

Self-determination, Attachment Styles, and Well-being in Adult Romantic Relationships

Gary K. Leak and Ramie R. Cooney
Creighton University

This study is one of the first to integrate research on adult attachment styles, self-determination theory, and well-being. Two hundred and nine college students completed measures of attachment styles, aspects of self-determination in relationships, and measures of well-being. As expected, secure attachment was positively related to felt authenticity and relatively high levels of self-determination in relationships, while fearful-avoidant and preoccupied attachment styles were negatively related to perceived authenticity and self-determination. Consistent with earlier work, felt self-determination in relationships and a secure attachment style were both positively associated with psychological health and well-being. Further, mediational tests revealed that the relationship between a secure attachment style and psychological health and well-being was explained by felt self-determination in relationships.

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Self-determination theory (Ryan, 1995; Ryan & Deci, 2000) has explored the conceptual link between personal well-being and three important and innate psychological needs: autonomy, competence, and relatedness. The theory states that one will experience well-being only if these three needs are fulfilled. In other words, as a consequence of need fulfillment, individuals will experience greater self-esteem, positive affect, and better physical and psychological well-being.

Many studies by Ryan and Deci and their colleagues support the major tenets of self-determination theory, and, in particular, that satisfaction of the theory's three key needs predicts well-being and adjustment (Ryan & Deci, 2000; Ryan, Sheldon, Kasser, & Deci, 1996). For example, several studies by Kasser and Ryan (1993, 1996) found that having life aspirations and pursuing goals that are intrinsic to the self (i.e., authentic and self-determined), such as personal growth or generativity, were related to personality integration (i.e., well-being and self-actualization). In contrast, the pursuit of extrinsic goals and aspirations, such as fame or wealth, was related to lower levels of psychological and physical health. Sheldon and Elliot (1999) used a path-modeling technique to determine that pursuing intrinsic and authentic goals led to greater progress

toward attaining those goals, which in turn led to more satisfying experiences and ultimately global well-being. In another study, Sheldon, Ryan, Rawsthorne, and Ilardi (1997) found that people who generally feel authentic and self-determined in what they do in various roles (expressive of their "true self"), such as student or worker, were healthier on many measures of adjustment, while participating in roles that stifled autonomy fostered maladjustment and distress. Given the importance of the congruence between one's roles and one's "true self" for well-being, the question arises as to whether or not certain types of people are more likely to be congruent, authentic, and self-determined in their role as a romantic partner. The concept of attachment styles offers one approach to answering this question.

Attachment styles refer to the characteristic ways people have of relating to significant others. To assess adult attachment styles, Bartholomew and her colleagues developed the Relationship Questionnaire (Griffin & Bartholomew, 1994) based explicitly on attachment theory's concept of "internal working models" (Bartholomew & Horowitz, 1991). This four-fold dimensional approach states that adult attachment styles result from internal models of self and others that can be either positive or negative, and these models are built-up from experiences with attachment figures early in life. The four attachment styles are: *secure* (positive view of self and others), *preoccupied* with attachment (positive view of others, negative view of self), *dismissive-avoidant* (negative

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view of others, positive view of self), and *fearful-avoidant* (negative view of both self and others). The main advance of Bartholomew's system came from splitting Hazan and Shaver's (1987) avoidant type into two categories. The dismissive avoidant is someone who is self-confident but low on interpersonal warmth and nurturance, emotional expressiveness, and closeness in relationships. The fearful avoidant is fearful of intimacy, submissive, and socially avoidant (i.e., they are characterized by passivity rather than the dismissive's disinterest in others, coldness or even hostility).

Attachment theory and attachment styles have been applied to a broad array of interpersonal and family relationship variables, such as love styles, sexual activity, and relationship commitment, trust, satisfaction, longevity, and jealousy (Berman & Sperling, 1994; Brennan, Clark, & Shaver, 1998; Hazan & Shaver, 1987; Leak, Gardner, & Parsons, 1998). In addition, secure and insecure attachment styles have consistently been associated with psychological well-being (e.g., Simpson, 1990; Simpson & Rholes, 1998). As a broad generalization, secure attachment has been associated with desirable personal and relationship qualities (e.g., self-esteem and partner trust, respectively), while the insecure styles have been associated with negative personal and relationship attributes (e.g., defensiveness and jealousy, respectively).

One neglected area of research in the attachment literature is the connection between one's attachment style and the extent to which one's relationship goals are self-determined, along a continuum from external regulation and control to self-regulated and intrinsic motivation (Ryan & Deci, 2000). Self-determination research had found that environmental and contextual supports (including personal dispositions) for competence, autonomy and relatedness lead to the development of intrinsic motivation and, in turn, psychological well-being and personality integration (Ryan & Deci).

The present study is based on the notion that one such dispositional factor that may affect need satisfaction and well-being is one's attachment style. There are several lines of evidence to support that contention. First, individuals with a secure attachment style report greater relationship satisfaction and intimacy in relationships (the latter reflected in greater levels of self-disclosure, mutual support [Feeney, Noller, & Callan, 1994]) and touch to maintain affectional bonds [Brennen, Wu, & Loev, 1998]). High levels of intimacy behaviors, characteristic of those securely attached, should in turn impact satisfaction of the inherent need for relatedness postulated by self-determination theory. In addition,

the connection between attachment and self-determination can be inferred from several studies. For example, Ryan, Stiller and Lynch (1994) found that children who felt secure in their attachments had more internalized motivation for school-related activities. Further, Kasser, Ryan, Zax, and Sameroff (1995) found that maternal nurturance (e.g., warmth and responsiveness) was related to the development of their teenager's intrinsic goals (e.g., personal growth and relationship quality). These studies suggest that attachment styles, because they are developed prior to adulthood and are resistant to modification due to stable internal working models of self and other, may have a causal impact on relationship need satisfaction in adulthood. Support for this view also comes from a recent study by LaGuardia, Ryan, Couchman, and Deci (2000) that found that attachment security predicted self-determination in various roles and relationships for young adults.

Predictions

Bivariate correlations.

Based on the rationale presented above, we reasoned that secure attachment individuals would most likely be in romantic relationships for autonomous, intrinsic, highly self-determined reasons (i.e., the relationship reflects who they really are), while insecure attachment individuals would be in relationships for less authentic and more extrinsic "controlled" reasons (e.g., to pursue relationship goals extrinsic to the self such as to please friends, family, or their relationship partner) and as a result experience deficits in need fulfillment and lower levels of well-being.¹ Thus it was predicted that secure attachment would be positively correlated with measures of relationship self-determination as well as personal well-being, while the three insecure attachment styles would be negatively correlated with relationship self-determination and well-being (generally using previously unexamined operationalizations of well-being and self-determination in relationships). In addition, it was predicted that the self-determination variables would

¹ These controlled reasons can either be internal (e.g., "introjected" where behavior is based on internal mechanisms such as guilt and anxiety and the desire to avoid disapproval from oneself) or external (e.g., to gain approval or please others). The reader should consult Ryan (1995) and Ryan and Deci (2000) for a summary of self-determination theory and for the distinctions among levels of self-determined striving from external regulation through intrinsic motivation.

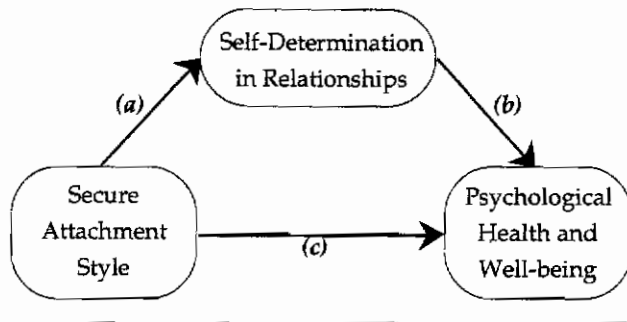


Figure 1. Attachment style and physical well-being model with proposed mediational self-determination theory effect.

be positively correlated with overall well-being. Note that the present research was designed to break new ground by extending self-determination theory, which has emphasized generalized self-determined strivings across domains, to an examination of the importance of felt self-determination and autonomy within the context of romantic relationships (cf., LaGuardia et al., 2000).²

Mediational hypothesis.

Based on rationale presented above and LaGuardia et al.'s (2000) research, we expected that the contextual factor of adult attachment styles would influence relationship self-determination variables. Secure attachment should provide support for autonomy and relationship needs in particular, which should in turn foster well-being (LaGuardia et al., 2000; Sheldon & Elliot, 1999). Further, insecure attachments should undermine the satisfaction of needs for autonomy and relatedness. However, LaGuardia et al.'s study is the only one to date that explored the possible causal relations among these three important factors: attachment, self-determination in relationships, and overall well-being. Thus, our second goal was to test the model depicted in Figure 1. It was expected that self-determination in relationships would mediate the association between attachment and well-being. In other words, attachment security would influence or predict overall well-being via its influence on relationship self-determination.

² LaGuardia et al.'s (2000) research demonstrated that secure attachment fosters well-being because individuals with secure attachments have satisfied their needs for autonomy, competence, and relatedness within certain relationships. In contrast to the present study, however, their research focused on attachment and need satisfaction in various relationships, rather than on attachment and level of self-determination in one's locus of control or reasons for being in relationships.

METHOD

Participants

The participants were 134 women and 75 men ($M_{age} = 19.6$, $SD = 1.6$) recruited from various psychology classes and given extra credit toward their course grade.

Measures

Self-determination and authenticity in relationships.

Sheldon et al.'s (1997) 6-item scale to assess authenticity in various roles was modified to form a 5-item scale ($\alpha = .65$) to assess relationship authenticity (e.g., an autonomous, self-determined reason, "I have freely chosen the way I am when in a relationship," and an "introjected," controlled reason, "I am only the way I am in a relationship because that is the way I believe I have to be," [reverse scored]).

Self-determination and autonomy in relationships.

The first author developed a 20-item questionnaire ($\alpha = .86$) that dealt with issues related to autonomy and self-determination in the participant's typical dating and intimate relationships. This measure distinguished between being open and supportive in the relationship because it felt right or genuine (autonomous and self-determined), and doing what the relationship partner wants in order to avoid his or her anger (low in autonomy and self-determination; reverse scored).

Extrinsic vs. intrinsic reasons for being in relationships.

Participants responded to 4 items (2 modified from Kasser & Ryan [1993, 1996], and two author-constructed) that expressed potential reasons for being in a relationship. Three items ($\alpha = .55$) reflected an extrinsic locus of control for being in relationships such as, "I was in the relationship because I would feel anxious or guilty or unpopular if I wasn't," (an introjected reason low in self-determination) and one item expressed intrinsic, autonomous reasons, "I was in the relationship because it was an essential part of me, it is important to me and who I really am," (high level of self-determination).

Goals/aspirations attainment through relationships.

This 6-item questionnaire asked participants to rate the degree to which their relationship helped them achieve six goals (1 = relationship no help in reaching the goal, 5 = relationship helped very much in reaching the goal). Three goals reflected intrinsic needs (self-acceptance, intimacy and friendship, and societal contribution; $\alpha = .65$) and three reflected extrinsic needs (financial

success, fame and recognition, and physical appearance; $\alpha = .68$). Kasser and Ryan (1993, 1996) found that these extrinsic goals were negatively related to well-being, while intrinsic goals were positively related to well-being.

Attachment styles.

The Relationship Questionnaire (Griffin & Bartholomew, 1994) assesses four continuous dimensions of attachment: *secure*, *dismissive-avoidant* (self-confident but low on interpersonal warmth, nurturance, and closeness in relationships), *fearful-avoidant* (socially avoidant and fearful of intimacy, submissive, and low in self-esteem), and *preoccupied-with-relationships* (dependent in relationships with an excessive fear of abandonment).³ These styles are based on positive vs. negative internal working models of self and others, and they can be reduced to two superordinate dimensions of Anxiety about Abandonment and Avoidance of Intimacy (Brennan, Clark, & Shaver, 1998). Finally, an overall attachment security index ($\alpha = .46$) was formed by subtracting the sum of the scores on the three measures of insecure attachment from the scores on the secure attachment style scale (LaGuardia et al., 2000).

Well-being and adjustment.

Psychological well-being was based on responses to five well-validated instruments. Psychological distress was assessed with eight symptoms of depression and anxiety (Ross, 1990; $\alpha = .77$). Alienation was measured with the revised

9-item version of Srole's (1956) Anomia scale ($\alpha = .78$); it assesses several facets of alienation such as a sense of meaninglessness, pessimism, and social alienation (Seeman, 1991). The cognitive dimension of subjective well-being was measured with the Satisfaction with Life Scale (SWL; Diener, Emmons, Larson, & Griffin, 1985; $\alpha = .91$). A great deal of evidence exists to support its reliability and validity (e.g., Diener, Suh, Lucas, & Smith, 1999). Self-esteem was assessed with Rosenberg's (1965) 10-item measure of self-acceptance ($\alpha = .88$). Finally, psychological maturity was assessed with Domino and Affonso's (1990) Inventory of Psychosocial Balance (IPB). The IPB was developed to assess psychosocial health and maturity according to Erikson's theory of development. Domino and Affonso claim that the total score on the IPB (sum of the eight developmental stage scales; $\alpha = .95$) reflects the achievement of important developmental goals, and high IPB scores have been associated with independence, productiveness, responsibility, warmth, and the absence of anxiety and other symptoms of distress. For simplicity of analysis, the five well-being measures were combined to provide an overall well-being index ($\alpha = .86$).⁴

Procedure

Participants worked in groups of approximately 10-15 students each, and they anonymously completed the materials that were arranged in a random order.

RESULTS

Attachment Styles and Self-Determination in Relationships

Table 1 shows the relationships of the four attachment styles, the overall or global attachment security index, and the well-being index with indices of self-determination in relationships. Consistent with expectation, secure attachment was associated with reported authenticity in relationships ($r = .37, p < .01$) and being in relationships for autonomous (self-determined) reasons ($r = .31, p < .01$). In addition,

³ The four attachment styles and their phrasing were (from 1 = *totally disagree*, 6 = *totally agree*):

Secure. It is easy for me to become emotionally close to others. I am comfortable depending on others and having others depend on me. I don't worry about being alone or having others not accept me.

Dismissive-avoidant. I am comfortable without close emotional relationships. It is very important to me to feel independent and self-sufficient, and I prefer not to depend on others or have others depend on me.

Fearful-avoidant. I am uncomfortable getting close to others. I want emotionally close relationships but I find it difficult to trust others completely, or to depend on them. I worry that I will be hurt if I allow myself to become too close to others.

Preoccupied (or anxious). I want to be completely emotionally intimate with others, but I often find that others are reluctant to get as close as I would like. I am uncomfortable being without close relationships, but I sometimes worry that others don't value me as much as I value them.

⁴ A principal components analysis of the five well-being measures yielded a single component that accounted for 59% of the total variance, and each scale loaded on the component with an absolute value $> .60$ (mean loading = $.77$). A unit-weighted index of well-being was derived after standardizing scores on each of the five scales. The *Well-being* index is the sum of the three indices of positive well-being minus the two indices of deficiencies in well-being (i.e., [psychosocial maturity + satisfaction with life + self-esteem] - [anomia + psychological distress]).

Table 1: Correlations Between Attachment Styles and Well-being with Measures of Self-determination in Relationships

	Attachment Style				Well-being	
	Secure	Dismissive	Preoccupied	Fearful	Global security	
<i>Self-determination Measures</i>						
Authentic	.37**	-.17*	-.22**	-.39**	.46**	.41**
Autonomous Reasons	.31**	-.04	-.40**	-.29**	.42**	.53**
Intrinsic Reasons	.11	-.19*	.11	-.07	.09	.03
Extrinsic Reasons	-.33**	.04	.15	.25**	-.32**	-.42**
Intrinsic Goals	.18*	-.17*	.10	-.13	.14	.08
Extrinsic Goals	.12	-.16*	.16*	-.06	.07	-.11
<i>Well-being</i>	.25*	-.29*	-.45**	-.48**	.42**	--

Note. Global security is based on one's score on the secure attachment style scale minus the sum of the other three, insecure attachment ratings on Bartholomew's Relationship Questionnaire. The well-being index is a factor analytically-derived composite based on measures of self-esteem, satisfaction with life, psychosocial adjustment, physical distress, and anomia (the latter two reverse scored).

* $p < .05$, ** $p < .01$.

secure attachment was correlated negatively with the sum of the three items that assessed an extrinsic locus of control for being in a relationship ($r = -.33$, $p < .01$), but was unrelated to the single-item intrinsic reason. Finally, secure attachment was related to reports that relationships contribute to the attainment of intrinsic goals/aspirations, although this relationship was quite weak ($r = .18$, $p < .05$; $r^2 = .03$). The pattern of correlations between the self-determination variables and the index of attachment security was quite similar to those reported above for the secure attachment style scale, although generally more robust.

The pattern of correlations was often the opposite for the three insecure attachment scales. Insecure attachments tended to be negatively associated with measures of authenticity, autonomy, and self-determination in relationships.

Conceptual Replication of Self-Determination and Well-being

A great deal of previous research supports a key claim of self-determination theory which states that satisfaction of one's needs for autonomy, competence and relatedness are related to one's physical and psychological well-being (Ryan & Deci, 2000). In our research, however, self-determination variables were given a new focus (e.g., examining *reasons* for being in relationships that varied along a self-determination dimension), and were limited to aspects of autonomy in relationships (and not competence or quality of relatedness — the other two important needs specified

by self-determination theory). Consistent with previous research, both felt autonomy and authenticity were associated with all five heterogeneous measures of well-being (r range = .24 to .46) and with the overall well-being index (.53 and .41, respectively).

Replication of Attachment Styles and Well-being

A great deal of research, mentioned previously, has documented the link between attachment security and personal well-being on the one hand and attachment insecurity and personal distress on the other. The present results replicate those findings. All five attachment variables were related in expected ways with the well-being index (see Table 1).

Investigation of Mediated Effects

Next, the present study extended LaGuardia et al.'s (2000) research by demonstrating that self-determination in relationships mediated the relationship between attachment security and psychological well-being (see Figure 1). This method assesses the association of a predictor and outcome variable when controlling for the effects of the mediator using a series of hierarchical (step-wise) regressions (Baron & Kenny, 1986; Holmbeck, in press; Holmbeck, 1997). For example, if self-determination in romantic relationships acts as a mediator, attachment security should no longer explain unique variance in psychological well-being after the variance associated with the mediator is removed.

Relationship between predictor (attachment security) and mediator (self-determination).

A regression analysis examined how the global attachment security index was related to the proposed mediator (path *a* in Figure 1). As expected, there was a significant positive relationship between attachment security and a composite index of the six self-determination variables, $r = .37$, $F(1, 209) = 32.58$, $p < .001$.

Predictability of the mediator (self-determination) on the outcome (psychological health and well-being).

In the second step, a regression analysis tested whether self-determination was related to overall well-being (path *b* in Figure 1). Self-determination in romantic relationships did predict a significant amount of the variance in psychological health and well-being, $r = .27$, $F(1, 209) = 16.32$, $p < .001$.

Influence of the predictor (attachment security) on the outcome (psychological health and well-being).

Third, a regression analysis tested path *c* in Figure 1 linking the predictor variable (attachment security) to overall well-being. The global index of attachment security also significantly predicted psychological health and well-being, $r = .22$, $F(1, 209) = 10.34$, $p < .01$.

Self-determination in relationships as a mediating variable.

A fourth analysis tested the association of the predictor and outcome variables after controlling for the effects of the mediator using hierarchical regression techniques described by Baron & Kenny (1986). Attachment security should no longer explain unique variance in psychological health and well-being if self-determination is, in fact, a mediator. With the effects of self-determination removed, the tendency for overall well-being to be predicted by attachment security was no longer apparent, $r\Delta = .03$, $F\Delta(1, 209) = 3.69$, $p = ns$. In order to test whether $r\Delta$ (the drop in r between the third and fourth analysis) was significant, the magnitude of the indirect effect was computed (see Holmbeck [in press] for formulae). The partial mediation was significant, $z = 2.65$, $p < .01$, and explained 38% of the total effect.

A fifth hierarchical analysis was performed with the order of the predictor and mediator reversed to ascertain the directionality of the mediator-predictor variable relationship. After the variance associated with global attachment security in a multiple regression was removed and the relationship between self-determination and overall well-being re-tested, self-determination (the hypothesized mediator) still predicted unique variance in well-being above and beyond that explained by attachment security.

DISCUSSION

This research has advanced our understanding of the self-determination, attachment styles, and well-being literatures in two ways. First, it added to the growing body of work establishing a link between self-determination and psychological well-being. This work replicated that connection, but also extended it by examining the self-determination--well-being connection using several diverse facets of self-determination in romantic relationships that have not been used previously (e.g., reasons for being in a relationship, felt authenticity and autonomy in relationships). Thus, the results of this research add confidence to our beliefs about the beneficent consequences for well-being of self-determined striving in relationships (vs. behaving for externally regulated or otherwise controlled reasons). Also, these results are consistent with self-determination theory's dual emphasis on distal and current factors, such as attachment styles, influencing felt autonomy and self-determination in relationships.

Second, this research provided a conceptual replication of the connections between attachment styles on the one hand and self-determination in relationships and personal well-being on the other. Consistent with earlier work (Shaver & Clark, 1994), secure attachment was related to salutary personal (well-being) and relationship (self-determination in relationships) qualities. In this research, secure attachment was negatively related to unhealthy, controlled reasons for being in a relationship, and securely attached individuals reported that their relationship helped them to pursue intrinsic and healthy goals (e.g., self-acceptance and personal growth, intimacy and friendship). The insecure attachment styles (fearful-avoidant and preoccupied with attachment in particular) were generally negatively related to self-determination variables. The present research thus extends our understanding of the characteristics of secure vs. insecure attachment styles by virtue of their relationships with intrinsic and self-determined reasons for being in a relationship.

Despite many outcomes consistent with the attachment, self-determination, and well-being literatures, one problem emerged. Reported intrinsic reasons for being in relationships was only associated with one measure (dismissive attachment). The attachment and well-being variables were more consistently related to the measure of extrinsic reasons, perhaps because of the inherently greater reliability of a 3-item measure over the 1-item measure of intrinsic reasons.

Overall, the pattern of results replicated and extended previous research. One very important

conclusion is that self-determination in relationships was the medium through which attachment influenced an individual's psychological health and well-being. Contrary to LaGuardia et al.'s (2000) results, our follow-up analyses verified the one-way directionality of this relationship. In essence, the security of one's attachment influenced felt self-determination in romantic relationships which, in turn, predicted an individual's overall well-being. This study, therefore, points to the importance of understanding the complex interplay among factors shaping psychological health and well-being, rather than assuming well-being follows directly and casually from secure attachment alone. Instead, our research adds to the growing body of evidence supporting the importance of self-determination as an important and casual agent in psychological well-being.

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