies of forgiveness are relatively rare. Given the report that older Americans past the age of 65 experience higher levels of mental distress (Clarke & Wheaton, 2005) and that they may experience decreased functioning as they confront their own mortality and intrapsychic conflicts (Butler & Lewis, 1977), it is important to know if forgiveness relates to changes in mental well-being.

Our second finding relates to research indicating older adults are more reflective about their relationship with God (Allemand et al., 2012), and that they use their remaining years to expiate guilt and resolve intrapsychic conflicts (Butler & Lewis, 1977). In these data, secure attachment to God is associated with increased optimism and self-esteem over time. Therefore, the security of one's attachment to God may contribute to positive mental well-being as these processes take place. This finding aligns with recent scholarship reporting that older adults feel compelled to establish proximity with an attachment figure and that for some God serves as the primary attachment figure (Lee & Montelongo, 2016). One way to establish proximity is through religious service attendance, and fittingly, our data indicate religious service attendance is robustly associated with increased optimism over time (see

Table 2). This likely operates through the well-documented mechanism of social support (e.g., Ellison & George, 1994).

The third main finding reported here suggests that when forgiveness and attachment to God are interacted, they differentially predict PWB in two theistic measures of forgiveness: feeling forgiven by God and altering behavior as a condition of being forgiven by God. The interaction of feeling forgiven by God and attachment to God differentially predicts levels of optimism, self-esteem, and life satisfaction (Figures 1a, 1b, and 1c), such that PWB is virtually unchanged among those who do not feel forgiven by God, but for those who do feel forgiven, higher levels of secure attachment equate to higher levels of PWB. Additionally, the interaction of attachment to God and transactional forgiveness predicts varying levels of self-esteem and life satisfaction (Figures 1d and 1e), such that those who are close to God experience better mental health when they embrace a transactional form of forgiveness, while those with distant relationships experience better mental health when they distance themselves from a forgiveness transaction. These results suggest once again the validity of the consistency of belief hypothesis (Wink & Scott, 2005) and offer a view in which the nature of the relationship with God provides insight into a mechanisms through which PWB operate (Bradshaw & Kent, in press).

Notably, it is possible for beliefs *about* God and feelings of security *toward* God to be in tension. Attachments are reflective of early childhood experiences that shape how people relate socially as they move through the life course, and relatively stable internal working models developed in early childhood mean that how people relate to God can be contingent not just upon theology or beliefs but upon early human relational experiences (Granqvist & Hagekull, 2003; Granqvist & Kirkpatrick, 2013). Many people who are socialized in religious congregations participate in religious activities and believe in God as they age but are nevertheless insecurely attached to God. How attachment to God works across the life course is not currently known, but it is highly plausible that even in old age, some people who believe in God may still experience a relationship characterized by insecure attachment. Competing beliefs about God and experiences of God suggest the possibility of competing subjective experiences of forgiveness. Where God is experienced as intimate, maintenance of relationship through forgiveness may result in positive mental health outcomes, whereas when God is experienced as distant or uncertain, dissociation from forgiveness may result in positive outcomes.

What should we make of avoidantly attached individuals who report positive forgiveness outcomes, yet experience lower levels of PWB? In this

case, both confidence in forgiveness and belief in transactional forgiveness are associated with decreased mental health (Figure 1). One explanation for this is that a conflict occurs when those who are distant from God “engage” in the relatively intimate activity of seeking forgiveness. A principle goal of insecurely attached individuals is to maintain independence, control, and autonomy in their relationships, and they utilize distancing strategies in order to do so (Mikulincer & Shaver, 2003; Simpson & Rholes, 2012). When distancing strategies are challenged, whether through intrinsic efforts to make contact with God or extrinsic pressures (e.g., from a pastor or relative), the individual may become susceptible to psychological distress, since addressing issues of forgiveness or altering behavior in order to become “acceptable” to God threaten relational autonomy. The process may be further exacerbated since older adults are in a life stage where they are more reflective about their relationship with God, since they recognize their time on Earth is limited (Allemand et al., 2012). Coming to grips with their relationship with God may be a high priority (Krause, 2004), and this process may result in additional challenges for those who have maintained a more distant relationship with God over their life span. People do, of course, seek greater security with God over time, as Granqvist and Kirkpatrick (2013) note, but whether that change is accompanied by psychological distress we do not know.

Limitations and Future Directions

The longitudinal design of this study is a strength, yet some limitations and prospects for future research remain. First, interviewers did not determine whether participants were being treated for any mental health conditions. If participants were using antidepressants at the time of data collection, this may affect results. Second, the survey instrument does not assess attachment anxiety, but only security and avoidance. Third, questions of age, period, and cohort are not addressed. The older population differs from the younger, including in levels of religiosity, so our results are not generalizable to the larger population. Third, the sample consists of active or formerly active Christians, and future research might examine how forgiveness functions among adherents of other religions. Fourth, further research should be conducted on the transactional forgiveness item. Typically, conditional measures of forgiveness require that the “other” (the one committing the transgression) perform an act of contrition prior to forgiveness being granted, but this measure instead asks if the *individual* must change before *God* grants forgiveness. Measures of God image (Froese & Bader, 2010) might be

examined to see whether those with a highly engaged God differ from those with a disengaged God. Fifth, our analyses relate more to trait-level measures of forgiveness than state levels. Conceivably, these measures pick up on repeated instances (states) of seeking forgiveness, but even so, they do not differentiate between specific instances of relatively minor offenses and serious violations which pose more serious challenges in securing forgiveness. It would be insightful to know how these outcomes might change when inquiring about specific offenses or experiences of forgiveness. Finally, potential gender differences in attachment and forgiveness should be examined. Women are more likely to see God as loving, nurturing, and personal (Ciarrocchi, Piedmont, & Williams, 2002), and indeed, women are significantly more securely attached than men in these data ($t = -8.64$). Once attachment security is accounted for, however, there is no significant main effect of gender. Even still, gender has been identified as a suppressor variable between attachment anxiety and stress elsewhere (Reiner, Anderson, Hall, & Hall, 2010), and gender could be assessed more fully in future studies.

Conclusion

Secure attachment to God and divine forgiveness among individuals with a religious background appear to be linked with salutary mental health outcomes. Most research in this area has examined forgiveness in the context of human relationships, with relatively few studies to date on forgiveness in the religious realm. The current study extends our knowledge in this area in several ways. First, secure attachment to God at baseline is associated with increases in optimism and self-esteem; second, feeling forgiven by God and transactional forgiveness from God are differentially associated with PWB at varying levels of attachment to God; and third, for those with insecure attachments, positive PWB is associated with consistency of belief, that is, a decreased emphasis on forgiveness from God. These findings underscore the importance of subjective beliefs about God in the lives of many older adults in the United States.

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